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The International Scientific Conference
“Sustainable Development of Cooperatives and Well-being for All”
EDR₃

June 19-20, 2025

Republic of Moldova, Chisinau

The conference is dedicated to 2025 as the International Year of Cooperatives declared by the UN with the topic *“Cooperatives build a better world”*

CONFERENCE MATERIALS | MATERIALELE CONFERINȚEI

Conferința științifică internațională
„Dezvoltarea sustenabilă a cooperativelor și bunăstare pentru toți”
DEC₃

19-20 iunie 2025

Chișinău, Republica Moldova

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Chișinău, Republica Moldova | Republic of Moldova, Chisinau

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Conferința științifică internațională

**„DEZVOLTAREA SUSTENABILĂ
A COOPERATIVELOR
ȘI BUNĂSTARE PENTRU TOȚI”**

International scientific conference



2025 International Year
of Cooperatives

JUNE 19-20, 2025

**„SUSTAINABLE DEVELOPMENT
OF COOPERATIVES
AND WELL-BEING FOR ALL”**

CONTEXT

The International Scientific Conference

**“Sustainable Development of Cooperatives
and Well-being for All”**

is organized in the context of the United Nations General Assembly's declaration of 2025 as the International Year of Cooperatives (IYC), which will be held under the topic “Cooperatives build a better world”. *It is the second time in history that the UN has dedicated an international year to cooperatives, the first was in 2012.*

The Second International Year of Cooperatives, said Li Junhua, Deputy Secretary General of the UN Department of Economic and Social Affairs, is an opportunity to mobilize all stakeholders to support and expand cooperatives worldwide, enhance their innovative contributions to sustainable economic development, social inclusion and accelerate progress towards the Sustainable Development Goals.

Cooperatives play an important role in today's society and continue to expand and diversify. Globally, the cooperative system associates about one billion members and employs more than 280 million people, representing 10% of all jobs worldwide. The significance of cooperatives is also growing in the European Union. Some 180,000 cooperative enterprises operate here, owned by 163 million members, providing jobs for 5.4 million people.

Consumer cooperatives in the Republic of Moldova offer a wide range of economic and social activities, are part of the global system of cooperatives, and are a stable partner in the

CONTEXT

Conferința științifică internațională

**„Dezvoltarea sustenabilă a cooperativelor
și bunăstare pentru toți”**

este organizată în contextul declarării de către Adunarea Generală a Organizației Națiunilor Unite a anului 2025 – Anul Internațional al Cooperativelor (AIC), care va derula sub genericul “Cooperativele construiesc o lume mai bună”. *Este a doua oară în istorie când ONU dedică un an internațional cooperativelor, primul fiind în 2012.*

Al doilea an internațional al cooperativelor, a menționat Li Junhua, subsecretar general al Departamentului pentru Afaceri Economice și Sociale al ONU, reprezintă o oportunitate de a mobiliza toate părțile interesate pentru a sprijini și extinde cooperativele de pretutindeni, a spori contribuțiile lor inovatoare la dezvoltarea economică sustenabilă, incluziunea socială și accelerarea progreselor în atingerea Obiectivelor de Dezvoltare Durabilă.

Cooperativele joacă un rol important în societatea contemporană, fiind în continuă extensie și diversificare. La nivel global, sistemul cooperatist asociază circa un miliard de membri și antrenează peste 280 de milioane de angajați, ce reprezintă 10% din toate locurile de muncă din întreaga lume. Semnificația cooperativelor este în creștere și în Uniunea Europeană. Aici activează cca 180 mii de întreprinderi cooperatiste, deținute de 163 de milioane de membri, oferind locuri de muncă pentru 5,4 milioane de persoane.

Cooperația de consum din Republica Moldova prestează o gamă variată de activități economice și sociale, fiind parte a sistemului mondial al cooperativelor și un partener stabil

country's socio-economic policy realization. Based on their democratic principles and the unique way they combine economic and social objectives, cooperatives respond to local needs, play a key role on a global scale, and reflect a set of internationally agreed principles and values. In many ways, cooperatives represent a more humane and equitable face of globalization.

At the same time, the cooperatives' activities are faced with multiple challenges posed by the changing environment, which require novel solutions that respond to global and national challenges and promote the innovative, inclusive, sustainable development of cooperatives. This objective becomes particularly important in the context of the Republic of Moldova's European integration path, through which our country has firmly expressed its adherence to community values and openness to cooperation.

This conference is part of the list of events dedicated to the International Year of Cooperatives, aiming to promote their contribution to the development of society through knowledge and innovation.

Conference goals:

- to dynamize research/development in the field of cooperatives and impulse international cooperation in this context;
- to identify new opportunities in the development of cooperatives and to facilitate the transfer of international good practices to the consumer cooperative sector in the Republic of Moldova;
- promote cooperative values and the national cooperative system in the global context;
- to support the transfer of scientific innovations in the process of initial and continuous vocational training;
- to strengthen the relationship between young researchers, scholars from educational and research institutions in the country and abroad, the business environment, and representatives of central and local public authorities.

Within this scientific forum will take place the dissemination and validation of the results of scientific research on the situation in the field of cooperatives, including consumer cooperatives, the challenges they face, the development policies of this sector, the impact

în realizarea politicii socio-economice a țării. Datorită principiilor democratice și a modului unic în care îmbină obiectivele economice și sociale, cooperativele răspund exigențelor locale, joacă un rol esențial la scară globală, relevând o serie de principii și valori convenite internațional. Sub multe aspecte, cooperativele reprezintă o față mai umană și mai echitabilă a globalizării.

Totodată activitatea cooperativelor se confruntă cu multiple provocări generate de mediul în continuă schimbare, iar aceasta solicită soluții inedite care să răspundă atât provocărilor globale, cât și celor naționale și să impulsioneze dezvoltarea inovativă, incluzivă, sustenabilă a cooperativelor. Acest obiectiv devine deosebit de important în contextul parcursului de integrare Europeană a Republicii Moldova, prin care țara noastră și-a exprimat ferm adeviziunea la valorile comunitare și deschiderea spre cooperare.

Prezenta conferință se înscrie în lista evenimentelor consacrate Anului Internațional al Cooperativelor, urmărind scopul de a promova contribuția acestora la dezvoltarea societății prin cunoaștere și inovare.

Obiectivele Conferinței:

- a dinamiza cercetarea/dezvoltarea în domeniul cooperativelor și a impulsiona cooperarea internațională în acest context;
- a identifica noi oportunități în dezvoltarea cooperativelor și a facilita transferul bunelor practici internaționale către sectorul cooperăției de consum din Republica Moldova;
- a promova valorile cooperatiste și sistemul cooperatist național în context global;
- a sprijini transferul inovațiilor științifice în procesul de formare profesională inițială și continuă;
- a fortifica relaționarea între tinerii cercetători, savanți din instituții de învățământ și de cercetare din țară și de peste hotare, mediul de afaceri și reprezentanți ai autorităților publice centrale și locale.

În cadrul acestui forum științific va avea loc diseminarea și validarea rezultatelor cercetărilor științifice privind situația în domeniul cooperativelor, inclusiv celor de consum, provocările cu care se confruntă, politicile de dezvoltare a acestui sector,

on the evolution of society, but also the identification of visions, ideas, innovative, collaborative, inclusive solutions for the development of cooperatives derived from strategies, modern concepts and international best practices.

The conference will provide an effective communication platform for public authorities, academics, businesses, young researchers, and other stakeholders.

impactul asupra evoluției societății, dar și identificarea unor viziuni, idei, soluții inovative, colaborative, incluzive de dezvoltare a cooperativelor derivate din strategiile, conceptele moderne și practicile benefice internaționale.

Conferința va reuni pe o platformă eficientă de comunicare autorități publice, mediul academic, mediul de afaceri, tineri cercetători, alte părți interesate.

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THE DETERMINANTS OF COOPERATIVE LAW: THE COOPERATIVE PRINCIPLES AND THE PRINCIPLE OF SUSTAINABLE DEVELOPMENT – LEGISLATIVE CHALLENGES, BENEFITS FOR ALL

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Abstract

After establishing that cooperative law must be derived from the cooperative principles enshrined in the 1995 International Cooperative Alliance Statement on the Cooperative Identity (ICA Statement; ‘the cooperative principles’), and that it must conform to the legal principle of sustainable development, this contribution discusses several problems lawmakers face when implementing these two determinants of cooperative law in practice.

This dual foundation of cooperative law is not a call for uniformity. Both ‘the cooperative principles’ and the principle of sustainable development allow and require variations, as uniformity contradicts the person-centered nature of cooperatives and drains the source of (sustainable) development, which is diversity.

*The contribution briefly addresses the challenges of translating ‘the cooperative principles’ into law and justifies the *raison d’être* of a separate cooperative enterprise law, considering that Corporate Social Responsibility has evolved into a Corporate Social and Societal Obligation for all types of enterprises, and in light of the growing number of laws on social and/or solidarity economy enterprises. It argues that the defining feature permeating the legal form of cooperatives is member democratic participation. This feature continues to distinguish cooperatives and provides an effective mechanism to regenerate social justice - an aspect of the legal objective of cooperatives and a central element of sustainable development.*

However, several barriers hinder member democratic participation. Two stand out: radical structural changes in cooperatives and the de-organization of all enterprise types induced by globalization factors such as digitization, digitalization, and the instantaneous transferability of data.

Keywords: cooperative principles; cooperative law; sustainable development; globalization and enterprise organization

JEL: Q13, Q12, O18, P28, L31

I. Introduction

The theme of the conference for which this contribution was prepared, ¹ seems to have little in common with the narrow focus on the well-being of the members of a small group rooted in a small locality by the name of Rochdale Society of Equitable Pioneers. And yet: the well-being of the members of most cooperatives around the world, for whom the Rochdale Society of Equitable Pioneers continues to serve as a model, cannot be had without taking into account the global character of sustainable development and the well-being for all. And, vice-versa, sustainable development and well-being for all cannot be had without “the pecuniary benefit and the improvement of the social and domestic condition of [the] members [of individual cooperatives]”, as stated in the “Laws and objects of the Rochdale Society of Equitable Pioneers”. ²

Global and local and the in-betweens – national, regional, international and transnational – need fitting seamlessly. Indeed, as William Pascoe Watkins put it “[...] Co-operation [in the form of cooperatives] offers men and women a clear unbroken line of thought and action, leading from

¹This is the slightly extended version of my contribution to the International Scientific Conference on “Sustainable Development of Cooperatives and Well-Being for All”, organized by the Trade Co-operative University of Moldova on June 19 and 20, 2025, in Chisinau/Republic of Moldova.

² See Laws and Objects of the Rochdale Society of Equitable Pioneers, Objects. Law First, first paragraph.

association with their neighbours and fellow-workers stage by stage to mutually helpful relations with other men and women in the farthest corners of the world. At every stage it teaches and enables them to generate the power to attain through association the higher level of well-being which is their common objective.”³

Watkins, who contributed decisively to the idea of cooperatives, echoes the so-called Philadelphia Declaration of the International Labor Organization (ILO) in 1944 that became part of the Constitution of the ILO. Among others, the Declaration reaffirmed “[...] the fundamental principle [...] that [...] poverty anywhere constitutes a danger to prosperity everywhere.”⁴ As much as the “ideological” nearness of the ILO and the International Cooperative Alliance (ICA) on this point is evident, as little it is being made use of.

When proposing to add the 6th Principle (Cooperation among cooperatives) to the list of principles the ICA Commission on Cooperative Principles reasoned that “[t]he world will judge the success of Cooperation by its contribution to raising the level of human well-being as quickly as possible.”⁵

That was in 1966! Apparently, the world is still putting trust into cooperatives and their capacity to act “for sustainable development and the well-being for all”. Why else would the United Nations Organization have declared two International Years of Cooperatives within 13 years, 2012 and now, 2025?⁶

The objective of this contribution is to demonstrate what law-makers⁷ can and must do so that cooperatives may deploy their capacity to act “for sustainable development and the well-being for all”. Indeed, I shall argue that law-makers have a legal obligation to translate the cooperative principles as enshrined in the 1995 ICA Statement on the cooperative identity (ICA Statement)⁸ into law in such a way that the cooperative law meets the requirements of sustainable development, which has evolved into a legal principle. Therefore, I shall attempt in the following Part II to justify the statement that cooperative law is no longer that which the law-maker says it is, but that cooperative law is only that which is derived from the cooperative principles and from the legal principle of sustainable development. Thereafter, in Part III, I shall discuss the possible, yet complex, match between the cooperative principles, sustainable development and cooperative law. The concluding remarks (Part IV) will point out to the possible need to rethink cooperative law.

II. The obligation of law-makers to translate the cooperative principles in a sustainable development compatible way

1. The legal bases of the obligation to translate the cooperative principles

Before discussing possible legal bases of the obligation of law-makers to translate the cooperative principles into law, it is necessary to explain the meaning of the term “the cooperative

³ Watkins, W. P., *The International Co-operative Movement. Its Growth, Structure and Future Possibilities*, Manchester: Co-operative Union Ltd. 1976, 114.

⁴ Declaration concerning the aims and purposes of the ILO. Annex to the Constitution of the ILO.

⁵ Lambert, P., *The Conclusions of the Commission on Co-operative Principles Appointed by the ICA, Comment and Analysis*, in: *Annals of Public and Cooperative Economics. Annales de l'économie publique, sociale et coopérative*, April 1966, 111-120.

⁶ See, respectively, UN Doc. A/RES/64/136 and UN Doc. A/RES/78/289.

⁷ While focusing on legislators, I understand by the term “law-maker” all those who legitimately make, interpret and/or implement law. Apart from legislators also, for example, judges, cooperatives by setting statutes/bylaws et al..

⁸ available at: <https://ica.coop/en/cooperatives/cooperative-identity>

principles”. By “the cooperative principles” I understand the cooperative principles as enshrined in the ICA Statement. The ICA Statement contains a definition of cooperatives; it incorporates six cooperative values (values on which “cooperatives are based”) and four ethical values (those in which the “cooperative members believe”); and it lists and explains seven principles. Through the sentence that introduces these principles the Statement describes what it means by “the cooperative principles”, namely “[t]he [seven] cooperative principles [as listed and explained in the Statement] are guidelines by which cooperatives [as defined in the Statement] put the [six] values [on which they are based and as separated in the Statement from the four ethical values in which the members believe] into practice” (hereinafter ‘the cooperative principles’). Not only are the listed seven principles mutually regenerative, reinforcing and interdependent – as must be understood from a historical interpretation of the ICA Statement and from its current interpretation by the ICA,⁹ but three of the four parts of the ICA Statement are reciprocally linked.

There are five possible legal bases for the obligation of law-makers to translate ‘the cooperative principles’ into law, namely¹⁰

- i.) the fact that a great number of members in a great number of cooperatives identify with ‘the cooperative principles’;
- ii.) the Articles of Association of the ICA;
- iii.) the fact that laws on cooperatives include or refer to cooperative principles;
- iv.) the 2002 Promotion of Cooperatives Recommendation [No. 193] of the ILO; and
- v.) the International Covenant on Civil and Political Rights (ICCPR).

The addressees and the substance of their obligations vary with the legal basis.

ad i.): The fact that a great number of members in a great number of cooperatives identify with ‘the cooperative principles’

‘The cooperative principles’ as discussed here are the current result of almost 200 years of continued¹¹ theorized practice and practiced theory.¹² Close to one billion members of some three

⁹ Preparatory work leading to the adoption of the ICA Statement: Resolution from the ICA Board to the ICA General Assembly on “The Statement on the cooperative identity” (see especially its Point 5) and the Declaration on Cooperatives towards the 21st century” in connection with Point 3 of the Introductory comments to the principles in the Background paper to the ICA Statement on the cooperative identity, as well as MacPherson, I., Co-operative Principles for the 21st Century. All texts available in pdf format from the ICA.

Interpretation tools: Following its World Cooperative Congress in 2012, which was to celebrate the first International Year of Cooperatives, the ICA issued the “International Cooperative Alliance Blueprint for a cooperative decade 2011-2020” (available at:

[ica.coop/sites/default/files/media_items/ICA%20Blueprint%20%20Final %20version%](https://ica.coop/sites/default/files/media_items/ICA%20Blueprint%20%20Final%20version%20issued%207%20Feb%202013.pdf)

[20issued%207%20Feb%202013.pdf](https://ica.coop/sites/default/files/media_items/ICA%20Blueprint%20%20Final%20version%20issued%207%20Feb%202013.pdf)) and in 2015 the “Guidance notes to the co-operative principles” (available at: <https://ica.coop/en/media/library/the-guidance-notes-on-the-co-operative-principle>). Following its World Cooperative Congress in 2021 on the overall theme of “Deepening our Cooperative Identity” the ICA set up the Cooperative Identity Advisory Group, CIAG. It is to advise the ICA on how to deepen the cooperative identity. The work is still ongoing.

¹⁰ The order is by division between private law (i.) and public (international) law (ii.) – v.); the sequence from ii.) to v.) is from the least convincing to the most convincing argument.

¹¹ See footnote 9.

¹² While in many countries the reverse was the case, i.e. practice followed theory, the distinction between them and the countries where the sequence was as mentioned has faded. But it can at times still be traced, especially in public policies towards cooperatives.

million cooperatives worldwide,¹³ represented through the membership of the ICA, identify with them as they subscribe directly or indirectly to the Articles of Association of the ICA of which the text of the ICA Statement is a part.¹⁴ The ICA Statement is a unique case where such a large group of enterprises of the same type have formalized their principles and subscribe to them autonomously.

The question is whether this sociological fact creates a legal obligation for law-makers to translate ‘the cooperative principles’ into law. It leads to a number of further questions, such as: Should sociological facts have an influence on law-makers at all and, if so, to what extent? Is the effectiveness of law, which one may expect to rise by respecting such sociological facts, part of the law? May/must the described world-wide sociological phenomenon be taken into account also by law-makers whose law is to be applied in circumstances where this phenomenon is less relevant or even non-existent? These questions are complex and controversial general questions of legal theory and philosophy. Especially the third one relates to the inextricable link that the legal principle of sustainable development establishes between the ‘global’ and the ‘local’: The perception of national legal systems forming a mosaic of relatively independent pieces might be a matter of the past. More and more, national state laws, and by extension regional, international and transnational laws, as well as non-state laws,¹⁵ function in their processes of making, interpreting and/or applying like the threads of a weaved tapestry or the strings of a spider web.

We may put these questions aside for our purpose because we have other, less complex and controversial legal bases for the obligation of legislators to translate ‘the cooperative principles’ into law.

ad ii.): The Articles of Association of the ICA

Article 12.2 of and the Annex A to the Articles of Association of the ICA contain the text of the ICA Statement. As the ICA is an association registered under Belgian law, its articles of association are legally binding for the ICA, its members and possibly also for the members of these members.

¹³ See at: <https://ica.coop/en/cooperatives/facts-and-figures>

While the number of cooperatives represented by the membership of the ICA is rather easy to establish, this is not the case with the number of individual members as some individuals might be members of more than one cooperative. On the other hand, many countries do not allow for multiple memberships, especially when concerning cooperatives of the same type. But if one adds to the individual memberships the number of economic dependents the number of those who directly or indirectly improve at least in part their livelihood through cooperatives is considerably higher than one billion.

¹⁴ Article 12.2 of the Articles of Association of the ICA reads “All Members [of the ICA] shall expressly adhere to the Statement on the Cooperative Identity as set forth in Appendix “A” to these Articles of Association.” See at <https://www.ica.coop/en/media/library/governance-materials/ica-articles-association>) (18.6.2025).

¹⁵ Generally, lawyers confuse law with written, alterable law in the form of rules and decisions and applicable within the confines of a state. This confusion excludes from the notion of law all those laws whose production, application and/ or enforcement do not depend on an act by the state and/or whose validity is not related to the state’s territory. On the one hand, this confusion explains the limited attention lawyers pay to legal principles and practices and their reticence to apply other states’ laws. On the other hand, it excludes a series of phenomena that might qualify as law, such as religious laws based on the principle of non-alterability and personality without territorial reference, customary laws, generally based on ethnicity, laws of or in informal sectors, standards set by private actors, laws of epistemic communities, and it does not take into account possible functional equivalents of law, such as algorithms and indicators. For more details, especially as concerns the distinctions between these different types of law, see Henrÿ, H., Más allá del derecho estatal: los derechos no estatales y la efectividad del derecho cooperativo [Beyond state law: non-state laws and the effectiveness of cooperative law], forthcoming.

The substance of the obligation to abide by this part of the Articles of Association of the ICA varies with the legal type of personality of the members of the ICA: The ICA must not admit to its membership entities that do not abide by ‘the cooperative principles’. The obligation of these entities varies with their legal type.¹⁶ Some are constituted as cooperatives – their obligation consists in having statutes/byelaws that translate ‘the cooperative principles’ and they must not have members who do not respect ‘the cooperative principles’. Some members are constituted as another legal type, most often as an association – they must not have members (cooperatives or other legal types) that do not respect ‘the cooperative principles’. These obligations lead to further obligations for members of the ICA that are constituted as cooperatives or as another legal type, namely the obligation to employ their efforts to ensure that the cooperative law of the State where they are registered is aligned on ‘the cooperative principles’. Some members of the ICA are public institutions. If they are independent from the government, they must abide by ‘the cooperative principles’; if they are part of the government, the respective State must not register under its law any entities, cooperatives or other types, which are members of the ICA, unless these entities abide by ‘the cooperative principles’. As far as this concerns cooperatives, the cooperative law of the State must be aligned on ‘the cooperative principles’, as these cooperatives must also abide by that law. Alternatively, these cooperatives must be exempt from the application of the cooperative law to the extent necessary to comply with the Articles of Association of the ICA. By doing so, the State risks however having a split system comprising cooperatives that comply with the Articles of Association of the ICA, and others that do not. If, on the other hand, the law is not aligned on ‘the cooperative principles’ and the State does not exempt these entities from the application of the cooperative law, then the State violates Article 22 of the ICCPR (Right to associate) and the legal principle of the prohibition of contradictory behavior (see below at v.)).

ad iii.): The fact that laws on cooperatives include or refer to cooperative principles

The obligation of legislators to translate ‘the cooperative principles’ into law may stem from the fact that many national laws, the regional laws and regional model laws on cooperatives include ‘the cooperative principles’ in whole or in part; that some include them, but with modifications; that some refer to ‘the cooperative principles’ or only to cooperative principles; and that some include cooperative principles. These inclusions and references may constitute a source of public international law in the form of an “international custom as evidence of a general practice accepted as law” according to Article 38, 1. b. of the Statute of the International Court of Justice (Statute of the ICJ). The preliminary findings of an on-going scrutiny of some 70 laws on cooperatives¹⁷ do not show a common pattern, i.e. a “general practice”. Also, it is not clear whether legislators are driven to do what they do by the opinion that their practice is a “practice accepted as law”. This so-called *opinio iuris* is the second criterion of this source of public international law.

In addition, other laws than the laws on cooperatives and which are also to be considered as forming cooperative law, such as for example tax laws, accounting standards, labour law, competition law, more often than not do not accommodate ‘the cooperative principles’.¹⁸

¹⁶ As for the different legal types of the members of ICA see at <https://ica.coop/en/our-members/search-our-members> (visited 3.4.2025)

¹⁷ Which I am currently undertaking.

¹⁸ See Henry, H., *Quo Vadis Cooperative Law?*, in: CCIJ Report No. 72 (2014), 50-61 (in Japanese; original in English); Idem, *Reflexiones en torno al derecho cooperativo desde una perspectiva global - homenaje a Dante*

ad iv.) The 2002 Promotion of Cooperatives Recommendation [No. 193] of the International Labor Organization

Paragraph 10. (1) of the Promotion of Cooperatives Recommendation [No. 193] of the ILO (ILO R. 193) reads as follows: “Member States [of the ILO] should adopt specific legislation and regulations on cooperatives, which are guided by the cooperative values and principles set out in Paragraph 3 [of the Recommendation ...].”

Contrary to the scarce literature on the question, I continue to argue that this ILO Recommendation may be equated with a convention in the sense of Article 19 of the ILO Constitution as far as cooperative law is concerned, i.e. it is a source of public international law according to Article 38, 1. a. of the Statute of the ICJ. However, I am not convinced that the reference in Paragraph 10. (1) of the ILO R. 193 to the “values and principles set out in Paragraph 3” is a reference to ‘the cooperative principles’ as enshrined in the ICA Statement and as discussed here, despite the fact that the Annex to the ILO R. 193 lists explicitly the seven ICA Principles.

ad v.) The International Covenant on Civil and Political Rights

The obligation of legislators to translate ‘the cooperative principles’ into law can be based on Article 22. 1 of the International Covenant on Civil and Political Rights (ICCPR) in connection with the principle of the prohibition of contradictory behavior.

The ICCPR is a source of public international law according to Article 38, 1.a. of the Statute of the ICJ; the principle of the prohibition of contradictory behavior is a “general principle of law” according to Article 38, 1. c. of the Statute of the ICJ, hence it is also a source of public international law.¹⁹

Article 22.1 of the ICCPR contains the right to associate. It is a right of all persons, natural and legal, national and foreign.

The reason to opine that state legislators have a legal obligation to translate ‘the cooperative principles’ into law based on Article 22.1 of the ICCPR in connection with the principle of the prohibition of contradictory behavior is the following: If a State does not allow an entity registered under its law to join the ICA as a member, it contravenes the right to associate (Article 22. 1 of the ICCPR). If, on the other hand, it does allow such entity to join the ICA as a member, it must also allow it to comply with ‘the cooperative principles’ as these principles form part of the Articles of Association of the ICA – unless these Articles of Association were not compatible with the ordre public of the State.

If a State allows an entity registered under its law to join the ICA as a member, but does not allow it to comply with ‘the cooperative principles’, it violates the legal principle of the prohibition

Cracogna –, in: Congreso Continental de Derecho Cooperativo : San José de Costa Rica, 20 al 22 de noviembre de 2019 / compilado por Dante Cracogna. - 1a ed compendiada. - Ciudad Autónoma de Buenos Aires : Intercoop ; San José de Costa Rica : Cooperativas de las Américas, 2020. Libro digital, EPUB Archivo Digital: online ISBN 978-987-1596-59-1, 109-123. See also Villafañez Perez, I., Algunas reflexiones en torno a la necesidad de integrar la perspectiva cooperativa en el estudio y desarrollo del ordenamiento jurídico, in: H. Henry, P. Hytinkoski and T. Klén (eds.), Co-operative Studies in Education Curricula. New Forms of Learning and Teaching, Mikkeli and Seinäjoki/Finland. University of Helsinki/Ruralia Institute Publications No. 35 (2017), 54-71.

¹⁹ Literature on public international law does not explicitly recognize the principle of the prohibition of contradictory behavior as a “general principle[s] of law”, such as the principle of good faith and the principle of estoppel. As for these, see for example, Shaw, M. N., International Law. Latest edition 2017; A. Verdross/B. Simma, Universelles Völkerrecht. Theorie und Praxis [literally: Universal Ius Gentium. Theory and Praxis], 3rd ed., 2010. Another argument is to say that it is in the very nature of any legal system to function in a non-contradictory way.

of contradictory behavior. Consequently, and if the State is committed to comply with the principle of the state of law, its laws applicable to the entities wishing to join the ICA as a member must allow them to respect ‘the cooperative principles’. Alternatively, the State must exempt these entities from their application, at least to the extent necessary for these entities to be able to comply with ‘the cooperative principles’. This could, however, lead to a split between entities that comply with ‘the cooperative principles’ and others that do not.

2. The legal basis for the obligation to respect the principle of sustainable development

With its recognition of sustainable development in 1997²⁰ the ICJ has introduced sustainable development in the world of binding law. Since then, sustainable development has gradually become part and parcel of sources of law, from international and supranational conventions, treaties and court decisions to national constitutions, laws and court decisions and of the legal discourse in general.²¹ Sustainable development has become a “general principle of law” in the sense of Article 38, 1. c. of the Statute of the ICJ.

Whereas no source of public international law has yet delineated its content, other legally relevant phenomena and the literature agree that sustainable development has four aspects, namely social justice, political stability, economic security and environmental balance (biosphere balance).²² These aspects are interrelated, mutually regenerative and mutually dependent: without social justice, no political stability; without political stability, no economic security; without economic security people are not attentive to the state of the biosphere. Hence, social justice is the central

²⁰ See Case Gabčíkovo-Nagymaros Project (Hungary/Slovakia), Judgment. I.C.J. Reports 1997, Paragraph 140.

²¹ For a comprehensive account of the presence of “development”, including sustainable development, in law see P. Dann/S. Kadelbach/M. Kaltenborn (eds.), *Entwicklung und Recht. Eine systematische Einführung* [Development and Law. A Systematic Introduction], Baden-Baden: Nomos 2014; Gehne, K., *Nachhaltige Entwicklung als Rechtsprinzip* [Sustainable development as a legal principle], 2011; Glaser, *Nachhaltige Entwicklung und Demokratie* [Sustainable Development and Democracy], 2006; Voigt, *Sustainable Development as a Principle of International Law: Resolving Conflicts between Climate Measures and WTO Law*, 2008; Diepold, A., *Nachhaltigkeitsaspekte in der EGMR-Rechtsprechung* [Aspects of sustainability in the jurisdiction of the European Court of Human Rights], Tübingen: Mohr 2025; the CIRIEC Working Paper No. 2024/07 written by Frédéric Tiberghien details a panoply of policy and legal measures the French State has taken to address sustainable development issues; the contributors to Kahl (ed.), *Nachhaltigkeit durch Organisation und Verfahren* [Sustainability through organisation and procedure], Tübingen: Mohr 2016, suggest how to implement sustainable development in the German and European constitutional and administrative law.

For some, however, sustainable development is ‘only’ a (legally not binding) guiding principle of (public international) law. See, for example Goldmann, M., *Staatsverschuldung und Entwicklung* [Public debt and development], in: Dann et al. (eds.), op. cit., 377-431 (419); Marauhn, Th., *Umwelt und Entwicklung* [Environment and development], in: Dann et al. (eds.), op. cit., 433-468 (456).

For the history of the concept of sustainable development, see Gehne, op. cit.; Henrÿ, H., *Sustainable Development and Cooperative Law: Corporate Social Responsibility or Cooperative Social Responsibility?*, in: *International and Comparative Corporate Law Journal* Vol.10, Issue. 3 (2013), 58-75. Barral, V., *The Principle of Sustainable Development*, in: L. Krämer/E. Orlando (eds.), *Principles of Environmental Law*, Cheltenham: Elgar 2018, 103-114.

²² As for three aspects only, not including political stability, see, for example, the 2002 Delhi Declaration of Principles of International Law Relating to Sustainable Development of the International Law Association (ILA), Annex, which contains an elaborate definition of sustainable development. See also European Union (available at: [Earth for All Deutschland, München: Oekom 2024. As here, see Pufé, I., *Nachhaltigkeit* \[Sustainability\], München: UKV Verlag 2012; UNESCO \(\[http://www.unesco.org/education/tlsf/mods/theme_a/popups/mod04t01s03.html\]\(http://www.unesco.org/education/tlsf/mods/theme_a/popups/mod04t01s03.html\) –\). The word ‘biosphere’ is either used as a synonym for ‘nature’ or ‘environment’ or as comprising the three or four aspects of sustainable development. In this latter sense, see for example, Grinevald, J., *La Biosphère de l’Anthropocène. Climat et pétrole, la double menace. Repères transdisciplinaires* \(1824-2007\), Genève : Georg 2007.](https://ec.europa.eu/europeaid/sites/devco/files/communicatioenn-next-steps-sustainable-europe-20161122_e.)

aspect of sustainable development; hence we must look for mechanisms that regenerate social justice. The legal form of cooperatives provides us with one such mechanism. This will be discussed in what follows.

III. Matching ‘the cooperative principles’, sustainable development and cooperative law – possible, yet complex

If sustainable development has evolved into a general principle of law and if the Corporate Social Responsibility (CSR) has become a corporate social and societal legal obligation (CSSO) – which they have – and if any type of enterprise may be recognized under certain conditions by ever more jurisdictions as a social and/or solidarity economy actor, then the question is: what is it that distinguishes cooperatives from other types of enterprise? The answer is: Cooperative enterprises distinguish from other types of enterprise by what they potentially contribute to sustainable development by having to keep their form in line with ‘the cooperative principles’. This form is a function of and the mechanism through which the members of cooperatives pursue the three aspects of their objective which is to meet their common economic, social and cultural needs and aspirations. The social aspect of this objective is congruent with the central aspect of sustainable development; its pursuit is a contribution to sustainable development.

Indeed, according to the definition of cooperatives contained in the ICA Statement the cooperative members meet their needs and aspirations “[...] through a jointly-owned and democratically controlled enterprise.” This form is further specified through ‘the cooperative principles’. These crystallize in the meta-principle of member democratic participation, including control. This meta-principle permeates all parts of the ICA Statement – the definition, the values and the principles.²³ It must not be reduced to the “one member, one vote” rule of the 2nd ICA Principle.

There are, however, barriers to using member democratic participation as a means to regenerate social justice. Five are mentioned here: Firstly, members might not understand their role as co-entrepreneurs according to the definition of cooperatives. Not cooperatives, but they – the members – themselves should meet their needs through the cooperative enterprise. The members might lack time, motivation, interest (often their liability is low) and/or knowledge and know-how to participate and control. Secondly, the management might lack the necessary qualification (generally, business schools do not teach cooperative management) and/or willingness to run the cooperative according to ‘the cooperative principles’. In case of conflict the management might have to prefer the interests of the enterprise over those of the members because the business interest rule might apply. Thirdly, the management might simply pursue its own interest when the typical cooperative control risk materializes. It consists in members losing the control over other stakeholder groups in the cooperative.²⁴ Fourthly, cooperatives joining higher-level cooperative

²³ For more details see Henry, H., Cooperativas, democracia em ação [original: Cooperatives, Democracy at Work], in: Economia Social. Revista da Cooperativa António Sérgio para a Economia Social número 21, março (2024), 20 ss.. Electronic version in Portuguese and English available at: https://www.revista-es.info/numero_21.html

²⁴ These risks may arise from an information, knowledge and know-how gap between the various stakeholders within the cooperative. I.e. between

- the members and the general assembly;
- the members and the delegates (if any);
- the members/delegates (if any) and the surveillance committee (if any);

organizations according to the 6th ICA Principle need balancing their horizontal heterarchical structure with the vertical hierarchical structure of second and third tier cooperative organizations. Fifthly, implementing member democratic participation through law faces challenges due to radical structural changes of cooperatives, as well as those due to the de-organization of all enterprise types. While cooperatives of the Rochdale type continue to have their rationale and justification, new, more complex structures emerge, more complex in terms of who the stakeholders ²⁵ are (user members, non-user members, investors (users or not; members or not)), which activities cooperatives engage in (all) and who the beneficiaries of these activities are (the members only, members and non-members, only non-members, the public at large only or in addition to the members etc.). As concerns the de-organization of all enterprise types, cooperatives included, it is prompted by, respectively made possible by, the factors of globalization, i.e. digitization – the converting of information/data into digital form, digitalization – using digital technology to change ways of doing, and transferability of data – the possibility to transfer data almost instantly.

Enterprises de-organize when their own organization dissolves either by integrating organizationally into (global) horizontal and/or vertical value chains or by becoming part of networks of actors (platforms?). It is not clear how the meta principle of member democratic participation can operate in value chains when some of its elements are hierarchically structured, others heterarchically, some in a combination of both and how it can operate in networks of actors. And: how can cooperative law regulate the meta principle of member democratic participation where the laws on different types of enterprise of different legal systems meet, where the value chain leaders escape the reach of law and impose their general contract clauses on the other elements of the value chain and where algorithms gradually prevail over law.

If the perception of social justice crystallizes in law, then the question is which state's law, which law, only state laws and by extension regional, international and transnational laws or also non-state laws or indeed also algorithms?

IV. Conclusion

Enterprises mutate from organized collectives to contractual connectives. This leads to the question whether the core of the idea of cooperatives, solidarity, can only regenerate through an organized collective or whether it can also regenerate through connectives that a new type of cooperative law could and would have to institutionalize.

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- the delegates/the surveillance committee/the members (as the case may be) and the board, especially where some of the board members are not members of the cooperative;
 - the board and the administration/management, especially where managers are not themselves members of the cooperative; and between
 - the administration/management and the employees.

²⁵ “Stakeholder” being a person or entity who has a legally protected interest.

PRIORITIES FOR THE INTEGRATION OF CONSUMER COOPERATIVES OF CENTRAL AND EASTERN EUROPE INTO THE EUROPEAN COOPERATIVE MOVEMENT

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Abstract

In recent years, the European cooperative movement has demonstrated high indicators of sustainable economic development, contributing to the solution of the most acute socio-economic problems of a global nature. One of the important factors of the high competitiveness of European cooperatives has become the processes of their international integration. The subject of the study is the mechanisms, priorities and strategic directions of effective integration of consumer cooperation of Central and Eastern Europe countries into the European cooperative movement. The object of the study is European consumer cooperation. The study identifies achievements and key trends in the development of the European cooperative movement. The defining directions of collaboration of consumer cooperation with European cooperative institutions are summarized. The processes of deepening international integration among European cooperatives through the formation of international strategic unions and alliances are investigated. The main directions of development of bilateral economic relations between enterprises and organizations of consumer cooperation of the countries of Central and Eastern Europe are substantiated.

Keywords: *European cooperative movement, European integration, consumer cooperation, cooperative institutions, competitiveness*

JEL: F15, F42, L26, M21

Introduction

Despite the instability of the global economic growth and the economic recession in European countries, the European cooperative movement has demonstrated sustainable economic development in recent years. Today, there are more than 160 thousands cooperative enterprises with a total gross turnover of over 1 trillion Euros and the number of jobs over 5.4 million on the European continent. The members of European cooperatives are more than 160 million people, that is, more than 20% of the European population [3]. In modern conditions, the development of integration processes in the European cooperative sector is shifting from the level of cooperation among individual national cooperative organizations to the phase of global integration at the pan-European level. The experience of developed European countries shows that an important factor in the development of cooperative systems has been the deepening of their international integration within the European continent, including through their active participation in the activities of European cooperative institutions [2].

At the level of the European Union, the importance of cooperatives for overcoming unemployment, ensuring a high level of employment, supporting vulnerable groups of the population, forming a middle class, and strengthening the stability of national financial systems is recognized. Therefore, today all the necessary prerequisites are being created for the effective

operation of European cooperative institutions, the priority tasks of which are: lobbying the interests of the cooperative sector of the economy at the pan-European level; supporting and promoting the creation of new cooperatives; actively involving cooperative organizations in European social dialogue; disseminating cooperative ideas and values among the population and, as a result, strengthening the competitiveness of cooperation at the national and European levels [3]. Increased participation in the activities of European institutions is especially important for the countries of Central and Eastern Europe, which are currently undergoing transformation processes aimed at strengthening their competitiveness at the national and international levels.

Results obtained and discussions

As evidenced by the ranking of the largest cooperatives in the world [6], particularly high indicators of economic activity in the market of goods and services are inherent in cooperatives in the retail sector, in particular, the leaders in this area are specialized cooperatives operating in the retail sector as well as consumer cooperatives (Table 1). Analysis of statistical data proves that cooperatives are the largest players in the European retail market. Thus, consumer cooperatives operating within the EuroCoop association serve about 30 million consumers daily through their own 91 thousand points of sale, the total turnover of which exceeds 60 billion Euros [4]. Taking into account the additional total turnover of the 6 largest European cooperatives in the retail sector (over 255 billion USD), we can assert the overwhelming leadership of the cooperative sector of the economy in the European retail market (Table 1).

Table 1. Ranking of the largest cooperatives in Europe in 2023

№ 3/п	Cooperative organization	Country	Type of cooperative	Gross Revenue, billion USD
1.	ReWe Group	Germany	retail	82,03
2.	ACDLEC - E.Leclerc	France	retail	60,56
3.	Edeka Zentrale AG & Co KG	Germany	retail	51,97
4.	Coop Swiss	Switzerland	consumer	34,88
5.	Migros	Switzerland	consumer	31,66
6.	Système U	France	retail	27,17
7.	Conad	Italy	retail	20,1
8.	Coop Italia	Italy	consumer	16,91
9.	Co-operative Group Limited	Great Britain	consumer	15,34
10.	John Lewis Partnership PLC	Great Britain	retail	14,85

Source: World Cooperative Monitor 2023. URL.: <https://monitor.coop/>

An important factor in the competitiveness and efficiency of European cooperatives is the deepening of international integration within the European Union, as well as with cooperatives in Eastern and Central Europe. For example: the successful operation of the trans-Scandinavian cooperative retail network Coop Norden in 2001-2008 in the markets of Norway, Sweden, Denmark, Greenland and Estonia; the creation of a joint venture between cooperative retail networks E.Leclerc (France) and Conad (Italy); the launch in 2015 of a strategic alliance of German

and French cooperative retail networks (E.Leclerc and ReWe Group), etc. The unification of cooperatives from different European countries allows them to implement a strategy of capturing individual market niches. With such a strategy, cooperative organizations concentrate all their resources in the process of implementing business projects to achieve leadership in individual markets of goods and services. This strategy is particularly successful in the retail sector (in particular in the countries of Western and Northern Europe, the Baltics). Deepening international integration in the cooperative sector of the EU countries has resulted in increased support for cooperation and the European cooperative movement at the level of European institutions, deepening mutually beneficial cooperation between cooperative systems of the European Union countries and the countries of Central and Eastern Europe. Therefore, it is advisable for consumer cooperatives in the CEE countries to more actively establish cooperation with cooperative systems of other European countries, and to implement joint projects in the field of retail business development.

Taking into account positive foreign experience, to strengthen the competitiveness of cooperative enterprises and organizations in Central and Eastern Europe, it is extremely important for them to further integrate into the European cooperative movement through active participation in the activities of the following institutions:

- 1) The organization "Cooperatives Europe", which is a representative office of the International Cooperative Alliance (ICA) on the European continent. Among the CEE countries, the members of this influential organization are the cooperative unions of Armenia, Bulgaria, Poland, Moldova, Romania, Ukraine and the Czech Republic. This European platform of the ICA was founded in 2006 and aims to organize and create a mechanism for consultations, research and support of the cooperative movement at the pan-European level with a special emphasis on the integration of cooperative systems in a single European space. The main areas of activity of this association, whose members are 84 cooperative organizations from 33 European countries, are strengthening the cooperative identity of its members, supporting international cooperative projects as well as representing and lobbying the interests of cooperatives at the pan-European level.

- 2) European Association of Consumer Cooperatives EuroCoop. Active participants of this organization among the CEE countries are cooperative unions of Bulgaria, Estonia, Poland, Romania, Slovakia, Hungary, Ukraine and the Czech Republic. The main task of this organization is to protect the interests of its shareholders and consumers, lobby and promote the ideas and interests of consumer cooperation at the pan-European level. Promising areas of cooperation of CEE countries with this institution may be: participation in education and training programs, search for business partners among cooperative enterprises from 19 European consumer unions for the implementation of joint investment, innovation and foreign trade projects, gaining access to technical assistance programs of the European Union.

A promising direction of institutional cooperation for consumer cooperatives in the CEE countries is to join the initiative to introduce a common (unified) statute for European cooperatives. This document was adopted and approved on August 18, 2003 by the European Commission, it was approved by all cooperative unions in the EU member states and implemented into national legislation by August 18, 2006. The purpose of developing a common statute is to provide cooperatives with adequate legal instruments to facilitate their international and transnational activities. This document allows cooperatives to operate in the European space as ordinary legal

entities and to enjoy the same legal provisions and privileges as any other business entities in the European Union.

An important place in the processes of deepening the European integration of cooperative systems can be occupied by the development of cooperation between enterprises and organizations of consumer cooperation of the CEE countries. In recent years, economic ties among cooperative enterprises of the CEE countries have not been of a systemic nature and have been limited primarily to participation in the work of international cooperative institutions. Despite the existence of common economic interests, the similarity of the economic mechanism of management and business conduct, the priorities of mutually beneficial cooperation among enterprises of consumer cooperation of the CEE countries are as follows:

- development of bilateral foreign trade in goods that are in demand in the markets of CEE countries, and their promotion through cooperative wholesale and retail networks;
- implementation of programs for targeted search for business partners for specific foreign trade and investment projects, establishment of a mechanism for joint consultations in this area;
- creation and operation of joint ventures in the areas of high-tech production, procurement activities, provision of engineering, leasing and other types of services;
- mutual assistance in the reorganization and development of insurance, banking and credit cooperation systems, their integration into European banking and credit associations;
- development of tourism potential and tourism infrastructure of consumer cooperation;
- use of advanced achievements and technologies for environmental protection, joint implementation of European energy-saving technologies as well as technologies for the use of renewable energy sources, creation of a cooperative venture and consulting center for this purpose;
- assistance in solving the problems of unemployment, labor migration, restructuring of industrial and agricultural enterprises and development of entrepreneurship (in the areas of procurement and processing of agricultural raw materials) in rural areas and depressed areas of CEE countries, attracting international technical assistance grants for this purpose;
- joint participation in local cross-border cooperation projects.

Conclusions

Taking into account the positive European experience, in order to strengthen the competitiveness of cooperative enterprises and organizations of Central and Eastern Europe, it is extremely important to further integrate them into the international cooperative movement through active participation in the activities of European cooperative institutions. In modern conditions, it is necessary to more actively use the existing unity of the European cooperative movement to gain advanced experience in conducting cooperative business, finding business partners for the implementation of joint investment, innovation or foreign trade projects, as well as participating in international technical assistance projects. As a result, this will lead to strengthening the competitiveness of consumer cooperation in CEE countries by bringing it to a new level of

development while preserving its identity and becoming a guarantor of the sustainable development of each country.

References

1. BORZAGA C., MICHIE J., BLASI J. R. The Oxford Handbook of Mutual, Co-operative and Co-owned Businesses. – Oxford : Oxford University Press. 2017. 704 p. ISBN 0198828829.
2. COCOLINA C. The Power of Cooperation. – Brussels : Cooperatives Europe. 2017. 128 p.
3. Cooperatives Europe. <https://coopseurope.coop> (visited 01.06.2025).
4. EuroCoop. <https://eurocoop.coop> (visited 01.06.2025).
5. International Co-operative Alliance. <https://www.ica.coop> (visited 01.06.2025).
6. The World Co-operative Monitor: Exploring the Co-operative Economy. Report 2023. – ICA: Eurisce. 2023. 164 p.

S1

**POLICIES FOR COOPERATIVE INNOVATION, DEVELOPMENT, AND THE
ENTREPRENEURIAL ECOSYSTEM**

**POLITICI DE DEZVOLTARE INOVATIVĂ A COOPERATIVELOR ȘI ECOSISTEMUL
ANTREPRENORIAL**

TRANSFER PRICING RULES IN THE CONSUMER CO-OPERATIVE SYSTEM

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Abstract

The special tax rules on arm's length transfer pricing, an internationally recognised mechanism regulated by the OECD Transfer Pricing Guidelines for Multinational Enterprises, represent a real challenge for economic agents in the Republic of Moldova. These special rules on transfer pricing apply to both cross-border and local transactions between related persons in order to prevent tax evasion. To ensure compliance with the provisions of the tax legislation in force by consumer co-operative entities in the Republic of Moldova, several issues need to be clarified. It is necessary to determine whether consumer co-operative entities are subjects of these relationships, i.e., affiliated persons whose transactions may harm the public budget. The particularities of the functioning of the consumer co-operative system in the Republic of Moldova raise questions about the status of local transactions carried out between consumer co-operative entities that benefit from different tax regimes. Last but not least, it is important to clarify the particularities of transfer pricing in the case of the provision of services, including financial services.

Keywords: co-operatives, evasion, taxation, price, transfer

JEL: H26

Introduction

The use of transfer pricing is characteristic of multinational companies, which use this mechanism in particular to reduce tax pressure. The increase in the volume of cross-border transactions is largely driven by the growing role of multinationals in the global economy and the trend towards integration of national economies.

The need for a system of transfer pricing controls was driven by the ability of multinational companies to avoid taxation in certain jurisdictions and benefit from more favourable tax regimes or tax havens. Following the logic applied in the case of reducing the overall tax burden on groups of companies in different tax jurisdictions, such a transfer pricing mechanism has also been identified in the case of local transactions between affiliated companies benefiting from different tax regimes

Thus, transfer pricing can be used to minimise the income tax deductions to the budget in the case of controlled transactions between residents who apply different rates, have different tax bases, are residents of free economic zones, etc.

The identified risks led to the establishment of transfer pricing rules according to the arm's length principle at international level. The adoption and establishment in the Republic of Moldova

of special rules on transfer pricing according to the arm's length principle is a real challenge for domestic entities, including those in the consumer co-operative system. Although very harsh penalties have been introduced for violations of the transfer pricing provisions, many aspects of their application are unclear.

The application of the special rules on transfer pricing according to the arm's length principle should be made taking into account the objectives pursued by the application of this mechanism and international best practices in this field.

In this paper we aim to address the issue of the application of transfer pricing rules to local transactions between consumer co-operative entities, clarifying the application of the arm's length principle, including the fulfilment of criteria for establishing the subject and object of these relationships, and possible problems in some transactions.

Results obtained and discussions

1. Evolution of transfer pricing regulations

The repeated transfer pricing practices of transnational corporations have led to efforts to define and regulate the phenomenon. As the number of multinational enterprises increases, the collection of corporate income tax becomes a difficult task. To protect their tax base, countries have therefore implemented the market value principle. According to this principle, the prices charged between related parties should be the same as the prices charged between independent entities if they were trading the same products or services under the same conditions as the related parties. The first country to implement the market value principle and enact transfer pricing legislation was the USA. [2, p. 5]

As early as 1979, the OECD produced a report on the transfer pricing mechanism used by transnational corporations [1, p. 102] Based on the transfer pricing legislation of the United States, international regulations were developed by the OECD, which in 1995 published the Transfer Pricing Guidelines for Multinational Enterprises and Tax Administrations (OECD Guidelines), which have been revised several times since then. It should be noted that the OECD Guide is used in conjunction with the OECD Model Convention on Income and Capital Taxes. Although the number of OECD member countries is not very large, in 2021 more than 135 countries have agreed to use the OECD transfer pricing rules.

Documents that would unify transfer pricing rules are also being developed and updated at the UN level, in particular the United Nations Department of Economic and Social Affairs' Transfer Pricing Practical Manual for Developing Countries [11].

In the European Union, due to the integrationist processes the transfer pricing issue has become very topical, therefore the procedure was initiated to draft the Council Directive on Business in Europe: a framework for profit taxation (BEFIT) and the Council Directive on transfer pricing. The solution identified was harmonisation of tax legislation in EU member countries.

The idea of developing a common corporate tax framework in support of the internal market has always been part of the Union's history, first appearing in European Economic Community policy documents as far back as the 1960s. Although the internal market is turning 30, there are still no common rules for calculating the taxable income of companies operating in the Union. Businesses therefore have to comply with (up to) 27 different national tax systems, which means that doing business in the Union is difficult and costly for companies. [12]

These supranational regulations are mainly aimed at cross-border transactions and do not cover local transactions. At the same time, in line with the objective of transfer pricing regulation, the same rules have been applied by several countries to local transactions

2. Market value principle applied to local transactions in the Republic of Moldova

In the Republic of Moldova Special rules on the determination of transfer pricing according to the arm's length principle were introduced in the Tax Code by Law no. 356 of 29.12.2022 and entered into force on 01.01.2024. In order to ensure the implementation of transfer pricing rules in the Republic of Moldova the Ministry of Finance approved Order no. 9 of 26.01.2024. At the same time, paragraph (2) of Article 22617 of the Tax Code provides for the use of the concepts set out in the Guidelines on Transfer Pricing for Multinational Enterprises issued by the Organisation for Economic Co-operation and Development, as amended/modified and supplemented.

Transfer prices are the prices at which an enterprise transfers tangible and intangible assets or provides services to affiliated enterprises. Transfer prices are important for both taxpayers and tax administrations because they largely determine the income and expenses, and therefore the taxable profits, of associated enterprises in different tax jurisdictions. Transfer pricing issues originally arose in transactions between associated enterprises operating within the same tax jurisdiction. Domestic issues are not considered in the OECD Guide which focuses on international transfer pricing issues. [9, p. 15]

The application of transfer pricing regulations requires meeting criteria related to the **subjects and objects** of these relationships. The subjects are affiliated persons, while the objects are transactions between them.

For the purposes of the OECD Guidelines, an "affiliated enterprise" is an enterprise that fulfils the conditions set out in Article 9 paragraphs 1a and 1b of the OECD Model Tax Convention [7, p. 15] Under these conditions, two enterprises are associated if

- one of the undertakings participates directly or indirectly in the management, control or capital of the other undertaking; or
- "the same persons participate directly or indirectly in the management, control or capital" of both undertakings (i.e. both undertakings are under common control).

With the exception of the provision on "direct or indirect participation in the management, control or capital" of another enterprise, there is no specific common guidance on the determination of the related enterprise, neither in the commentary on Article 9 of the OECD Model Double Taxation Convention on taxes on income and capital, nor in the OECD Transfer Pricing Guidelines. Thus, the degree of control as a threshold for triggering transfer pricing legislation has, in fact, been left to national legislation.

Many countries apply a 50 per cent shareholding threshold as the shareholding required for "associate" status; others apply a lower threshold. However, countries with higher thresholds typically use substantive control rules as a fallback or subsidiary test. They may focus on elements other than participation, such as dependence on other group members for raw materials, distribution networks, financial and human resources, etc. For developing countries, analysing control could pose a major challenge to ensure that their transfer pricing legislation can be administered effectively. In addition, the factors identifying control should be carefully scrutinised, as the assessment of these factors requires complicated fact-finding procedures, which might differ depending on the industry sector, geographical characteristics, product cycle, etc. [11, p. 64]

The national legislation of the EU Member States differs as regards the definition of 'associated enterprises' and in particular as regards the notion of 'control', which is normally a precondition for the application of transfer pricing rules. Some Member States apply a threshold of 25 per cent shareholding, while others apply a threshold of 50 per cent shareholding when determining whether the control criterion is met. [13] As a result, companies face tax uncertainty, high tax compliance costs and litigation which create barriers to the functioning of the common market.

According to the provisions of Article 7 of the Romanian Tax Code [6] in order for a relationship with another person to qualify as a relationship with an affiliated person, it is necessary to hold, directly or indirectly, at least 25% of the voting rights or to effectively control the legal entity.

The Proposal for a Council Directive on transfer pricing provides that "associated undertaking" means a person that is affiliated to another person in any of the following ways:

- (a) a person participates in the management of another person by being in a position to exercise significant influence over the other person;
- (b) a person participates in the control of another person through an interest exceeding 25 per cent of the voting rights;
- (c) a person participates in the capital of another person through an ownership which, directly or indirectly, exceeds 25 per cent of the capital;
- (d) a person is entitled to receive 25 per cent or more of the profits of another person.

In the context of Moldova's aspirations to integrate into the European Union after the adoption of the Council Directive on transfer pricing, the provisions of the Tax Code of the Republic of Moldova should be brought in line with EU rules.

3. Application of transfer pricing rules to the consumer co-operative system

For this research, it is important to clarify whether consumer co-operative entities in the Republic of Moldova should be treated as affiliated persons that may have different tax regimes.

The Tax Code of the Republic of Moldova in Article 226¹⁷ defines affiliated persons taking into account the degree of kinship, the minimum 25% shareholding and the effective control over the legal person. A person is deemed to effectively control a legal person if it is established that, both factually and legally, he or she has the capacity to make decisions on the person's activity. [5]

The legal regime of consumer co-operation in the Republic of Moldova is established by the Law on Consumer Co-operation No.1252/2000. The consumer cooperative is a system of consumer cooperative organisations and cooperative enterprises, aimed at satisfying the needs of the members of these organisations, as well as other categories of consumers [8, 1].

In accordance with the provisions of Article 8 of the Law on Consumer Co-operation No. 1252/2000, in order to realise the principle of democracy, each co-operative member has the right to one vote in the general meeting of co-operative members, and taking into account that the minimum number of individuals for the establishment of a co-operative is 7 members, the Law on Consumer Co-operation No.1252/2000 excludes the possibility of one person holding 25% or more of the voting rights.

The effective control materialised by the decision-making capacity over the activity of the cooperative organisation or cooperative enterprise is determined by the legal provisions that grant extensive competences to the Territorial Unions and the Central Union of Consumer Cooperatives.

The analysis of art. 52 "Powers of the territorial union" and art.71 "Activity of the central union" of the Law on consumer co-operatives no. 1252/2000 allows us to conclude that the consumer co-operative entities are under the effective control of the Central Union of Consumer Co-operatives and can be qualified as affiliated persons within the meaning of art. 226¹⁷ of the Tax Code.

The subject of transfer pricing regulation is the transaction realised between related persons (controlled transaction). Transaction shall be deemed to be any sale, purchase, rendering and receipt of service, assignment, lease, loan, credit, credit, loan or any other transfer of any interest in or right to use any tangible and intangible property

National tax laws do not provide clear explanations on the application of transfer pricing rules to financial services or transactions with intangible assets.

At the same time, there are several uncertainties regarding the transfer pricing calculations. Thus, there is an obvious need for the intervention of the competent bodies with explanations in order to ensure the most uniform application of the transfer pricing regulations, to avoid distortions in the determination of relevant indicators and to eliminate some problematic aspects of the current rules. [3, p. 38]

When independent enterprises trade with each other, the terms of their business relationships are typically determined by market mechanisms. In the case of transactions between related persons, there are risks that the transactions will not be carried out on market terms. However, for local transactions between persons subject to the same tax regime, tax concerns should not arise.

The transfer pricing regime for entities in the consumer co-operative system is revealed in the case of local transactions. The Tax Code [5] defines local transactions as a transaction realised between resident taxpayers, where one or both taxpayers are residents of free economic zones/information technology parks or apply different rates and/or have different taxable base for corporate income tax.

Entities within the consumer co-operative system could benefit from different tax regimes due to the non-commercial nature of its activity.

The legal treatment of the character of cooperative organisations is ambiguous. The Law on consumer co-operatives no. 1252/2000 stipulates that a consumer cooperative organisation is a non-governmental and non-commercial organisation that carries out economic activity to satisfy the needs and interests of its members in accordance with this law and its own statute and also states in Article 18 that consumer cooperative organisations and cooperative enterprises are assimilated to the subjects of the small and medium-sized enterprise sector.

An analysis of the annual financial statements of cooperative organisations shows that they may apply different rates and/or have different tax bases for entrepreneurial income tax. The majority of cooperative organisations and cooperative enterprises apply the general tax regime, but there are also organisations that are exempt from income tax.

For example, the Central Union MOLDCOOP presents the Financial Statements of the non-commercial organisation and for the year 2024 recorded Income from economic activity in the amount of 19.75 million lei. The Union of Consumer Cooperatives of Gagauzia GAGAUZCOOP with a sales income of about 20 mln. lei recorded profit for the years 2023 and 2024, but does not reflect Income Tax Expenses. Similarly, the Consumer Cooperative from Ceadir Lunga with a sales turnover of about 16 mln. lei, although carrying out a profitable activity, did not record Income Tax Expenses in 2023 and 2024. The above-mentioned situations can be explained by the application of a different tax regime. It should be noted that in accordance with the provisions of Article 51³ of the

Tax Code co-operative educational institutions are exempted from income tax on income obtained from the direct conduct of the educational process in accordance with the Education Code. Respectively, another category of entities is identified which also benefit from different tax regime.

An analysis of the financial statements of cooperative organisations shows that they apply different tax regimes, which makes them subject to special transfer pricing rules in the case of transactions between them.

According to the tax legislation of the Republic of Moldova, in case of transactions between affiliated persons with a total value between 20 million lei and 50 million lei during a tax period, the taxpayer is obliged to prepare and submit the transfer pricing file upon the request of the State Tax Service. If, the taxpayer records and/or carries out transactions with affiliated persons with a total value during a tax period, calculated by summing up the value of transactions carried out with all affiliated persons, excluding VAT, equal to or exceeding 50 000 000 lei, he is obliged to prepare and submit the transfer pricing information and the transfer pricing file. [5]

A public information on the value of transactions between the consumer co-operative entities could not be identified, i.e. it is complicated to determine with certainty whether or not the consumer co-operative has to establish the transfer pricing file.

Gathering the information and compiling the transfer pricing file is an important administrative endeavour, involving significant costs. At the same time, failure to comply with the legal provisions may entail the risk of sanctions which are quite severe.

Eliminating the risk of penalisation for non-compliance with the special rules on transfer pricing can be achieved by bringing the consumer cooperative in line with the given rules or by removing the causes of its occurrence.

As mentioned, international practice confirms that the preparation of the transfer pricing file is a major administrative endeavour involving significant costs. In this case it is necessary to carry out a cost-benefit analysis of the use of consumer co-operative resources and to identify solutions to overcome the problems identified.

Consumer co-operative entities are subject to transfer pricing relationships because they are affiliated persons that may have different tax regimes. The application of the different tax regime by cooperative organisations, i.e. the exemption from income tax of some organisations that consider themselves non-commercial and the application of the general tax regime by other cooperative organisations, creates the preconditions for the existence of controlled local transactions. Thus, the application of a general tax regime by all consumer cooperative organisations would exclude transactions between cooperative organisations from the category of controlled transactions.

The exclusion of the non-commercial character of consumer co-operatives, a need identified and mentioned in 2012 by professors Şavga Larisa and Dandara Liliana in their paper "Visions on the regulation of consumer co-operative activity in the Republic of Moldova" [4, p. 107], nowadays takes on an additional argument.

Even if all cooperative organisations will apply the same tax regime and will not be obliged to prepare and submit the transfer pricing file, in accordance with p.36 of the MF Order no.9/2024 [10], they will be obliged to hold and submit it at the request of the State Tax Service:

- information about the taxpayer (organisational, legal and operational structure of the taxpayer; list of affiliated persons, including branches/permanent representatives and their identification data, geographical location of the affiliated persons; indication of direct and indirect affiliation relationships of the taxpayer involved in the transactions);

- information on the main outlets for deliveries;
- information about the main competitors;
- agreements/contracts related to the controlled transactions concluded;
- documents and information from the taxpayer's accounting records;
- other information, legal acts, documents on the basis of which the controlled transactions were carried out.

Conclusions

Based on the provisions of the Law on Consumer Co-operation no.1252/2000 consumer co-operative organisations are affiliated persons within the meaning of Article 226⁽¹⁷⁾ of the Tax Code. Transactions between cooperative organisations due to the use of different tax regimes become controlled transactions. Controlled transactions are subject to special rules on the determination of transfer pricing according to the arm's length principle and establishes the obligation to prepare and submit the transfer pricing file to the State Tax Service.

Gathering the information and compiling the transfer pricing file is an important administrative endeavour, involving significant costs. At the same time, failure to comply with the legal provisions may entail the risk of sanctions which are quite severe.

The risk linked to the special regulation of transfer pricing can be removed by the application of a general tax regime by all consumer cooperative organisations, with the exception of cooperative educational institutions. Against this background it is necessary to exclude the non-commercial character of consumer co-operatives from the legislation.

References

1. MATEI, G., PÎRVU, D. Preţurile de transfer în Uniunea Europeană. In: Economie teoretică şi aplicată Volumul XVIII (2011), No. 4(557), pp. 99-111
2. NEAŞCU, I., FLEAGĂ, L., Evoluţii şi tendinţe privind legislaţia preţurilor de transfer din România: este nevoie de o schimbare? In: Audit financiar, XV, Nr. 1(145)/2017, 3-20 ISSN: 1583-5812; ISSN on-line: 1844-8801
3. PALADI, V., PANUŞ, V., COJOCARU, M., Particularităţile determinării cuartilelor şi medianei în aplicarea lungimii braţului la stabilirea preţurilor de transfer. Monitorul fiscal FISC.md nr.3 (94) 2025, pag.30-38 ISSN-1857-3991
4. ŞAVGA, L., DANDARA, L.. Viziuni privind reglementarea activităţii cooperăţiei de consum din Republica Moldova. In: Analele Ştiinţifice ale Universităţii Cooperatist-Comerciale din Moldova, 2012, nr. 11, pp. 96-107. ISSN 1857-1239
5. Codul fiscal al Republicii Moldova, adoptat prin Legea nr.1163/1997.
6. Codul Fiscal (România) din 8 septembrie 2015, adoptat prin Legea nr. 227/2015. Monitorul Oficial nr. 688 din 10 septembrie 2015.(<https://legislatie.just.ro/Public/DetaliiDocument/171282>)
7. Convenţia-model a OCDE pentru evitarea dublei impuneri cu privire la impozitele pe venit şi pe capital (<https://www.oecd.org/ctp/treaties/model-tax-convention-on-income-and-on-capital-condensed-version20745419.htm>).
8. Legea cooperăţiei de consum nr.1252/2000 (Monitorul Oficial al R.Moldova nr.154-156 din 14.12.2000)
9. OCDE (2022), Ghidul OCDE – Linii directoare privind preţurile de transfer pentru întreprinderile multinaţionale şi administraţiile fiscale 2022
10. Ordinul Ministerului Finanţelor Republicii Moldova cu privire la aprobarea regulilor de implementare a preţurilor de transfer nr. 9 din 26.01.2024(Monitorul Oficial al R.Moldova nr.61-63 din 09.02.2024)
11. Practical Manual on Transfer Pricing for Developing Countries // Department of Economic & Social Affairs ST/ESA/347 // United Nations, 2013
12. Propunere de DIRECTIVĂ A CONSILIULUI privind Întreprinderile din Europa: cadru de impozitare a profitului (BEFIT) COM/2023/532 final (<https://eur-lex.europa.eu/legal-content/RO/ALL/?uri=CELEX:52023PC0532>) â
13. Propunere de DIRECTIVĂ A CONSILIULUI privind stabilirea preţurilor de transfer. COM/2023/529 final (<https://eur-lex.europa.eu/legal-content/RO/TXT/?uri=CELEX%3A52023PC0529>)

THE CONCEPT OF THE EUROPEAN COOPERATIVE SYSTEM SUSTAINABLE DEVELOPMENT

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Abstract

The authors examine the role of cooperation in achieving sustainable development within the European Union, emphasizing the integration of economic, environmental, and social policies to ensure long-term stability. Sustainable development, a concept introduced in the late 20th century, is explored through the lens of European cooperation mechanisms. Key institutions such as the European Commission, the European Parliament, and funding programs like Horizon Europe and LIFE are highlighted for their crucial roles in supporting environmental initiatives and fostering innovation.

The significance of cooperatives in promoting economic and social sustainability is also emphasized. The authors focus on agricultural and energy cooperatives in Europe, illustrating their positive impact on regional development and energy independence. Challenges facing Ukraine's cooperative sector are analyzed, particularly policy inconsistencies and limited governmental support. The potential for adopting European best practices is discussed as a pathway to strengthening Ukraine's economy.

Prospects for European cooperation are tied to deeper integration of environmental, economic, and social strategies. The authors conclude that sustainable development can only be achieved through active collaboration among states, civil society, and businesses, thereby ensuring economic resilience, social cohesion, and environmental responsibility.

Keywords: sustainable development, European cooperation, cooperatives, economic resilience, environmental sustainability

JEL: Q13, O13

Introduction

The sustainable development has become a fundamental priority for governments, businesses and civil society in the modern world. The growing interdependence of economic, environmental and social factors requires comprehensive solutions that balance economic growth, resource efficiency and social well-being. The European Union has positioned itself as a global leader in promoting sustainability through cooperative mechanisms that integrate environmental policies, economic stability and social cohesion. Given the increasing global challenges such as climate change, resource depletion and economic inequality, the need for effective cooperation has never been more critical.

Cooperation serves as a key instrument for achieving long-term sustainability by fostering partnerships between states, industries and local communities. Strong institutional frameworks, policy initiatives and cross-sector collaboration contribute to economic resilience, environmental protection and social equity. Particular emphasis is placed on the role of cooperatives in strengthening local economies, ensuring energy independence and promoting sustainable resource management. Addressing existing challenges and adopting best practices in cooperative models can

enhance the effectiveness of sustainability efforts, creating opportunities for inclusive growth and long-term stability.

Results obtained and discussions

In today's globalized world, where economic, environmental and social challenges require complex solutions, cooperation has become an essential tool for achieving a balance between economic growth, environmental protection and social justice. The European system of cooperation is based on decades of integration experience, where shared values play a key role: democracy, equality, solidarity and respect for human rights.

Sustainable development as a concept emerged in international discourse in the second half of the twentieth century, particularly after the publication of the report *Our Common Future* (1987), which defined sustainable development as development that meets the needs of the present generation without compromising the ability of future generations to meet their own needs [1]. The European Union has adopted this principle as the foundation of its policy, driving the formation of a holistic system of cooperation among member states toward ecological transformation, social integration and economic stability.

Cooperation serves not only as a form of economic interaction but also as a mechanism for supporting social initiatives, regional development and environmental protection. European countries actively exchange knowledge in the fields of green energy, waste management, sustainable agriculture and biodiversity conservation. European institutions such as the European Commission, the European Parliament and the European Council play a crucial role in coordinating joint efforts to achieve long-term sustainable development goals. Funding programs such as Horizon Europe and LIFE promote scientific research, innovation and environmental initiatives that contribute to sustainable development at regional and local levels.

The social dimension of sustainable development within the European cooperation framework involves creating conditions to reduce inequalities, support social inclusion and ensure high living standards for all citizens. The EU's cohesion policy, implemented through Structural and Investment Funds, aims to narrow the gap between more and less developed regions, create new jobs and promote local community development.

One of the key areas of sustainable development is support for cooperatives. In the European Union, cooperatives play a significant role in the economy. According to La Coop ration Agricole, there are nearly 180,000 cooperatives in Europe, employing over 4.5 million people and generating nearly \$1 trillion in annual sales. These cooperatives not only contribute to economic growth but also foster social capital and promote the sustainable development of rural areas [2].

Energy cooperatives also play a crucial role in sustainable development. In Germany, such cooperatives actively produce energy from renewable sources, enhancing environmental sustainability and energy independence. This enables communities to directly participate in energy production and consumption, fostering economic development at the local level.

In Ukraine, the development of agricultural cooperatives has been slower. As of January 1, 2022, agricultural cooperatives accounted for only 6.8 % of the total number of cooperatives in the country. There were 1,274 registered agricultural service cooperatives and 1,001 agricultural production cooperatives. One of the key obstacles to the development of cooperatives in Ukraine is the inconsistency of state policy in the field of agricultural cooperation. The lack of a clear strategy

and government support results in low motivation among farmers and rural communities to form cooperatives [3].

International experience confirms the effectiveness of cooperatives in promoting sustainable development. For example, in the United States, the Dairy Farmers of America cooperative generated gross revenue of \$17.88 billion in 2020 and employed 18,000 people [4]. This demonstrates that the cooperative model can be successful in various economic conditions.

Within the context of European integration, Ukraine has the opportunity to adopt best practices from European cooperatives to strengthen its economy and social sector. The expansion of agricultural cooperatives can enhance the competitiveness of the agricultural sector, ensure food security and support the sustainable development of rural areas. Achieving this requires the development and implementation of effective government support mechanisms, including financial incentives, educational programs and legislative initiatives.

The European system of cooperation illustrates that sustainable development is achievable only through close collaboration between states, civil society and businesses. Platforms for dialogue, partnership networks and transnational initiatives enable rapid responses to new challenges, joint problem solving and policy adaptation to meet society's actual needs. The prospects for sustainable development within the European cooperation system lie in further integrating environmental, social and economic strategies, strengthening regional cooperation and advancing digital tools for efficient resource management. The sustainable development framework of European cooperation is a key element in ensuring economic resilience, social cohesion and environmental responsibility across the continent.

Conclusions

Thus, cooperation remains a fundamental mechanism for achieving sustainable development by integrating economic, environmental and social dimensions. The European system of cooperation demonstrates the effectiveness of coordinated efforts between states, institutions and local communities in addressing global challenges such as climate change, economic disparities and resource management. The experience of the European Union highlights the importance of strong institutional frameworks, funding programs and cooperative models in fostering long-term sustainability.

In summary, cooperatives play a significant role in strengthening regional economies, enhancing energy independence and promoting social inclusion. The successful examples of agricultural and energy cooperatives in Europe confirm that collective initiatives contribute to economic resilience and environmental sustainability. At the same time, the challenges faced by Ukraine emphasize the necessity of government support, clear policy strategies and financial incentives to encourage the development of cooperative structures. Adopting European best practices can significantly improve Ukraine's economic competitiveness and social stability.

Promising directions for future research include a deeper analysis of policy mechanisms that enhance cooperative development, the role of digital technologies in optimizing resource management and the impact of transnational cooperation on sustainability outcomes. Further studies could also explore new financial instruments and legal frameworks that support cooperative growth, ensuring their long-term effectiveness in achieving sustainable development goals.

References

1. BRUNDTLAND, G. H. Our common future – Call for action. Environmental conservation. 1987. Vol. 14 (4). pp. 291-294.
2. EBRD and FAO welcome landmark Ukrainian legislation on agricultural cooperation. 2020. [online]. Available at: <https://ukraine.un.org/en/110765-ebrd-and-fao-welcome-landmark-ukrainian-legislation-agricultural-cooperation> (visited 25.02.2025)
3. KUTSYK, P., SEMIV, S., KUTSYK, V., POLIAKOVA, Y., & SHEVCHYK, B. State, Problems and Priorities of the Development of Agricultural Cooperation in Ukraine in the Context of Modern Challenges. Financial and Credit Activity Problems of Theory and Practice. 2023. Vol. 1 (48). pp. 282–297. DOI: 10.55643/fcaptp.1.48.2023.3956.
4. DFA Reports 2020 financial results. 2021. [online]. Available at: <https://dfamilk.com/newsroom/press-center/press-center-blog/march-2021/dfa-reports-2020-financial-results> (visited 25.02.2025)

THE ROLE OF QUALITY MANAGEMENT SYSTEMS IN THE TRANSITION TO A CIRCULAR ECONOMY AND SUSTAINABILITY

ROLUL SISTEMELOR DE MANAGEMENT AL CALITĂȚII ÎN TRANZIȚIA CĂTRE O ECONOMIE CIRCULARĂ ȘI SUSTENABILĂ

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Abstract

The transition to a circular economy and sustainability requires a fundamental shift in the way organizations manage resources, production, and consumption. In this context, quality management systems play a crucial role by providing a methodological framework for process optimization, waste reduction, and increased operational and economic performance.

This article explores the intersection of quality principles and circular economy principles, highlighting how the implementation of a quality management system (QMS) contributes to reducing environmental impact and optimizing resource utilization. The fundamental principles of ISO 9001, such as customer focus, continuous improvement, a process-based approach, and evidence-based decision-making, facilitate the adoption of circular practices, including sustainable design, production flow optimization, and waste management through reuse and recycling.

Furthermore, the article highlights best practice examples, where ISO 9001-certified organizations have successfully reduced waste, optimized processes, and adopted circular business models, thereby aligning with sustainable development goals (SDGs).

Keywords: circular economy, sustainability, quality management, Zero Waste, resource optimization

JEL: M19, M21, O29, O44

Introducere

În contextul actual, economia globală traversează un proces complex de transformare, determinat de limitări modelului liniar tradițional de dezvoltare, bazat pe extracția resurselor, producție, consum și eliminarea deșeurilor. Acest model, deși a susținut creșterea economică timp de secole, și-a demonstrat caracterul nesustenabil în contextul actual, marcat de rarefierea resurselor naturale, schimbările climatice și dezechilibrele socio-economice. În acest cadru, economia circulară se afirmă ca o alternativă strategică, orientată spre eficiență, regenerare și responsabilitate. Procesul de tranziție de la modelul liniar la cel circular presupune nu doar modificări tehnologice și

instituționale, ci și o schimbare profundă de paradigmă, care redefinește relația dintre economie, societate și mediu.

Astfel, procesul de trecere a modelului liniar de dezvoltare economică în modelul circular constituie una dintre cele mai semnificative transformări către o economie competitivă, durabilă și sustenabilă, cu implicații complexe asupra ecosistemelor actuale. La nivel global, cât și în Republica Moldova, această tendință este însoțită de provocări organizaționale, structurale legate de adaptarea cadrului instituțional al mediului de afaceri la noile realități economice, dar și de oportunități privind valorificarea potențialului entităților economice în contextul unor contribuții comunitare atât la nivel economic, cât și în plan social.

Scopul acestei lucrări este de a evidența și a analiza sistemele de management al calității în facilitarea tranziției către economie circulară și sustenabilă, prin identificarea modalităților prin care acestea contribuie la eficiența utilizării resurselor, la reducerea impactului asupra mediului și la crearea valorii pe termen lung. Cercetarea urmărește să demonstreze că implementarea și dezvoltarea sistemelor de management al calității reprezintă nu doar un instrument de asigurare a conformității, ci și un vector strategic pentru adoptarea principiilor circulare în organizații, sprijinind transformarea acestora într-un model economic sustenabil. Metodologia utilizată constă în analiza documentară a cadrului normativ internațional și național, a literaturii de specialitate relevante în domeniul managementului calității, economiei circulare și dezvoltării durabile.

Rezultate obținute și discuții

Tranziția către o economie circulară și sustenabilă presupune că nu doar schimbări tehnologice și de model de afaceri, ci și consolidarea unor moduri eficiente de management care să asigure mecanismul proceselor și produselor pe întregul ciclu de viață. În acest context, sistemele de management al calității (SMC) devin un instrument esențial, oferind cadrul metodologic pentru integrarea principiilor circularității în procesele organizaționale. Standardele internaționale ISO facilitează orientarea către continuarea obținerii eficienței utilizării resurselor și reducerea impactului asupra mediului, contribuind astfel la crearea de valoare sustenabilă. Implementarea SMC în sprijinul economiei circulare nu se limitează la controlul calității produselor, ci vizează întreaga cultură organizațională, promovând responsabilitatea, inovarea și colaborarea în lanțurile valorice.

Literatura de specialitate subliniază tot mai mult legătura dintre sistemele de management al calității și obiectivele economiei circulare și sustenabile.

Cele mai recente cercetări arată că SMC, în special cele aliniate la standardele ISO 9001, ISO 14001 joacă un rol determinant în sprijinirea organizațiilor pentru integrarea principiilor circularității în activități. Deseori, SMC (precum ISO 9001) sunt explorate ca vectori de integrare a principiilor dezvoltării durabile. Totodată, o analiză sistemică a factorilor determinanți, barierelor și practicilor către economia circulară scot în evidență o serie de provocări ale entităților economice în tranziția către un nou model de sustenabilitate pentru a fi profitabilă și competitivă continuu.

Mai multe studii acordă atenție SMC complementate de sisteme de mediu (ISO 14001). Se constată că sistemele de management al calității susțin procesele de mediu, relațiile cu părțile interesate, procesele din cadrul lanțului de aprovizionare [11]. În plus, examinarea implementării standardelor ISO au demonstrat ca acestea oferă noi perspective în ceea ce privește beneficiile și impactul sustenabil în materie de management al calității și mediului. Aceste perspective pot avea

un impact mai mare în sectoarele de producție și în special în textile, deoarece acest sector este cunoscut pentru degradarea mediului și practicile discutabile ale lanțului de aprovizionare. Cercetătorii Dominik Zimon, Peter Madzik și Robert Sroufe [11] au analizat măsura în care organizațiile care implementează standardele ISO 9001 sau 14001 au impact asupra managementului durabil al lanțului de aprovizionare.

Rezultatele mai multor cercetări din domeniu constată că SMC contribuie la inovație, transformarea lanțurilor valorice și crearea unor indicatori cuantificabili de progres în economia circulară. De exemplu, Zygmunt Kowalski, Joanna Kulczycka, Marcin Banach, Agnieszka Makara au dezvoltat un indicator complex de calitate pentru evaluarea sistemelor de producție la nivel micro al economiei circulare [5].

Lucrări empirice din diverse industrii (industria textilă, industria alimentară etc.) ilustrează impactul major al SMC asupra adoptării modelelor circulare. De exemplu, rolul managementului calității în context lanțului de aprovizionare în lanțurile circulare analizat de autorii Kevin Nguyen, Mohammadreza Akbari, Huy Truong Quang și Majo George [3]. În special, rezultatele cercetării arată rolul major al valorificării instrumentelor Industriei 4.0 pentru a îmbunătăți managementul calității în cadrul operațiunilor lanțului de aprovizionare circular. În plus, autorii au propus strategii care vizează atingerea obiectivelor de sustenabilitate în economiile circulare, subliniind implicațiile pentru cercetări științifice ulterioare în acest domeniu dinamic.

Pentru entitățile economice, există numeroase provocări legate de adoptarea unui sistem de management orientat spre circularitate [8]. Dincolo de acțiuni și operațiuni tactice, un sistem de management ecologic necesită management la nivel strategic. Conform studiului realizat de cercetătorii Piotr Kafel și Paweł Nowicki, un sistem de management mai circular este posibil de implementat cu succes în cadrul organizațiilor [2]. Ei au demonstrat că implementarea unui sistem de management ecologic cu o anumită direcționare către obiectivele de dezvoltare economică este o recomandare bună pentru IMM-uri. Pe baza rezultatelor obținute, este posibil să se evidențieze cerințele specifice ale standardului ISO 14001 care subliniază beneficiile implementării unui SMC.

Astfel, constatăm că sistemele de management al calității sunt relevante și au un rol important în susținerea transformării către un model economic circular, evidențiind beneficiile, provocările și direcțiile viitoare ale entităților economice.

Managementul calității și economia circulară sunt două domenii complementare, mai ales în contextul sustenabilității și eficienței operaționale. Integrarea managementului calității cu economia circulară urmărește de fapt eliminarea risipei prin optimizarea proceselor, reutilizarea resurselor și reducerea impactului asupra mediului, toate acestea fiind elemente esențiale atât pentru calitate, cât și pentru sustenabilitate. Economia circulară propune un sistem în care materialele și produsele sunt refolosite, reciclate și valorificate pentru a minimiza deșeurile și a reduce consumul de resurse [8]. Managementul calității asigură că procesele sunt eficiente, sustenabile și conforme cu standardele ridicate, prevenind defectele și pierderile. Combinarea dintre cele două perspective pune accent pe optimizarea fluxurilor de producție, reducerea erorilor și reproiectarea produselor pentru o reutilizare maximă.

Un instrument al managementului calității în tranziția către economia circulară, abordat și analizat în literatura de specialitate este modelul Zero Deșeuri [1, 5, 10]. Înțelegerea economiei circulare ca un model care vizează zero deșeuri este susținută de diverse inițiative. Deși nu există o definiție unică atribuită unui singur autor care să descrie economia circulară exact ca un model cu zero deșeuri, mai multe organizații și documente oficiale subliniază această abordare. De exemplu,

în 2014, Comisia Europeană a publicat comunicarea intitulată „Spre o economie circulară: un program „deșeuri zero” pentru Europa”, evidențiind obiectivul de a minimiza deșeurile în cadrul acestui model economic [12].

Zero Deșeuri este o abordare sistemică care urmărește eliminarea completă a deșeurilor printr-o utilizare eficientă a resurselor, implementarea economiei circulare și optimizarea proceselor de producție și consum [13]. Ceea ce caracterizează acest concept este:

- prevenirea generării deșeurilor încă din faza de proiectare a produselor;
- reciclarea și re folosirea materialelor pentru a menține resursele în circuitul economic;
- optimizarea proceselor de producție pentru reducerea risipei și a impactului ecologic;
- schimbarea comportamentului consumatorilor prin educație și politici de reducere a consumului inutil;
- adoptarea unui design sustenabil pentru produse și ambalaje, astfel încât să fie ușor de reciclat sau reutilizat.

În domeniul gestionării deșeurilor și sustenabilității, deși nu există o definiție unică acceptată la nivel global, mai multe instituții au formulat descrieri relevante, subliniind importanța reproiectării ciclurilor de viață ale resurselor pentru a elimina deșeurile, integrând astfel principiile economiei circulare și ale sustenabilității în procesele de producție și consum. De exemplu, considerăm relevantă descrierea dată de rețeaua europeană Zero Waste Europe care descrie modelul Zero Deșeuri ca „un obiectiv etic, economic, eficient și vizionar, menit să ghideze oamenii în schimbarea stilului de viață și a practicilor pentru a imita ciclurile naturale sustenabile, unde toate materialele aruncate sunt proiectate să devină resurse pentru altele.” [13]

Zero Deșeuri poate fi considerat atât un principiu, cât și un model de management, în funcție de contextul în care este aplicat. Ca principiu, Zero Deșeuri reprezintă o abordare de reducere a risipei prin prevenirea generării deșeurilor, reutilizarea resurselor și optimizarea proceselor. Ideea este că orice material poate fi reintegrat în economie, în loc să ajungă în gropile de gunoi sau să fie incinerat. Ca model de management, Zero Deșeuri este o strategie aplicată în organizații pentru a elimina risipa prin reproiectarea proceselor, utilizarea eficientă a resurselor și adoptarea unor practici sustenabile. Acest model este adesea integrat în economia circulară și managementul calității pentru a îmbunătăți performanța ecologică și economică a unei companii. Prin promovarea principiilor fundamentale ale economiei circulare: eliminarea deșeurilor și a poluării, menținerea produselor și materialelor în uz și regenerarea sistemelor naturale, modelul Zero Deșeuri se evidențiază ca strategie de management al calității pentru o economie circulară eficientă. În plus, modelul Zero deșeuri combină cele două perspective – SMC și economie circulară – punând accent pe optimizarea fluxurilor de producție, reducerea erorilor și reproiectarea produselor pentru o reutilizare maximă.

Eliminarea completă a deșeurilor printr-o utilizare eficientă a resurselor, implementarea economiei circulare și optimizarea proceselor de producție și consum este o abordare sistemică care evidențiază contribuția majoră și esențială a managementului organizației, a sistemelor de management cu orientare spre sustenabilitate [1, 6, 10]. Entitățile economice care implementează sisteme de management al calității conform standardelor ISO au deja capacitatea și potențialul de a își adapta strategiile și procesele pentru a integra principiile economiei circulare. Argumentarea în favoarea acestei afirmații este și aplicarea principiilor de management al calității care ajută continuu organizațiile să îmbunătățească performanța, satisfacția clienților și eficiența proceselor. Vom

evidenția principiile managementului calității, efectele implementării în cadrul entităților economice și interconexiunea cu economia circulară:

1. **Orientarea către client** - organizațiile înțeleg nevoile și așteptările clienților, obiectivul principal este creșterea satisfacției clienților prin livrarea de produse și servicii de calitate, se bazează pe analiza feedback-ului și îmbunătățirea continuă a produselor/serviciilor. Astfel, acestea oferă produse sustenabile, cu durată de viață mai lungă, design ecologic și reduc impactul asupra mediului.

2. **Leadership** - liderii stabilesc direcția strategică și implică angajații în atingerea obiectivelor de calitate, se pune accent pe o cultură organizațională bazată pe îmbunătățirea continuă și inovație, responsabilitatea pentru calitate este distribuită la toate nivelurile organizației. Astfel, entitățile economice iau decizii strategice pentru implementarea economiei circulare, realizează investiții în procese sustenabile și reducerea deșeurilor.

3. **Implicarea personalului** - angajații sunt esențiali în menținerea și îmbunătățirea calității, sunt organizate traininguri pentru dezvoltarea competențelor și înțelegerea proceselor, este creat un mediu de lucru motivant și favorabil inovației. Astfel, entitățile economice care implementează sisteme de management al calității are loc formarea angajaților în principiile economiei circulare, este creată o cultură organizațională bazate pe sustenabilitate.

4. **Abordarea procesuală** – ce înseamnă ca calitatea este integrată în toate procesele, de la aprovizionare la livrarea produselor/serviciilor, sunt analizate și optimizate proceselor pentru maximizarea eficienței, are loc monitorizarea și controlul proceselor pentru reducerea defectelor.

5. **Îmbunătățirea continuă** - organizațiile implementează un sistem de îmbunătățire constantă a calității, are loc analiza datelor, feedback cu clienții. Legătura cu economia circulară - optimizarea proceselor pentru reducerea deșeurilor (Zero deșeuri), se implementează un sistem de reciclare și refolosire a materialelor.

6. **Luarea deciziilor pe bază de dovezi** - deciziile se bazează pe date concrete, se utilizează indicatori de performanță și analize statistice pentru a evalua calitatea, se monitorizează eficiența proceselor și impactul asupra mediului. Astfel, legătura evidentă cu economia circulară se constată prin utilizarea indicatorilor de sustenabilitate (ex. amprenta/emisia de carbon, rata de reciclare) și adoptarea deciziilor se bazează pe analiza ciclului de viață al produselor.

7. **Managementul relațiilor cu părțile interesate** – ce presupune nemijlocit colaborarea cu furnizori, clienți și alte părți interesate pentru a îmbunătăți calitatea, construirea unor relații sustenabile și pe termen lung. Aceasta permite crearea unui lanț de aprovizionare circular, bazat pe furnizori sustenabili, parteneriate pentru reciclare și reutilizare.

Standardele ISO, în special ISO 9001 (managementul calității) și ISO 14001 (managementul de mediu) oferă un cadru solid pentru această tranziție [9, 11]. Pentru integrarea economiei circulare în sistemele de management al calității considerăm oportun parcurgerea următorilor pași esențiali:

Pasul 1. Adoptarea unui design sustenabil pentru produse și procese

- Redesign-ul produselor pentru a fi reutilizabile, reparabile sau reciclabile.
- Utilizarea materialelor regenerabile și a celor cu conținut reciclat.
- Reducerea consumului de resurse naturale în procesul de producție.

Pasul 2. Optimizarea utilizării resurselor și eficiența proceselor

- Implementarea principiului de eficiență energetică și reducerea consumului de energie.
- Reducerea risipei prin aplicarea principiului Zero Deșeuri și utilizarea materiilor prime alternative.

- Crearea unui sistem de recuperare și re folosire a materialelor la sfârșitul ciclului de viață al produselor.

Pasul 3. Gestionarea eficientă a deșeurilor și tranziția spre Zero Deșeuri

- Implementarea ISO 14001 pentru managementul deșeurilor și prevenirea poluării.
- Adoptarea economiei circulare prin reciclare și refabricare a produselor în loc de eliminare.
- Dezvoltarea unor lanțuri de aprovizionare sustenabile cu furnizori care respectă economia circulară.

Pasul 4. Crearea unui lanț de aprovizionare circular și sustenabil

- Selectarea furnizorilor care aplică standardele economiei circulare.
- Adoptarea unor modele de afaceri bazate pe reutilizare, leasing sau recondiționare.
- Utilizarea tehnologiilor digitale pentru trasabilitatea materialelor și a produselor reciclate.

Pasul 5. Implementarea unui sistem de monitorizare și îmbunătățire continuă

- Aplicarea ISO 9001 pentru monitorizarea performanței și a impactului asupra mediului.
- Integrarea indicatorilor de performanță circulară (ex. rata de reciclare, reducerea amprentei/emisiei de carbon).
- Formarea angajaților în principiile economiei circulare și integrarea acestora în cultura organizațională.

Într-o organizație certificată ISO, după cum demonstrează rezultatele studiilor multor cercetători, rezultate așteptate ale implementării economiei circulare vor fi:

- reducerea costurilor prin reutilizarea materiilor prime și a resurselor,
- creșterea eficienței operaționale și reducerea pierderilor,
- îmbunătățirea reputației companiei și creșterea atractivității pentru investitori,
- obținerea unor certificări suplimentare care adaugă valoare brandului,
- creșterea conformității cu reglementările de mediu și prevenirea riscurilor legale.

Astfel, pentru a realiza principiile economiei circulare, organizațiile care implementează ISO 9001 și ISO 14001 trebuie să adopte design sustenabil, eficiență energetică, reducerea deșeurilor și colaborare cu parteneri circulari. Aceste măsuri vor contribui la **creșterea competitivității, reducerea costurilor și îmbunătățirea sustenabilității** afacerii.

Concluzii

Economia circulară și managementul calității sunt două domenii complementare, mai ales în contextul sustenabilității și eficienței operaționale. Organizațiile care implementează SMC sunt mai pregătite să adopte modele de afaceri circulare.

Principiile fundamentale ale ISO 9001, precum orientarea către client, îmbunătățirea continuă, abordarea procesuală și luarea deciziilor bazate pe dovezi, facilitează adoptarea unor practici circulare, precum design-ul sustenabil, optimizarea fluxurilor de producție și gestionarea deșeurilor prin reutilizare și reciclare.

Un model eficient de implementare a economiei circulare într-o companie certificată ISO presupune optimizarea proceselor, reutilizarea materialelor, gestionarea eficientă a deșeurilor și implementarea tehnologiilor sustenabile. Integrarea acestui model nu doar că reduce impactul asupra mediului, dar oferă și avantaje economice și competitive companiei. Exemple de bune practici, au demonstrat că entitățile economice certificare ISO 9001 au reușit să reducă deșeurile, să

optimizeze procesele și să adopte modele de afaceri circulare, aliniindu-se astfel la obiectivele de dezvoltare durabilă.

Integrarea ISO 9001 în strategia de economie circulară reprezintă o oportunitate strategică pentru companii de a îmbunătăți performanța calității, de a reduce impactul ecologic și de a rămâne competitive într-un mediu economic din ce în ce mai axat pe sustenabilitate.

În plus, implementarea modelului Zero Deșeurii este o alegere excelentă pentru integrarea managementului calității cu economia circulară. Acest model urmărește eliminarea risipei prin optimizarea proceselor, reutilizarea resurselor și reducerea impactului asupra mediului, toate acestea fiind elemente esențiale atât pentru calitate, cât și pentru sustenabilitate.

În contextul implicațiilor manageriale, o cale importantă de acțiune pentru entitățile economice mici, mijlocii sau mari, este faptul că, din moment ce au sistemele ISO 9001, ISO 14001 implementate, funcționale și certificate, merită să se intereseze și să inițieze treptat cerințele de implementare a regulilor economiei circulare, ceea ce va aduce rezultatele și profiturile așteptate pe termen lung. Cu siguranță, implementarea și dezvoltarea sistemelor de management al calității nu constituie doar un instrument de asigurare a conformității, ci și a un vector strategic pentru adoptarea principiilor circulare în organizații, sprijinind transformarea acestora într-un model economic sustenabil.

Referințe bibliografice

1. JURAN, J. (trad. de Dan Bălănescu) Supremația prin calitate: manualul directorului de firmă. București: Editura Teora, 2002. 278 p. ISBN 973-601-965-9.
2. KAFEL, P., NOWICKI, P.. Circular Economy Implementation Based on ISO 14001 within SME Organization: How to Do It Best?. In: Sustainability 15, no. 1 (2023): 496. <https://doi.org/10.3390/su15010496>
<https://www.mdpi.com/2071-1050/15/1/496>
3. NGUYEN, K., AKBARI, M., QUANG, H. T., MAJO, G. . Forging Pathways to Circular Economy Excellence: Integrating Industry 4.0 with Quality Management. In: Sustainability 2024, 16(7), 3053; <https://doi.org/10.3390/su16073053>. Disponibil la: https://www.researchgate.net/publication/379657311_Forging_Pathways_to_Circular_Economy_Excellence_Integrating_Industry_40_with_Quality_Management
4. KIRCHHERR, J.; REIKE, D.; HEKKERT, M. Conceptualizing the circular economy: An analysis of 114 definitions. Resources, conservation and recycling. 2017, 127, 221–232.
5. KOWALSKI, Z., KULCZYCKA, J., BANACH, M. , Agnieszka Makara, 2023. A Complex Circular-Economy Quality Indicator for Assessing Production Systems at the Micro Level, Sustainability, MDPI, vol. 15(18), pp. 1-16
6. LIVITCHI, O. Integration of quality, customer satisfaction, and management in the provision of tourism services. In: Journal of Research on Trade, Management and Economic Development. 2024, issue 1 (vol. 21), pp. 94-104. ISSN 2345-1424 – print edition, ISSN 2345-1483 – online edition. Disponibil la: <http://jrtmed.uccm.md/index.php/en/archive?layout=edit&id=112>
7. OLARU, M. (coord.) Tehnici și instrumente utilizate în managementul calității. București: Editura Economică, 2000, 520 p. ISBN 973-590-256-7. 14. PARASCHIVESCU, A. O. Managementul calității (ed. a 4-a). Iași: Editura Tehnopress, 2020. 200 p. ISBN 978-606-687-437-3.
8. RIZOS, V.; BEHRENS, A.; KAFYEKE, T.; HIRSCHNITZ-GARBERS, M.; IOANNOU, A. The Circular Economy: Barriers and Opportunities for SMEs; CEPS: Brussels, Belgium, 2015. Disponibil la: https://repository.pnb.ac.id/id/eprint/4671/1/e3sconf_iscmee2021_01017.pdf
9. RIZOS, V.; BEHRENS, A.; VAN DER GAAST, W.; HOFTAM, E.; etc.. Implementation of circular economy business models by small and medium-sized enterprises (SMEs): Barriers and enablers. Sustainability 2016, 8, 1212.
10. SINISI, C.-I. Integrarea managementului calității, strategiei și inovării în spațiul economic. București: Editura Economică, 2020. 537 p. ISBN 973-795-638-9. 20. STANCIU, I. Managementul calității totale. București: Editura Cartea Universitară, 2003. 537 p. ISBN 973795-638-9
11. ZIMON, Dominik, MADZIK, P., SROUTE, R. 2020 The Influence of ISO 9001 & ISO 14001 on Sustainable Supply Chain Management in the Textile Industry .

12. Comunicatul Comisiei Europene Spre o economie circulară: un program „deșeuri zero” pentru Europa. Disponibil la: https://eur-lex.europa.eu/resource.html?uri=cellar:50edd1fd-01ec-11e4-831f-01aa75ed71a1.0008.01/DOC_1&format=PDF
13. Conceptul „Zero Deșeuri”. Alianța Zero Waste Europe. Disponibil: <https://zerowasteurope.eu/about/about-zero-waste/>

WAYS TO ENGAGE LOCAL COMMUNITIES IN TOURISM INITIATIVES THROUGH COOPERATIVE MODELS

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Abstract

Involving local communities in tourism initiatives through cooperative models is a vital tool for sustainable regional development. Shared ownership, democratic governance, and fair income distribution enable residents to create unique tourism products that reflect the cultural and natural characteristics of their area. Cooperatives not only increase employment and income but also foster a responsible attitude toward environmental preservation, making the region more attractive to environmentally conscious tourists. Collective action promotes social cohesion and empowers the community by supporting infrastructure projects and organising educational and cultural events. Through open dialogue and the exchange of ideas, local cooperatives quickly adapt to market changes and find creative solutions to attract tourists. This approach harmonizes the interests of the community and visitors, creating a space for interaction, cultural exchange, and sustainable prosperity in the region.

Keywords: cooperative models, local communities, sustainable tourism, economic development, environmental responsibility, social cohesion

JEL: Q01, R11, P13, Z32

Introduction

The involvement of local communities in tourism initiatives is an important aspect of sustainable regional development, as active participation of residents contributes not only to the preservation of cultural heritage but also to economic growth. Cooperative models are becoming an effective tool for joining forces and creating a common good, where each participant has the opportunity to influence decision-making and benefit from tourism activities [1].

The co-operative approach is based on the principles of common ownership, democratic governance and fair distribution of income. Local residents, uniting in cooperatives, can create tourism products that reflect the unique features of the region – from guided tours along unspoiled nature trails to organising gastronomic festivals where guests can taste traditional dishes. Through collective efforts, communities can improve the quality of tourism services, providing an authentic experience for visitors. Involving communities in tourism initiatives helps to develop local entrepreneurship. Producers of handicrafts, farmers and folk artists are able to access a wider market, which increases the welfare of the population. An important aspect of the successful implementation of the co-operative approach is the training and professional development of participants. Training in hospitality, marketing and sustainable development enables local people to effectively manage tourism resources and adapt to market needs. In addition to economic benefits, this approach helps to strengthen social cohesion and foster a responsible attitude towards the

environment. Community participation in the creation of tourism products motivates the preservation of natural and cultural resources, as they become the basis of local identity and tourist attractiveness of the region.

Results obtained and discussions

According to the International Co-operative Alliance (ICA), more than 12 % of the world's population is a member of a co-operative, and co-operative enterprises provide jobs for more than 280 million people [2]. In the tourism sector, co-operatives promote the involvement of local people in business management, which increases employment and income in the regions. Cooperative models also promote social cohesion. Working together to develop tourism creates a sense of responsibility for the preservation of natural resources and cultural sites. This, in turn, encourages communities to implement environmental initiatives such as waste sorting, the use of renewable energy or the development of eco-trails. Tourists, observing the concern of local residents for the environment, become more aware and involved in supporting such practices.

According to the report by the World Tourism Organisation (UN Tourism), 73 % of tourists worldwide prefer destinations and accommodations that actively implement environmental and social initiatives [3]. This indicates that tourists are becoming more conscious and willing to support communities that work on the principles of sustainable development. In addition, cooperatives can act as a catalyst for the development of new forms of tourism, such as rural tourism, agritourism, ecotourism or cultural and educational routes. This helps to expand the tourism opportunities in the regions, reduce seasonality and distribute visitor flows more evenly.

Thanks to their open and democratic structure, cooperatives ensure that all members participate in decision-making, which helps to take into account the interests of a wide range of stakeholders. In the tourism sector, this means that the development of routes, infrastructure, and services takes into account the needs of both tourists and the local population. This approach not only improves the quality of the tourism product but also helps build trust between local residents and visitors, which is an important prerequisite for sustainable development. In addition, cooperatives contribute to strengthening the economic resilience of regions by reinvesting profits in local initiatives and infrastructure. This may include the development of local crafts, support for youth entrepreneurship, or improving transport accessibility. This model has a multiplier effect: it increases the well-being of local communities, improves the quality of tourism services, and enhances the attractiveness of the region as a whole. In the long term, a cooperative approach to tourism can be an important tool for achieving sustainable development goals, including poverty reduction, promoting equality and protecting the environment.

Taking into account the growing popularity of responsible tourism, cooperative enterprises can become key players in shaping new industry standards. Their activities promote a harmonious combination of economic, social and environmental aspects, which is in line with global sustainability trends and provides long-term benefits for both local communities and tourists. Successful co-operative models help create new jobs, reduce migration and strengthen local economies. By managing resources sustainably and preserving the authenticity of local traditions, communities can not only provide themselves with a stable income, but also attract investors and partners for further development. Cooperatives often prove to be more flexible in implementing innovative approaches to the organisation of tourism services, in particular through the integration

of digital technologies, eco-friendly transport or green certification. This allows them not only to improve the quality of service, but also to strengthen the trust of tourists, who are increasingly choosing ethical and responsible forms of travel. Thanks to the participation of local residents in management processes, cooperatives can respond quickly to the challenges and needs of the region, making them an effective tool for the sustainable development of tourist destinations.

The financial stability provided by cooperative projects allows communities to invest in their own development. The funds generated by tourism can be used to improve infrastructure, educational programmes, or cultural events, further increasing the attractiveness of the region. For example, in Costa Rica, cooperative ecotourism initiatives have increased local community income by 40 % over the past 10 years through the development of rural tourism and the conservation of natural resources [4]. This approach has worked effectively in other countries as well. For example, in Spain, the cooperative agritourism model has allowed small villages to withstand economic decline by turning local farms into tourist attractions. This experience confirms that the financial stability of cooperative projects is a key factor for the long-term prosperity of regions that rely on sustainable development.

Effective communication among participants is a key factor in the success of cooperative models. Regular meetings, strategy discussions and joint planning allow for quick adaptation to changes in the tourism environment. An open dialogue facilitates the exchange of ideas and experiences, which allows for creative solutions to develop tourism initiatives. For example, cooperation with local artisans can lead to the creation of souvenir products, which will become another source of income for the community. Effective communication helps to build trust among cooperative members, which is key to long-term success. A clear division of roles and responsibilities avoids misunderstandings and ensures that all participants work together. It is also important to use modern digital tools, such as online platforms and social media, to quickly exchange information and promote joint tourism products.

In addition to internal communication, it is also important to involve local residents and partners in discussing tourism development prospects. This helps to create a positive image of the region and attract investors and tourists. For example, organising themed festivals, excursions or workshops with the participation of local residents allows you to create an authentic tourist experience that makes a given location stand out from the rest. Thus, openness to dialogue, joint planning and active interaction between all stakeholders contribute to the sustainable development of cooperative tourism initiatives, increasing their competitiveness in the market.

Conclusions

Co-operative models in tourism play an important role in ensuring sustainable development of regions by promoting economic growth, social cohesion and environmental responsibility. They not only create jobs and increase local incomes, but also contribute to the preservation of natural and cultural resources. Through effective communication and cooperation with the community, cooperatives can adapt to changes, develop new tourist destinations, attract investors and improve infrastructure. Experience from different countries shows that the financial stability of cooperative projects is a key factor in their long-term success, and responsible tourism is becoming increasingly attractive to travellers around the world. Engaging local communities in tourism initiatives through cooperative models is a powerful tool for sustainable regional development. It not only strengthens the economic foundation of communities, but also helps to preserve cultural identity, build

environmental awareness and strengthen social cohesion. This approach combines the interests of locals and tourists, creating a harmonious space for interaction, enrichment and shared prosperity.

References

1. Developing Local Communities through Sustainable Tourism Development Roadmap. Executive Summary. 2024. [online]. Available at: <https://www.wta-web.org/wp-content/uploads/2024/11/Developing-Local-Communities-through-Sustainable-Tourism-Development-Roadmap.pdf> (visited 24.02.2025).
2. International Cooperative Alliance. Facts and Figures. 2025. [online]. Available at: <https://ica.coop/en/cooperatives/facts-and-figures> (visited 28.02.2025).
3. The Growth of Sustainability in Hotels: an Industry in Transformation. February 17, 2025. [online]. Available at: <https://en.roiback.com/rb-academy/the-growth-of-sustainability-in-hotels> (visited 04.03.2025).
4. MILLER, A. B., COX, C., MORSE, W. C. Ecotourism, Wildlife Conservation, and Agriculture in Costa Rica through a Social-Ecological Systems Lens. *Frontiers in Sustainable Tourism*. 2023, Vol. 2. Available at: <https://doi.org/10.3389/frsut.2023.1179887>.

DEVELOPMENT OF THE REGIONAL ECONOMY THROUGH ECONOMIC CLUSTERS

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Abstract

Clusterization of the economy is becoming an important tool of regional development. The formation and expansion of clusters facilitate economic specialization, innovation, and increased competitiveness of regional markets. Clusters contribute to the integration of enterprises, research institutions, and governmental organizations, creating synergies that enhance productivity and sustainable economic growth. The article considers the essence of clusters, analyzes various approaches to the cluster's classification, cluster's characteristic features that contribute to the dynamic development of regional economies. The relevance of this issue is due to the need to find effective tools for managing sustainable regional development, which can be achieved through the rational clustering of economic activity.

Keywords: clusters, clustering, region, sustainable development, classification metrics, productivity

JEL: A1, M2, M3

Introduction

The cross-disciplinary perspective on the cluster concept has led to its widespread integration in economics, where it designates a set of interconnected enterprises brought together on

the basis of territorial proximity and common economic activities. In economics, the term cluster came into widespread use in the late 20th century, associated with industrial groups characterized by common flows of resources, capital and information, which generate competitive advantages for the participants.

Results and discussion

Cluster is one of the fundamental concepts, which refers to a set of industrial enterprises and organizations connected by financial, material and informational networks. These structures also include specialized institutions (such as marketing and consulting) that support integration and collaboration between companies operating in the same economic sector. From our point of view, this term is often used in the analysis of industrial development, its applicability depends on the economic context. In most cases, the main actors of the cluster are industrial enterprises, which makes the term industrial cluster appropriate in this analytical framework.

Another model is represented by production clusters, which are vertically integrated agglomerations of enterprises aiming at common economic development. These clusters are “characterized by a high degree of cooperation, which makes it possible to reduce production costs, optimize resources and increase the competitiveness of the products produced” [1, p. 283].

In a complementary approach, territorial-industrial clusters are networks of technologically interconnected enterprises located in close proximity, which generate additional economic effects through the use of common resources and infrastructure. These structures allow an efficient exploitation of productive forces and help to increase synergies between economic actors, with a direct impact on regional economic development.

Therefore, the concept of the economic cluster has evolved to reflect different models of organizing economic activities, each of which plays a key role in increasing the competitiveness and sustainable development of local and national economies.

According to Michael Porter, a distinguishing feature of these economic clusters, compared to traditional clusters, is the absence of competition between participating companies [6, p. 16]. However, there are a number of common elements between these economic structures, including:

- The process of economic integration, defined by combining industries, interconnectivity and complementarity;
- Territorial unitarity, reflecting the geographical proximity of economic entities;
- Achieving economies of scale, by reducing production costs and increasing economic efficiency.
- In the specialized literature, different models of organization of territorially oriented economic entities are attributed to well-known economists such as:
 - A. Marshall, who introduced the concept of industrial regions, highlighting the advantages of locating firms in optimal economic proximity [3, p. 213];
 - P. Perroux, who founded the theory of growth centers, emphasizing the impact of the concentration of economic activities on regional development [5, p. 83];
 - J.A. Tolenado and D. Solier, who developed the concepts of technological growth sectors, analyzing the interdependencies between innovation and industrial dynamics [10, p. 149].

The examination of several methods for classifying clusters reveals that manufacturing-related scientific publications consider a broad variety of factors and standards, which are used to classify business clusters into uniform groups. As a result, a set of criteria for classifying enterprise clusters may be structured. This framework is shown in Figure 1 and illustrates the typological diversity of clusters based on their technological, economic, and territorial attributes.

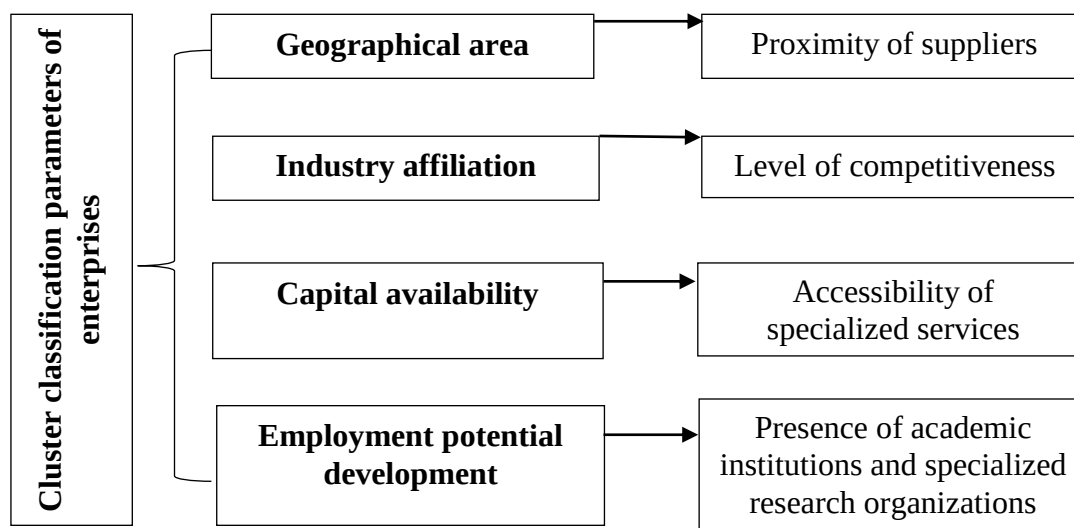


Figure 1. Categorization parameters of enterprise clusters

Source: Developed by the authors according to [3, 5, 10]

The clustering process itself is regarded as a market mechanism for the qualitative transformation of regional economic systems, and the clusters' distinctive features in the production organization process support the dynamic growth of regional economies (Table 1).

Table 1. Main characteristic features of clusters

Nb	Characteristic features	Indicators	Notes
1	Availability of competitive enterprises	Efficiency of cluster enterprise performance. Activity level of enterprises. Production profitability. Volume of imports and exports.	Relatively high productivity levels of cluster enterprises and industries, a significant export volume of products and services, together with high economic performance of enterprises, such as profitability and shareholder value, are relevant indicators of their competitiveness.
2	Regional competitive advantages for cluster	Investment attractiveness. Volume of investment, including foreign direct investment.	High level of foreign investment attracted to the companies or sectors included in the cluster highlights their competitiveness and economic attractiveness.
3	Private sector leadership	Programs to support cluster development (state, regional and municipal) initiatives that are open and independent of the political	The legislative and executive authorities are actively involved in the clustering process, helping to create a stable framework for economic development. Clustering policy must also remain

		orientations of the governing parties or administrations.	coherent and predictable so that personnel changes in the authorities' administration do not affect the cluster development strategy and directions.
4	Extensive involvement of cluster members and partner institutions	The institutions and the number of companies representing the cluster give a clear picture of the composition and diversity of economic actors within the cluster.	Entrepreneurs who are not actively involved in cluster development have less reason to criticize or object to the recommendations, as they are not directly affected by the strategies and initiatives implemented. However, involving as many members as possible in the clustering process contributes to greater transparency, collaboration and acceptance of economic policies.
5	Geographic concentration and proximity	Indicators characterizing a high level of specialization of the region	Cluster members are in geographical proximity to each other and actively engage with each other.
6	Export oriented cluster products	Net exports of cluster products	The higher the proportion of the cluster's production that is export-oriented, the greater its ability to compete globally, with operational efficiency, innovation and adaptability to external market requirements.
7	The presence of a "critical mass" and the enrollment of a high number of participants	Indicators characterizing a high level of employment in the cluster enterprises and sectors reflect the cluster's ability to create sustainable jobs and attract skilled labour.	These indicators include: number of businesses that belong to the cluster's economic sectors; variety of business sizes; representatives from every market segment present; steady expansion of the cluster's workforce; the extent to which businesses are incorporated into regional and global value chains.
8	Connections and interaction between cluster members	The number of projects implemented under public-private partnerships represents the level of public-private cooperation in cluster development.	Interaction between SMEs aims to promote goods and services in both existing and emerging markets.
9	Competition within the cluster members	Indicators of cluster joining and leave, as well as the proportion of goods and services produced by recently joined members	Competition stimulates continuous business improvement, innovative exploration and scientific research.
10	Innovative oriented cluster	Indicators of the output of innovative products and level of technical equipment	Responsiveness to customer needs
11	Adaptable structure and membership	The cluster's flexibility is demonstrated by the proportion of its participating business units in the local economy.	Supported by absence of notable limitations and obstacles throughout the expansion or contraction process.

12	Openness of the cluster as a system	Indicators on the number of jobs and tax contributions to the budget.	Pays attention to the fact that all economic actors can access the cluster.

Source: Developed by the authors [1, 3, 5, 8, 9, 10]

The development of regions based on the cluster approach is therefore relevant and of significant practical importance. Studies on the geographical concentration of production forces, territorial concentration of enterprises and organizations working together to enhance competitiveness and economic development highlight the opportunity for the formation of economic clusters in various industries and sectors.

The classification of clusters by M. Porter according to localization [6], S. Rosenfeld according to stages of development [8], A. Markusen according to type of management [2], M. Monfort according to characteristics and components [4], A. Rodriguez according to type of relations: horizontal or vertical [7], L. Markov according to degree of formation - agglomeration and transformation [13], S. Sokolenko according to degree of development [14], V. Tretyak and Y. Vladimirov according to the nature of emergence - spontaneous or artificial [12] highlight the fact that, regardless of their sectoral affiliation, all clusters constitute a distinct economic category.

The classification of clusters according to the nature of emergence, specific characteristics, technical parameters, method of organization and sectorial particularities, applied to various industries and economic sectors, according to the above-mentioned criteria, is presented in Table 2.

Table 2. Classification of clusters according to their characteristic formation features

By the occurrence	By their nature	By their technological parameters	By the formation process	By the industry specifics
Spontaneously formed economic clusters	Real cluster	Artisanal	Clusters with a regional form of economic activity	Discrete groups
	Pseudo-cluster	Industrialized, specialized in the traditional goods production	Clusters with vertical production chains in small sectors	Process groups
Planned clusters" or "Induced clusters"		High-tech clusters	Industrial clusters	Innovative clusters
		Medium-tech clusters	Government clusters	Creative clusters
		Low-tech clusters	Mixed (public-private) clusters	Agribusiness clusters, tourism clusters, etc.
				Transportation and logistics clusters

Source: Systematized by authors based on [1, 3, 6, 7, 10, 11, 12]

Economic clusters (business clusters) not only provide an efficient mechanism for regional development, but also create conditions for effective interaction between economic entities. The main principles and attributes that define the characteristics of clusters are structured in Table 3.

Table 3. Classification of clusters by groups and attributes

Group	Characteristic	Description
First group	Territorial concentration	Companies are located in close proximity to each other due to economic and social factors.
	Primary factors	Economies of scale, access to infrastructure, common natural resources, etc.
	Secondary factors	Social capital, cooperative networks, common entrepreneurial culture, etc.
Second group	Specialization	Clusters are formed around the core economic activities of the participants with a clearly defined area of expertise.
Third group	Integration	Clusters bring together multiple categories of economic agents: entrepreneurs, public authorities, research centers, financial institutions and cooperation partners.
Fourth group	Relationship	Relations between the participants are characterized by a balance between competition and cooperation, which stimulates innovation and increased competitiveness.
Fifth group	Dynamism	Clusters achieve a critical mass of participants needed to facilitate innovative change and sustainable economic development.
Sixth group	Sustainability	The cluster life cycle is oriented towards long-term development and continuous regeneration of initiatives.
Seventh group	Innovation	Cluster enterprises are engaged in continuous processes of technological, commercial and organizational change.
Mixed group	Combined characteristics	Clusters present features from several groups, resulting in hybrid patterns of organization and development.

Source: Developed by the authors according to [5, p. 210]

Finding strategic clusters of economic organizations that have a major impact on the growth of the local economy is made feasible by this classification.

The significance of the spatial concentration of businesses in a particular location and the existence of industrial districts, which unite both large and small businesses from various industries and economic sectors, are regularly emphasized in the literature on regional development draws attention to the fact that all economic actors can access the cluster. [1, 3, 6, 11]. These can be considered as the incipient structures of cluster formation. Unlike an industrial or manufacturing group, a cluster can integrate different forms of ownership and distinct business models, fostering interaction and competitiveness.

In this study, an economic cluster is defined as a set of economic entities in a competitive relationship, concentrated in a particular region, whose activities, carried out under resource-constrained conditions, aim at generating economic value to satisfy individual, collective and public needs.

What is the advantage of clusters? A cluster is a form of self-organization of the social and economic space, influencing multiple domains: inputs, technologies, knowledge, employment, cultural environment and infrastructure. From our point of view, an organization of businesses in a cluster helps to improve employment, raise the region's appeal to investors, and advance the workforce's professional skills. The gross regional product and tax revenues obtained for the budget eventually rise as a result of these procedures.

The simultaneous merging of economic entities from different fields generates a synergistic effect, contributing to strengthening competitiveness and increasing economic efficiency. From this perspective, the cluster is a strategic instrument of a universal nature, capable of facilitating cooperation between sectors and stimulating innovation. Therefore, the impact of economic clusters on the development of the regional economy is illustrated in Figure 2.

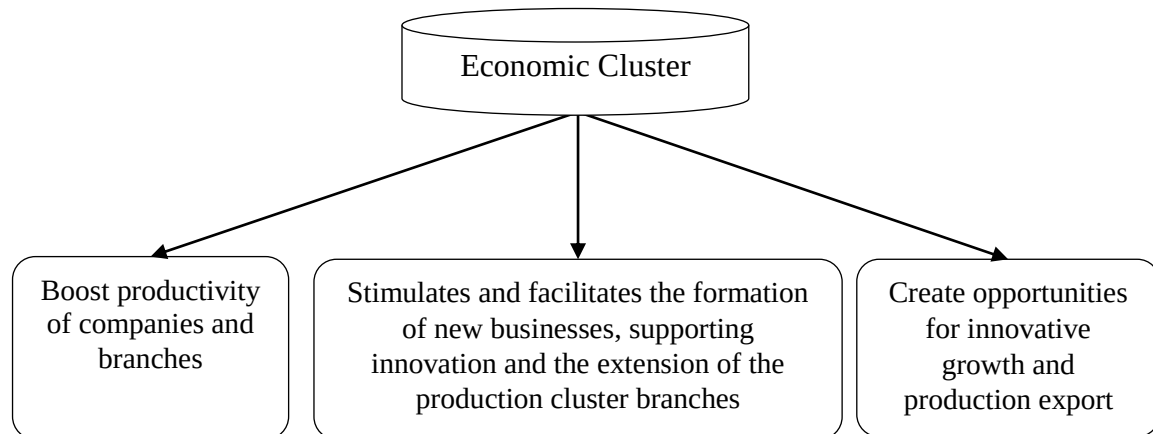


Figure 2. The impact of economic clusters on regional economic development

Source: Developed by the authors

Based on the authors' research in the field of business clustering [1], we consider that the formation of clusters in the paint industry in the Republic of Moldova represents a strategic opportunity for developing the competitiveness of the sector and its integration into global value chains. In a context of increased demand for innovative and sustainable solutions in the field of coating materials, the development of a cluster would facilitate cooperation between manufacturers, raw material suppliers, research centres and public institutions.

In this way, a paint cluster could contribute to the modernization of the sector by stimulating innovation, optimizing production processes and attracting foreign investment. It would also enable the development of environmentally friendly products that comply with international environmental protection regulations, thus increasing the access of local producers to foreign markets.

Conclusions

Summarizing the above, we conclude that the implementation of an effective cluster policy can become a determining factor for increasing regional competitiveness and integrating the local economy into international economic circuits. By supporting businesses, offering tax incentives, developing appropriate infrastructure and promoting public-private partnerships, the necessary prerequisites are created for strengthening cooperation between economic actors and stimulating innovation, thus contributing to the sustainable development of the region.

In this context, the paint industry in the Republic of Moldova could significantly benefit from the formation of a specialized cluster, which would facilitate access to raw materials, advanced technologies and foreign markets [11]. The development of this sector through a well-defined strategy would not only increase the competitiveness of local producers, but would also

diversify the range of environmentally-friendly and innovative products on offer, in line with international environmental protection and energy efficiency requirements.

References

1. Călugăreanu, I., Chirtoacă, A. International experience in financial and instrumental support for sustainable cluster development. În: Proceedings of the International Scientific-Practical Conference “Economic Growth in the Face of Global Challenges. Consolidation of National Economies and Reduction of Social Inequalities”, ediția a XVIII-a, 10-11 octombrie 2024, Chișinău, Republica Moldova. Chișinău: Institutul Național de Cercetări Economice, pp. 283-292
2. Markusen A. Sticky Places in Slippery Space: A Typology of Industrial Districts, Economic Geography. [online]. Available at: <https://www.jstor.org/stable/144402> [Accessed: 08.03.2025]
3. Marshall, A. Principles of Economic. New York: Prometheus. 1997. 320 p. ISBN 1573921408
4. Monfort M. Competitividad y factores críticos de éxito en la “hotelería de litoral”: experiencia de los destinos turísticos Benidorm y Peñíscola. [online]. Available at: <https://dialnet.unirioja.es/descarga/articulo/305113.pdf> [Accessed: 09.03.2025]
5. Perroux, F. A New Concept of Development: Basic Tenets. London: Routledge, 220 p. ISBN 0415602106
6. Porter, M.E. Location, Competition and Economic Development: Local Clusters in a Global Economy. În: Economic Development Quarterly, 2016, nr. 1, p. 15–34. ISSN 0891-2424
7. Rodrigues A. B. Turismo rural: practicas e perspectivas. [online] Available at: <https://app.bczm.ufrn.br/home/#/item/234995> [Accessed: 11.03.2025]
8. Rosenfeld S.A. Bringing business clusters into the mainstream of economic development. [online]. Available at: <https://doi.org/10.1080/09654319708720381> [Accessed: 09.03.2025]
9. Soulie D. Filieres de Production et Integration Vertical. Annales des Mines, Janvier 1989. p. 21–28. ISSN 2271-7943
10. Tolenado J.A. et all. Propis des Filieres Industrielles. Revue d'Economie Industrielle. V.6. 1978. № 4. P. 149–158. ISSN 1773-0198
11. UNDP. All economic roads lead to clusters [online]. 2024. Available at: <https://www.undp.org/moldova/blog/all-economic-roads-lead-clusters> [Accessed: 12.03.2025]
12. Владимиров, Ю.Л., Третьяк, В.П. О классификациях кластеров предприятий. Disponibil: <https://riep.ru/upload/iblock/a42/a4235978448f873ef9f7cc4085650be1.pdf>
13. Марков Л.С. Теоретико-методологические основы кластерного подхода. Монография. Новосибирск: ИЭОПП СО РАН, 2015. 300 с. ISBN 978-5-89665-298-4
14. Соколенко С.И. Промышленная и территориальная кластеризация как средство реструктуризации [online]. Available at: <https://unece.org/fileadmin/DAM/ie/industry/documents/sokolenko.pdf> [Accessed: 13.03.2025]

ECONOMETRIC MODELLING OF SUNFLOWER PRODUCTION: A QUANTITATIVE ANALYSIS

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Abstract

The article provides an in-depth analysis of the dynamics of sunflower production in the Republic of Moldova, employing modern econometric methods to identify and quantify the key factors influencing yield and export potential of this strategic crop. A multiple regression model is applied, incorporating critical variables such as cultivated area, climatic conditions (precipitation and average seasonal temperatures), the level of technological inputs, and international prices for sunflower oil. The empirical analysis highlights the causal relationships between these variables and the volume of production, offering a rigorous scientific framework to support agricultural policy-making. The study's findings underscore the importance of investing in the modernization of agricultural technologies, adapting to climate change, and integrating the national agricultural market into global value chains. Based on the conclusions drawn, strategic directions are proposed to enhance the competitiveness of the sunflower sector both nationally and

within the broader context of international trade. This research contributes to strengthening the analytical foundation necessary for the development of sustainable and effective agricultural policies.

Keywords: sunflower, econometric model, agricultural production, yield, export, Republic of Moldova

JEL: M16, M29

Introduction

Within the broader framework of the Republic of Moldova's integration into the European economic area, the development of a competitive and efficient agricultural sector emerges as a critical pillar for ensuring sustainable economic growth and commercial stability. Among the strategic crops, sunflower holds a prominent position due to its substantial contribution to national exports and its considerable potential for industrial processing.

This study undertakes a comprehensive analysis of the evolution of sunflower production over the period 2010–2024, employing advanced econometric instruments to assess the impact of key economic and natural factors on yield performance and total output volume [1], [4], [10].

Results obtained and discussions

Sunflower production has recorded a significant increase over the past 15 years, driven by the expansion of cultivated areas and the intensification of technological processes at the level of agricultural holdings. This upward trend is associated, on the one hand, with the growing international demand for vegetable oil, and on the other hand, with the strategic orientation of national agricultural policies toward capitalizing on export potential [6], [12]. The cultivated areas have gradually expanded, reaching an estimated 275 thousand hectares in 2024, compared to 220 thousand hectares in 2010. Furthermore, the average yield has increased from 1.61 t/ha to over 2.25 t/ha, as a result of the adoption of high-performance hybrid seeds, the application of rational fertilization practices, and the mechanization of agricultural operations [9].

In the current context of modern agriculture—marked by dynamism, climatic volatility, and the ongoing need to optimize production processes—regression analysis emerges as an indispensable methodological tool for evaluating causal relationships between production factors and outcomes [5], [10].

Table 1. Dynamics of cultivated area, production, and yield of sunflower in the Republic of Moldova (2010–2024)

Year	Cultivated Area (thousand ha)	Total Production (thousand tons)	Yield (t/ha)
2010	220	355	1.61
2014	240	420	1.75
2016	250	480	1.92
2018	255	605	2.37
2020	260	590	2.27
2022	265	550	2.08
2023	270	600	2.22
2024	275	630	2.29

Source: NBS, author [3]

The application of this method to the sunflower cultivation sector provides a robust scientific foundation for informed managerial decision-making, particularly with regard to enhancing resource efficiency and improving the competitiveness of agricultural enterprises.

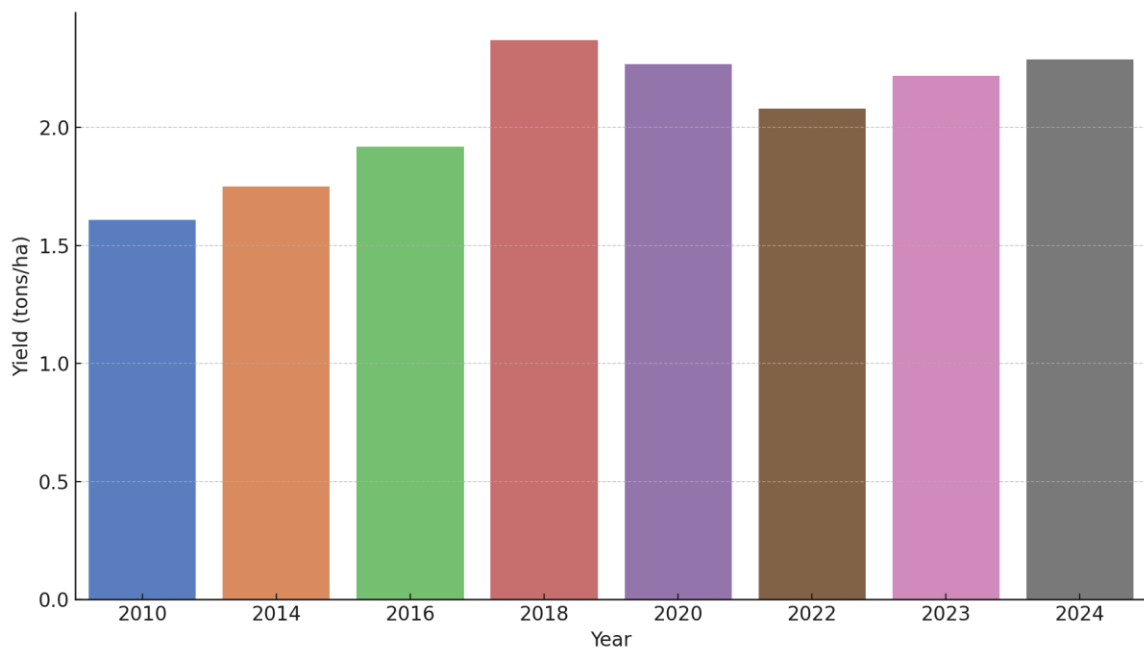


Figure 1. Variation in yield (tons/ha) over the period 2010–2024

Source: NBS, author [3]

Correlation analysis, as an integral component of the econometric process, enables the identification and quantification of the intensity of relationships among relevant variables such as yield per hectare, cultivated area, and the volume of fertilizers applied. Establishing these relationships is essential for identifying the factors that significantly influence the productivity of sunflower cultivation. Correlation coefficients reveal the positive or negative nature of these interdependencies, providing a nuanced understanding of the functional structure of the production system [8].

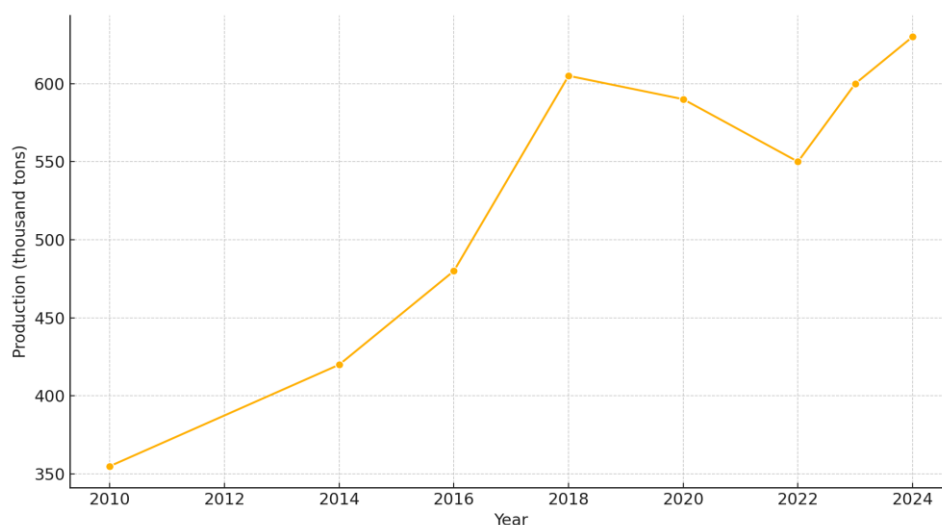


Figure 2. Evolution of sunflower production (2010–2024)

Source: NBS, author [3]

However, in order to move from simple statistical observations to rigorous causal explanations, it is essential to integrate regression analysis, which enables the estimation of the marginal effect of each independent variable on the dependent variable—in this case, yield or total production volume. Both simple and multiple linear regression models provide a robust analytical framework for forecasting output evolution based on changes in input structure, such as fertilizer dosage or the agricultural technology employed [4], [5].

Empirical data, for instance, indicate that a rational increase in fertilizer dosage is positively associated with a significant rise in average yield per hectare, whereas uncontrolled expansion of cultivated areas does not automatically lead to production gains and may even undermine economic efficiency in the absence of adequate resource management [11].

The quality of econometric models is typically assessed using the coefficient of determination (R^2), which reflects the proportion of variability in the dependent variable that can be explained by the model. In an applied study conducted in the Republic of Moldova, a multiple correlation coefficient of 0.7 revealed that approximately 48% of the variation in sunflower production could be attributed to factors such as soil quality and fertilization levels [9].

Moreover, regression analysis extends beyond quantitative dimensions and can incorporate qualitative variables—through techniques such as logistic regression or the inclusion of dummy variables—capturing effects of cultivated varieties, soil cultivation methods, or irrigation systems, all of which significantly influence production outcomes [5].

In a context marked by climate change, market uncertainties, and growing pressure on resource sustainability, the use of regression analysis tools becomes imperative for stakeholders in the agricultural sector. The application of these methods facilitates the identification of critical success factors, the formulation of targeted agricultural policies, and the design of customized farm-level strategies, thereby contributing to increased efficiency, productivity, and resilience across the entire sunflower production chain [2], [11].

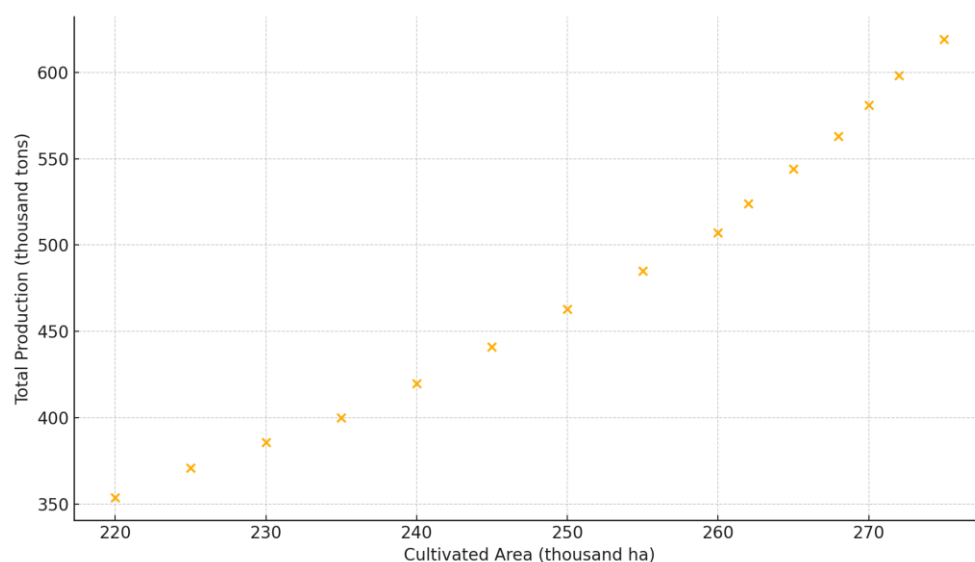


Figure 3. Relationship between cultivated area and total production

Source: NBS, author [3]

This study is grounded in an integrated scientific approach that rigorously combines both qualitative and quantitative methods, aiming to conduct a comprehensive analysis of the dynamics

of the sunflower sector in the Republic of Moldova. The research began with an extensive documentation phase, utilizing both primary sources (direct observations, official statistical data) and secondary sources (specialized literature, analytical reports), in order to capture the agro-economic particularities of sunflower cultivation—from production processes to marketing mechanisms on both domestic and international markets [12].

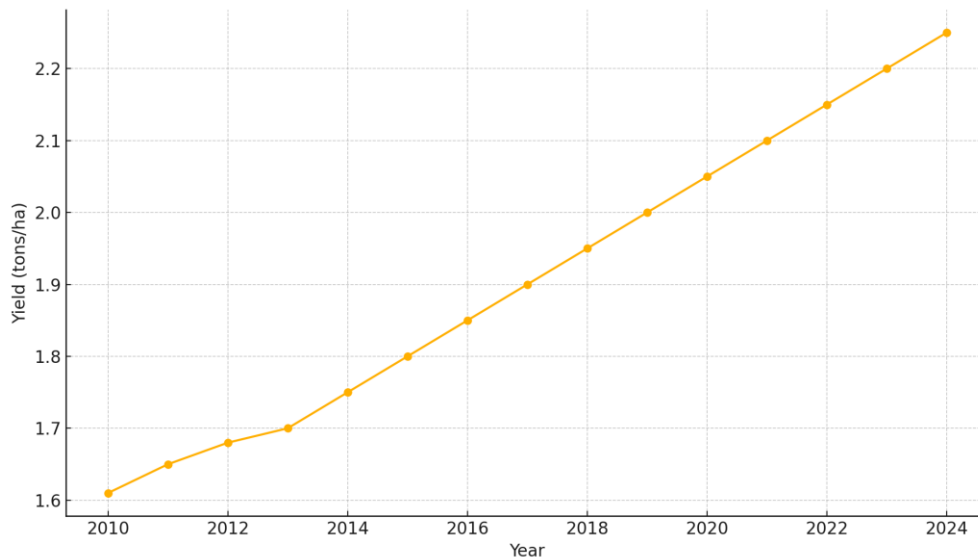


Figure 4. Evolution of average sunflower yield (2010–2024)

Source: NBS, author [3]

To test the formulated hypotheses and construct econometric models, a comparative analysis of medium- and long-term trends in sunflower production was conducted, taking into account both endogenous factors and exogenous influences (such as climate variability and price fluctuations on international markets) [2], [10]. The database employed consisted of official and validated sources, including: EUROSTAT and FAO statistical databases; the National Bureau of Statistics of the Republic of Moldova (NBS); and various publications and specialized reports in the fields of agri-food economics and rural development [3], [12].

The collected data were processed using advanced statistical and econometric methods, allowing for the identification of causal relationships between explanatory variables (cultivated area, yield, production costs, international prices) and aggregate production volume [4]. In parallel, the impact of climate change on productivity was assessed, and the sector's sensitivity to global economic fluctuations was analyzed [11]. The applied component of the research played a critical role in formulating evidence-based policy proposals oriented toward the sustainable and adaptive development of the oilseed sector [6].

By correlating qualitative analysis with quantitative modeling, the study offers a holistic perspective on the challenges and opportunities within the sunflower sector, revealing both structural vulnerabilities and the potential for competitive growth [8], [10].

To analyze the functional relationships among the key determinants of sunflower production, a multiple linear regression econometric model was employed, where the dependent variable is production volume (P), expressed in thousands of tons, and the selected explanatory variables are as follows:

S – cultivated area (thousand hectares);

R – average yield per hectare (tons/hectare);

C – production costs per unit area (MDL/hectare);

X – average international market price for sunflower seeds (USD/ton).

The functional form of the model is given by the equation:

$$P = \alpha + \beta_1 \cdot S + \beta_2 \cdot R + \beta_3 \cdot C + \beta_4 \cdot X + \varepsilon,$$

where:

α is the intercept;

$\beta_1, \beta_2, \beta_3, \beta_4$ are the regression coefficients indicating the sensitivity of production to changes in each independent variable;

ε represents the random error term.

The model was estimated using the Ordinary Least Squares (OLS) method, and the results demonstrated a high degree of statistical relevance, with a coefficient of determination $R^2 = 0.86$, indicating that 86% of the variation in production is explained by the selected model. The coefficients β_1 and β_2 were found to be statistically significant and positive, supporting the hypothesis that both the expansion of cultivated area and the increase in yield lead to a rise in total production volume [4], [5].

The application of the econometric model produced a series of quantitatively substantiated conclusions regarding the influence of explanatory variables on sunflower production:

Expansion of cultivated area: A 1% increase in cultivated area leads, on average, to a 1.2% rise in production, highlighting the importance of maintaining and expanding the agricultural base [7].

Yield has a significant multiplier effect; an increase of 0.1 tons/ha translates into an estimated surplus of 25–30 thousand tons at the national level, underlining the key role of technological innovations and high-quality agricultural inputs [6], [12].

Production costs: These exert a negative but indirect influence. Costs that are not correlated with efficiency can adversely impact producers' profit margins, emphasizing the need to optimize operational processes and expenditures [10].

International prices: These have a positive and stimulating influence on production by attracting farmers to external markets, thus validating the role of global markets as a driver for sectoral development [2], [5].

These results confirm the utility of employing econometric modeling for forecasting and supporting strategic decision-making in the agricultural sector, with direct applications in agricultural policy and farm management [1], [4], [11].

Conclusions

The econometric model developed within this research constitutes a complex analytical instrument, characterized by methodological robustness and high applied relevance. It enables an in-depth evaluation of the performance of the sunflower sector in the Republic of Moldova, from both a quantitative and strategic perspective. By estimating the causal relationships among key variables—such as cultivated area, average yield, production costs, and international prices—the model provides a scientifically grounded framework for the formulation of public policies and commercial strategies in an economic environment marked by uncertainty, volatility, and global interdependence.

Through the application of multiple linear regression and validation via statistical significance indicators, the analysis succeeded in identifying both the direct and indirect influences of the selected factors on the volume of sunflower production. This approach allows not only for a static description of the current situation but also for the formulation of medium- and long-term development scenarios—an essential element for the design of proactive policies and systemic public interventions.

Following the detailed empirical analysis, the main conclusions that can be drawn are as follows:

The performance of sunflower exports is directly influenced by average yield per hectare and the expansion of cultivated areas, reflecting the dependence of external competitiveness on internal efficiency. Increasing yields requires not only the use of modern technological inputs (hybrid seeds, optimized fertilizers, precision agriculture), but also an institutional framework that supports knowledge transfer and investment in farm modernization.

The applied econometric models have proven capable of accurately anticipating sectoral trends, thus becoming an essential tool for forecasting and strategic planning. Their use in the formulation of agricultural policies can lead to more rational and result-oriented decision-making processes, contributing to the reduction of uncertainty in resource allocation and to the prioritization of interventions with the greatest economic and social impact.

The economic efficiency of the value chain is significantly affected by high production and logistical costs, particularly in the context of underdeveloped agricultural infrastructure, limited access to capital, and a low degree of vertical integration. The fragmentation of farmland, lack of access to modern storage facilities, and excessive transport costs reduce the competitiveness of the final product and erode farmers' profit margins.

Sustainable access to European Union markets requires not only a comparative advantage based on volume, but also strict compliance with quality and food safety standards, such as ISO 22000, BRC, GLOBALG.A.P., and other EU regulations. Non-compliance with these standards limits access to high-value-added markets and creates dependence on less regulated markets, where prices are often unstable and volatile.

The impact of exogenous factors—such as climate change (prolonged droughts, irregular precipitation), fluctuations in international agricultural commodity prices, and geopolitical shocks (regional crises, trade restrictions)—must be integrated into forecasting models and risk management strategies. The resilience of the sector largely depends on the ability of authorities and economic actors to anticipate, mitigate, and manage these external disruptions.

The need for digitalization and real-time data collection has become a *sine qua non* for the practical application of econometric models in decision-making processes. Without an up-to-date, granular, and interoperable database, the ability to generate reliable forecasts and respond rapidly to market changes remains severely constrained.

Therefore, the econometric model is not merely a theoretical tool of analysis but a catalyst for reform—guiding agricultural policies toward efficiency, adaptability, and integration into international value chains. In a context where Moldovan agriculture must strengthen its position in a dynamic and demanding global environment, the intelligent use of advanced analytical tools emerges as a top-tier strategic priority.

References

1. PRINDYCKE, R.S.; RUBINFELD, D.L. *Econometric Models and Economic Forecasts*. 2nd ed. New York: McGraw-Hill, 1981.
2. FAO – Food and Agriculture Organization. *World Sunflower Outlook Report*. Rome: FAO, 2023.
3. NBS – National Bureau of Statistics of the Republic of Moldova. *Statistical Yearbooks 2010–2023*. Chișinău: NBS, 2023.
4. GUJARATI, D.N. *Basic Econometrics*. 4th ed. New York: McGraw-Hill, 2003.
5. MADDALA, G.S. *Introduction to Econometrics*. New York: Wiley, 2001.
6. ULINICI, A. *Eficiențizarea managementului relațiilor economice internaționale*. Chișinău: Print Caro, UCCM, 2019. ISBN 978-9975-56-720-6.
7. ȘAVGA, L.; ULINICI, A. Opportunities for development of trade relations deriving from the Republic of Moldova – European Union Association Agreement. *Revista de Comerț Exterior și Dezvoltare*, 2017.
8. ULINICI, A. Evaluarea potențialului pieței interne și externe de floarea soarelui și diagnosticarea întreprinderilor din domeniu. In: Conferința științifico-practică “Dezvoltarea inovativă, incluzivă a cooperativelor: teorie, practică, perspective”, 13–14 septembrie 2018, p. 159–165.
9. ULINICI, A.; ȘAVGA, L. Analysis of the sunflower production dynamics in the Republic of Moldova based on econometric models. *Revista de Cercetări în Comerț, Management și Dezvoltare Economică*, 2019, p. 57–69. ISSN 2345-1424.
10. WOOLDRIDGE, J.M. *Introductory Econometrics: A Modern Approach*. 5th ed. Mason, OH: South-Western Cengage Learning, 2013. ISBN 978-1-111-53104-1.
11. SWINNEN, J.; VAN HERCK, K. *Agricultural Productivity in Transition Countries: The Role of Institutions and Trade*. Rome: FAO, 2011.
12. POPA, A. *Politici agricole și dezvoltare rurală durabilă în Republica Moldova*. Chișinău: ASEM, 2017. ISBN 978-9975-75-836-9.

FORMATION OF INVESTMENT CAPITAL OF ENTERPRISES: NEW CHALLENGES AND APPROACHES

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Abstract

The necessity of forming investment capital by enterprises to ensure stable functioning and development is substantiated. The importance of utilizing various sources by enterprise management during the formation of investment capital is emphasized. It is noted that the formation of investment capital in modern conditions faces numerous new challenges caused by both global economic trends and the specific characteristics of national economic development.

Attention is drawn to the need for enterprises to adapt to challenges such as rising debt capital costs, increasing macroeconomic instability, digitalization and technological transformations, the growing role of venture and private capital, financial restrictions and regulatory risks, and high competition for investment resources.

To adapt and achieve sustainable growth under these conditions, enterprise management must implement innovative approaches to forming investment capital, including crowdfunding and crowdinvesting, attracting investment funds and obtaining grants, utilizing financial technologies, corporate financial instruments, digital assets, and blockchain technologies, integrating public-private partnerships, and conducting investment analysis using artificial intelligence and Big Data.

Keywords: investment capital, enterprise, management, technologies, resources, challenges, approaches

JEL: G31, G32, M21

Introduction

The formation of investment capital by enterprises is an extremely important process that plays a key role in ensuring their stable functioning and further development. Investment capital is not only a source of financial resources necessary for current activities, but also the basis for the implementation of strategic plans for expanding production capacities, introducing innovations, modernizing equipment and developing new sales markets.

Increasingly, in today's competitive market conditions, the ability of an enterprise to accumulate and effectively use investment resources directly affects its competitiveness and financial stability. The presence of sufficient investment capital allows an enterprise not only to maintain a balance between income and expenses, but also to promptly respond to changes in the external environment, maintain a high level of product or service quality, and also implement measures to improve production efficiency.

In addition, the formation of investment capital contributes to the creation of favorable conditions for attracting additional external investments, partnerships and credit resources. This, in turn, expands the financial capabilities of the enterprise and opens up new prospects for innovative development and business diversification.

It is necessary to note the importance of using various sources of financing by the management of the enterprise during the formation of investment capital, since this allows to ensure the stability of investment activities in the conditions of a dynamic external environment. The variety of sources – both internal and external – gives the enterprise greater flexibility in choosing the optimal financial instruments. And this contributes to the diversification of risks, increasing investment attractiveness, ensuring stable development and increasing the competitiveness of the enterprise. In addition, competent management of sources of financing allows to adapt the investment strategy to changes in the economic environment, taking into account fluctuations in interest rates, changes in the availability of capital and institutional restrictions.

Undoubtedly, the systematic and systematic formation of investment capital is a necessary condition for ensuring the stability of the enterprise's activities, increasing its market value and long-term development in an unpredictable economic environment.

Results obtained and discussions

The formation of investment capital of an enterprise in modern conditions faces a number of new challenges, caused by both global economic trends and the specifics of the development of national economies [1, p. 347-348]. These are such challenges as (1) the growth of the cost of capital, (2) macroeconomic instability, (3) digitalization and technological transformations, (4) institutional transformations of the investment environment, (5) the growth of financial restrictions and regulatory risks, (6) increased competition for investment resources (Fig. 1).

In this context, the formation of a flexible investment policy that is able to adapt to new challenges and promptly respond to changes in the internal and external environment becomes particularly relevant [2, p. 14-15]. In particular, enterprise management needs to comprehensively assess the impact of so-called stimulating trends, which, on the one hand, can create certain barriers to the implementation of investment projects, and on the other hand, form powerful impulses to modernize production processes, strengthen innovative and technological activity, and expand strategic development areas.



Figure 1. Challenges in the formation of investment capital of enterprises: trends-stimulators and consequences of influence

Source: author's development

It is noteworthy that the modern formation of investment capital of enterprises is complicated by the increase in the costs of attracting financing, which directly affects the deterioration of the investment attractiveness of enterprises. At the same time, fluctuations in exchange rates and the inflation rate create additional uncertainty, increasing the risk of insolvency and reducing investor confidence [3, p. 302-303].

In such conditions, enterprises are forced to make additional investments in the implementation of new technologies, which is associated with the need for rapid digitalization and increased requirements for digital skills of personnel. At the same time, the influence of institutional investors working on long-term strategies is growing, while the share of private investors is gradually decreasing, which changes the structure of investment flows. The difficulty of access to loans and capital, increased administrative burden and increased transparency standards create additional barriers to attracting financial resources [4]. At the same time, the requirements for the innovation of business processes are increasing, which requires an active increase in the investment attractiveness of enterprises as a key factor in ensuring their sustainable development.

Also of great importance for enterprise management is the timely identification and comprehensive analysis of the consequences of challenges that arise in the process of forming investment capital. This allows not only to promptly respond to potential risks, but also to predict possible scenarios of events, develop effective adaptation strategies and optimize resource allocation. Awareness of such consequences helps to increase the enterprise's resilience to external influences, strengthen its financial position and ensure long-term growth in a changing economic environment.

Under the influence of modern challenges, the risks of non-return of investments are increasing, which, in turn, leads to a decrease in investment activity and a reduction in the volume of capital investments in traditional sectors of the economy [5, p. 29-30]. This necessitates the active search for alternative sources of financing, including partnership models, participation in international programs, the use of crowdfunding or the involvement of financial technologies. At the same time, challenges stimulate the reorientation of investors to high-tech sectors, creating new opportunities for the implementation of innovative projects [6, p. 132-133]. Against this background, the role of institutional investors and venture funds is growing, which are ready to support startups and technological initiatives with high profitability potential. At the same time, the requirements for investment transparency are increasing, which increases the administrative burden on enterprises and increases the costs of compliance with regulatory requirements.

An additional consequence is the difficulty of accessing traditional sources of capital, such as bank lending, which requires enterprises to improve the quality and validity of investment projects [7, p. 45-46]. In such conditions, the task of increasing the efficiency of investment resource management is becoming more urgent, as well as the active search for new markets that can provide stable revenues and contribute to the diversification of income sources. It should be noted that enterprises are increasingly focused on using innovative approaches to attracting investment capital, seeking to adapt to dynamic changes in the global economic environment. In particular, more and more attention is paid to (1) diversifying sources of financing, (2) using financial technologies, (3) attracting ESG-oriented investments, (4) implementing new generation corporate financial instruments, (5) using digital assets and blockchain technologies, (6) using artificial intelligence and Big Data (Table 1).

Table 1. Approaches and tools for forming investment capital of enterprises

Approaches	Toolkit	Characteristics
Diversification of funding	Attracting venture capital	especially relevant for technology startups, innovative enterprises and the digital economy sector

sources	Crowdfunding and crowdinvesting	an effective tool for raising funds from a wide range of investors
	Investment funds and grants	funding from international organizations, government programs and business support funds
Using of financial technologies	Asset tokenization	converting part of corporate assets into digital form (NFT, security tokens) for their subsequent sale or exchange
	DeFi (decentralized finance)	using smart contracts on blockchain platforms for automated capital raising without intermediaries
	Alternative lending platforms	online P2P lending platforms for obtaining loans from investors without the involvement of banks
ESG-oriented investments	Issuance of “green” and “social” bonds	financing projects related to renewable energy, environmental solutions or corporate social responsibility
	Evaluation of companies according to ESG criteria	attracting funds that invest only in environmentally and socially responsible businesses
New generation corporate financial instruments	Convertible bonds	allow investors to convert debt obligations into shares of the company
	Reverse IPOs (SPACs)	allow you to quickly raise capital through a merger with a “shell” company that is already traded on the stock exchange
	Revenue-Based Financing (RBF)	investors receive a share of the company’s future profits, rather than fixed debt payments
Using of digital assets and blockchain technologies	Virtual assets	using cryptocurrency or tokens to finance business initiatives
	Initial Coin Offering and Security Token Offering	issuing digital tokens to raise funds
Using of artificial intelligence and Big Data	AI analysis of financial markets	helps predict risks and optimize investment strategies
	Automated investment management platforms	allow you to raise capital based on algorithmic trading and machine learning

Source: author’s development

The formation of investment capital of enterprises in modern conditions occurs using various approaches, each of which is based on its own tools and has specific characteristics. One of the key areas is the diversification of funding sources, which involves attracting venture capital, which is especially relevant for startups and enterprises in the innovation sector. Crowdfunding and crowdinvesting platforms are also actively used, which provide access to resources for a wide range of small investors. This approach is complemented by investment funds and grant programs that provide funding from the state, international organizations or donor structures [5, p. 28-33; 8, p. 145-146].

The next important approach is the use of financial technologies, in particular, asset tokenization, which allows transferring part of corporate resources into digital form. Within decentralized finance (DeFi), the role of smart contracts on the blockchain is growing, which allow automating the process of attracting capital without the participation of financial intermediaries.

Along with this, alternative lending platforms, such as P2P services, are becoming more widespread, which allow you to bypass the traditional banking system.

Also, a special role in modern conditions is played by ESG-oriented investments, which are focused on the issuance of “green” and “social” bonds aimed at supporting environmentally responsible and socially important projects [4]. In addition, there is growing interest in companies that meet ESG criteria, which allows them to attract funds from institutional investors with high standards of responsibility.

Another promising direction is the use of new generation corporate financial instruments. In particular, convertible bonds allow investors to transform debt into shares in the company. Reverse IPOs through SPAC companies open the way to rapid entry into public markets. The Revenue-Based Financing model is also actively developing, when investors receive income as a share of the future profit of the enterprise.

Given these trends, it is necessary to separately highlight the use of digital assets and blockchain technologies, which open new financing channels through virtual assets and the launch of ICO and STO mechanisms – digital tokens, which act as analogues of classic securities [5, p. 29-30].

Finally, an important place in the structure of modern financing is occupied by tools based on artificial intelligence and Big Data [9, p. 1389-1392]. AI-analysis systems allow enterprises to more accurately predict financial risks and adapt investment strategies. At the same time, automated capital management platforms based on machine learning ensure the efficiency of investment attraction and prompt decision-making.

Conclusions

The formation of investment capital of enterprises in modern conditions is a strategically important process that determines not only financial stability, but also long-term competitiveness of the business. Successful attraction and effective use of investment resources allows enterprises to modernize their production base, introduce innovations, develop new markets and adapt to an unstable economic environment.

At the same time, modern realities pose new challenges to enterprises - the growth of the cost of capital, financial and macroeconomic instability, digital transformation, changes in the institutional structure of the investment environment, increased competition for resources. In response to this, the need to form a flexible investment policy that takes into account risks and at the same time uses new opportunities is becoming more relevant.

The importance of innovative approaches to financing is growing, in particular, diversification of capital sources, the introduction of financial technologies (crowdfunding, tokenization, DeFi), orientation towards ESG investments, as well as the use of digital assets and artificial intelligence. Such tools allow enterprises not only to attract financing on more flexible terms, but also to increase investment attractiveness.

In conclusion, ensuring effective formation of investment capital requires enterprises to have strategic thinking, adaptability and an innovative approach to financial management, which is a prerequisite for their stable development in the conditions of constant transformation of the global economic environment.

References

1. KUTSYK, P., LUPAK, R., SHCHUPAKIVSKYI, R., KACHAN, O., & VIRT, M. Conceptual principles of coordination of sectoral structural changes with the need to ensure the competitiveness of the economy in the conditions of digital transformations. In: Financial and credit activity problems of theory and practice. 2024, no. 2(55), pp. 346-361. DOI: 10.55643/fcaptp.2.55.2024.4284
2. KULAKOV, O. Analysis of the current state of investment innovative activity of Ukraine. In: State and Regions. Series: Economics and Business. 2023, no. 2(128), pp. 12-18. DOI: 10.32782/1814-1161/2023-2-2
3. DMYTRYK, O., VASYLTSIV, T., MULSKA, O., LUPAK, R., BOIKO, V., KUNYTSKA-ILIASH, M., & DUBYNA, M. Financial and economic security and development of priority sectors of the national economy Ukraine: casual nexus empirical. In: Financial and credit activity problems of theory and practice. 2024, no. 4(57), pp. 301-316. DOI: 10.55643/fcaptp.4.57.2024.4443
4. LIANG, W., WANG, Y., & HOU, L. Does private equity investment influence enterprise innovation strategy? In: Finance Research Letters. 2023, no. 58(D), article number 104593. DOI: 10.1016/j.frl.2023.104593
5. BERDAR, M., KOT, L., MARTYNIUK, L., YEVTUSHEVSKA, O., & SAPACHUK, YU. Challenges and prospects of innovation and investment development of enterprises in the post-war period. In: Economics of Development. 2024, no. 23(2), pp. 27-37. DOI: 10.57111/econ/2.2024.27
6. BOIKO, V., LYZAK, M., VASYLTSIV, T., LUPAK, R., & OHINOK, S. Financial and economic performance of agricultural enterprises: analysis and policy improvement. In: Agricultural and Resource Economics. 2024, vol. 10, no. 4, pp. 129-155. DOI: 10.51599/are.2024.10.04.06
7. GARAFONOVA, O., YANKOVOI, R., ZHOSAN, H., LOMACHYNSKA, I., ANANIEV, M., & DVORNYK, I. International experience in applying innovative financial management strategies for business revitalization in the post-war period in Ukraine. In: Financial and Credit Activity: Problems of Theory and Practice. 2023, no. 6(53), pp. 43-57. DOI: 10.55643/fcaptp.6.53.2023.4140
8. MANN, R. V., & MAKHNO, S. V. Innovation and investment potential of Ukrainian enterprises: Conditions of preservation and development in the post-war period. In: Economic Scope. 2022, no. 182, pp. 144-148. DOI: 10.32782/2224-6282/182-23
9. AUDRETSCH, D. B., BELITSKI, M., & CHOWDHURY, F. Knowledge investment and search for innovation: Evidence from the UK firms. In: Journal of Technology Transfer. 2024, vol. 49, pp. 1387-1410. DOI: 10.1007/s10961-023-10045-7

MARKET POTENTIAL FOR MOLDOVAN NATURAL HONEY IN SWEDEN

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Abstract

This study explores the market potential and strategic pathways for introducing Moldovan natural honey into Sweden's health-driven, sustainability-focused consumer environment. As global demand for organic and authentic food products rises, the Swedish honey market presents timely opportunities for Moldovan exporters due to its openness to high-quality, eco-friendly imports. The report offers original insights by combining a detailed overview of Sweden's socio-economic landscape with an in-depth analysis of distribution channels, consumer behavior, and regulatory frameworks. It outlines the mandatory legal, safety, and certification requirements—including EU hygiene regulations, labeling laws, and private organic standards such as KRAV. Through the case of Vastdial & Co, the study demonstrates how cultural adaptation, trade fair participation, and targeted partnerships can enhance market entry. The findings conclude that with strategic positioning and regulatory compliance, Moldovan honey producers can successfully access Sweden's competitive natural food sector, building long-term partnerships rooted in quality, sustainability, and shared values.

Keywords: Moldovan natural honey, Swedish food market, Organic certification, Export strategy, Sustainable trade

JEL: Q13, M16

Introduction

In recent years, the global demand for natural and sustainably sourced food products has seen remarkable growth, with honey emerging as a standout item in health-conscious and eco-aware markets. Among these, Sweden represents a particularly attractive opportunity for exporters of high-quality natural honey, such as those from Moldova. Renowned for its progressive values, environmental awareness, and high living standards, Sweden combines a modern consumer base with a deep-rooted appreciation for nature and wellness—values that closely align with the qualities of natural honey.

This report explores the landscape of opportunities and requirements for introducing Moldovan natural honey into the Swedish market. It begins by offering an overview of Sweden’s social, economic, and cultural context, highlighting how its urban lifestyle, commitment to sustainability, and evolving food preferences make it an ideal destination for natural food products. It then delves into the structure of Sweden’s honey market, identifying key segments, consumer trends, and competitive players, while also mapping out viable distribution channels.

Critical to market entry is compliance with both legal and private standards, including EU food safety regulations, organic certifications, and Swedish-specific requirements for labeling and hygiene. Moldovan exporters, such as Vastdial & Co, must navigate a detailed framework of quality controls, testing protocols, and documentation procedures to ensure their products meet Swedish expectations.

In addition to regulatory compliance, successful market entry depends on cultural adaptability and strategic relationship-building. Sweden’s business environment emphasizes trust, transparency, and long-term partnerships—traits that require patience, respect for consensus-based decision-making, and cultural awareness. Participation in trade fairs, collaboration with local associations, and alignment with Swedish business values are essential for building lasting connections.

Through careful market research, regulatory readiness, and culturally attuned engagement, Moldovan honey producers can position themselves as valuable contributors to Sweden’s thriving natural food market. This report serves as a practical guide to navigating that journey, from production and certification to distribution and partnership.

Results obtained and discussions

Sweden, a Nordic country in Northern Europe, combines vast land with a relatively small population of around 10 million. It’s a modern, urbanized nation where the majority live in cities, and the population grows steadily—largely due to immigration. Though part of the EU since 1995, Sweden has kept its national currency, the Swedish krona.

Known for high living standards and strong purchasing power, Sweden also stands out for its unique social trends. Over half the population lives alone, driving demand for single-portion products in supermarkets. Health and sustainability shape consumer choices, with growing interest in vegetarianism, veganism, and locally produced foods.

Swedish consumers tend to value natural, health-oriented products—a trend reflected in the competitive honey market, where both local and international brands compete. This aligns well with Moldova’s natural honey, which may appeal to Sweden’s health-conscious demographic.

Economically, Sweden is diverse and innovation-driven, with global brands like Volvo and Ericsson and a thriving startup culture. While challenges like an aging population persist, Sweden remains a stable, progressive country with a strong welfare system and a forward-looking market—offering promising opportunities for quality imports like Moldovan honey.

Swedes have a deep-rooted appreciation for nature, health, and sustainability—values that naturally align with the appeal of natural honey. Seen as a healthier alternative to sugar, honey is used in everything from home remedies to traditional pastries enjoyed during *fika*, the country’s beloved coffee break ritual. It also holds a place in local culinary traditions and wellness routines, making it more than just a sweetener—it’s part of the lifestyle.

The Swedish market features a mix of established and niche honey brands. Notable players include Löfbergs, a coffee company with sustainable honey products; Astrid & Aporna, known for organic, fair trade foods; Scandic Honey, offering raw, local varieties; Nordic Honey, with a range of regional flavors; and Lundgrens, recognized for their creative honey innovations.



Figure 1. Key Segments and Market Players for Natural Honey in Sweden

Swedish consumers span a broad spectrum—from health-conscious individuals and eco-minded families to food lovers, holistic health users, and tourists looking for authentic souvenirs. This diverse demand creates space for high-quality foreign honey, especially when it aligns with values like purity, tradition, and sustainability.

Moldovan natural honey can tap into several key segments, including organic food shops, wellness stores, bakeries, and online platforms. Its quality, eco-friendly production, and rich flavor make it well-suited to Sweden’s evolving tastes. With the right positioning—especially in supermarkets, cafes, and artisan markets—Moldovan honey has strong potential to secure its place in this vibrant and health-driven market.

Emerging trends in Sweden’s natural honey market

Health consciousness is shaping Swedish food habits, fueling demand for natural alternatives like honey. While not yet a staple like rice or pasta, honey is gaining shelf space in mainstream supermarkets thanks to shifting consumer priorities and an active health food sector in search of the next big superfood.

As more people adopt low-carb or balanced diets, honey is increasingly viewed as a natural substitute for processed sugars and carbohydrate-rich foods. Consumers are also turning toward artisanal and locally sourced honey, attracted by its distinct flavors and the ethical, eco-friendly practices of small-scale producers.

Beyond its role as a sweetener, honey is now used in sauces, dressings, and baked goods, with specialty types like acacia, forest, and linden honey becoming more popular. Its traditional use

in natural remedies remains strong, while the rise of e-commerce has made it easier for consumers to explore both local and international honey varieties.

Transparency is another growing priority—buyers now seek certified organic, fair trade, or single-origin honey with clear traceability. This presents a strategic opportunity for producers like Vastdial & Co to gain a competitive edge through certification and a clear commitment to sustainability.

By aligning with these evolving trends—health, authenticity, eco-awareness, and quality—Moldovan producers can position themselves effectively in the Swedish market.

Regulatory requirements for moldovan natural honey in Sweden

To enter the Swedish market, Moldovan natural honey must meet a range of EU and national regulations aimed at ensuring food safety, consumer transparency, and fair trade. These rules cover everything from tariffs and taxes to packaging and labeling.

Sweden applies a 12% VAT on honey, influencing retail prices. While the EU's standard tariff for Moldovan honey (code 0409) is 17.3%, under the EU–Moldova Association Agreement, Moldovan exporters benefit from zero customs duties thanks to a preferential trade arrangement. However, compliance with general EU import rules remains essential.

Key EU import controls include:

Organic certification (Reg. R2306/21): Organic honey must meet strict EU standards to enter the market [1].

Veterinary inspections (Reg. R0632/21): Although honey is not of animal origin, it may still fall under certain food safety checks at EU borders [2].

Fair trade and customs codes: Moldova, as a non-EU country, must align with general rules on customs and duties for food imports.

Labeling must be clear, truthful, and follow EU Regulation No. 1169/2011, supplemented by Sweden's LIVSFS 2003:10 [5, 9]. Labels should include details such as origin, nectar type, producer name, and contact information. Misleading consumers through packaging or product descriptions is strictly prohibited under EU Regulation 178/2002 [2]. A Swedish guide titled “Märkning av honung – konsumentförpackning” helps exporters ensure their labels meet national requirements.

Swedish and EU laws require that honey producers follow hygiene and safety rules:

- EU Food Hygiene (Reg. 853/2004) [3]
- Animal-origin food rules (Reg. 853/2004) [4]
- Material safety for food contact (Reg. 1935/2004) [5]
- Market organization for agri-products (Reg. 1308/2013) [6]
- Sweden's national food laws and ordinances (e.g., LIVSFS 2005:20 and 2014:4) [10].

Together, these regulations create a transparent and consumer-focused market environment. For Moldovan producers like Vastdial & Co, understanding and complying with these legal standards is crucial to building trust and gaining access to Sweden's highly regulated food sector.

Beyond legal obligations, entering the Swedish natural honey market also requires alignment with private and organic certification standards recognized across the EU. These certifications are essential for producers aiming to position their honey as organic and eco-friendly—a quality increasingly valued by Swedish consumers.

One of the most widely accepted standards is the IACB Equivalent Organic Standard, created for producers outside the EU [6]. This certification mirrors EU organic regulations and was approved by the European Commission in 2010. It sets out strict rules on organic production, labeling, and distribution. Beekeepers certified under this system can use the EU's Euro-leaf organic label, signaling that their products meet rigorous environmental and health criteria. The standard spans various production areas such as plant-based foods, animal products, aquaculture, wine, and animal feed.

As of January 1, 2022, EU Regulation 2018/848 came into effect, replacing previous rules and further refining the framework for organic certification [1]. It provides clear guidelines for production, packaging, inspection, and distribution, reinforced through detailed secondary acts. Exporters certified under this regulation may also display the Euro-leaf symbol, signaling compliance with EU-wide organic norms. Inspections are overseen by accredited bodies like the International Organic Accreditation Service (IOAS), which ensures consistency and trust in organic labeling across borders.

Organic beekeeping must adhere to strict ecological standards. Hives should be made of natural materials, and only approved treatments may be used for pests like mites. There's also a required shift to using organic beeswax and a limit on introducing non-organic bees. Honey must be harvested without harming the bees or extracting honey with brood, ensuring ethical and sustainable production. Colonies should have sufficient natural food reserves to avoid artificial feeding outside of emergency situations.

For Moldovan producers aiming to enter Sweden's health-conscious, sustainability-driven market, obtaining these certifications is not just a formality—it's a pathway to building credibility and consumer trust.

Exporting natural honey to the Swedish and wider EU market involves a series of mandatory procedures designed to ensure food safety, product quality, and compliance with international standards. Producers like Vastdial & Co must adopt a structured approach throughout the production and export process.

A critical step is the implementation of a Hazard Analysis and Critical Control Point (HACCP) plan. This system identifies and manages potential risks during honey production, focusing on points in the process where hazards could be eliminated or reduced. It's a preventive strategy central to ensuring product safety and consistency.

To support international credibility, honey producers are also encouraged to comply with global food safety schemes such as Global G.A.P., which incorporates HACCP principles. Under Global G.A.P.'s Integrated Farm Assurance, beekeepers must monitor colony health, implement management plans, and undergo regular inspections, further promoting traceability and sustainability.

Verification is key. Producers are subject to HACCP Plan Verification Surveys, which assess whether their safety protocols are effectively implemented and maintained. These reviews play an important role in safeguarding both the production process and consumer trust.

Sampling and testing procedures are also crucial. Producers must regularly test honey batches for contaminants, ensuring compliance with EU safety thresholds. These checks include screening for residues, microbiological safety, and quality parameters such as sugar content and moisture levels.

A Health Certificate, in line with EU regulations for honey and bee products, must accompany every shipment to verify that the product meets the region's health and safety requirements. Without it, honey cannot legally enter the EU market.



Figure 2. The primary organic certifications within the Swedish market

Quality standards set by the EU and Sweden dictate that honey must be free from additives and foreign materials, contain specific levels of natural sugars, and comply with residue limits for substances like pesticides or antibiotics. Proper hygiene and safe handling practices must be observed throughout production and packaging.

To stand out in Sweden's highly ethical food market, certification adds significant value. The EU organic logo signals compliance with strict organic regulations, while KRAV certification, unique to Sweden, is even more demanding [16]. KRAV emphasizes sustainable production, biodiversity, and environmental protection—values that resonate deeply with Swedish consumers.

Between these safety protocols and certification schemes, Moldovan producers must ensure full compliance and transparent practices. For companies like Vastdial&Co, meeting these requirements is not only a necessity for market access but also a strategic step toward building a trusted brand in one of Europe's most health- and sustainability-conscious markets.

Quality Management Systems and Contaminant Standards for natural honey

To build trust and ensure consistency, honey producers aiming to export to Sweden or the EU are encouraged to adopt internationally recognized quality management systems. These certifications demonstrate a company's commitment to product excellence, safety, and continuous improvement across all operational stages.

Among the most widely accepted certifications is the International Food Standard (IFS), which validates high standards of food safety and quality. Similarly, ISO 9001:2015 focuses on strengthening internal processes and customer satisfaction through robust quality management systems [14]. For companies looking to affirm their global credibility in food safety, the Global Food Safety Initiative (GFSI) serves as an umbrella framework that encompasses several benchmarked standards.

Specific to food safety, ISO 22000 outlines comprehensive procedures for managing risks throughout the food chain—from sourcing raw materials to delivering finished goods. Meanwhile, FSSC 22000, based on ISO 22000, is tailored for food manufacturers and covers even stricter compliance criteria. These systems not only help ensure product integrity but also enhance marketability in countries like Sweden, where transparency and food safety are top consumer priorities.

In parallel, strict EU regulations address the issue of contaminants in honey. Natural honey, though minimally processed, must meet clearly defined thresholds for several substances to be considered safe for human consumption.

Pesticide residues are tightly controlled, with each type of pesticide subject to maximum residue limits (MRLs) that vary by honey type and origin. The EU maintains these limits at very low levels to protect consumer health.

Heavy metals, such as lead and cadmium, must also remain below critical thresholds—0.10 mg/kg for lead and 0.05 mg/kg for cadmium in honey. These limits are part of broader food safety policies that prevent long-term exposure to harmful elements.

Microbiological criteria are enforced to ensure that honey is free from dangerous pathogens and meets acceptable counts for naturally occurring microbes. These standards protect against spoilage and potential health risks.

While not contaminants in the traditional sense, allergens such as pollen must be declared if they originate from allergenic plants, allowing sensitive consumers to make informed choices.

Together, these certifications and safety standards form a comprehensive framework for producers like Vastdial & Co to align with. Embracing them not only ensures regulatory compliance but also opens doors to Sweden's competitive and quality-conscious honey market.

Bringing Moldovan natural honey to Swedish consumers involves a structured distribution network, where each player—from producer to retailer—has a distinct role in ensuring the product's journey is efficient and compliant. This process begins in Moldova, with companies like Vastdial & Co producing high-quality honey through partnerships with local beekeepers, and ends in Swedish homes, supermarkets, and cafés.

The supply chain follows a clear path. At the core are the Moldovan producers and suppliers, who oversee honey harvesting, processing, and packaging to meet both quality and regulatory standards. From there, Swedish importers and distributors take charge, handling transportation, customs procedures, and warehousing. These intermediaries are critical in navigating EU import regulations and ensuring the product is ready for local distribution.

Once in Sweden, the honey is distributed through multiple retail outlets, including large supermarket chains, neighborhood grocers, health food stores, and increasingly, online platforms. These retail avenues represent the main touchpoints where Swedish consumers purchase natural honey, each with specific packaging, pricing, and certification expectations.

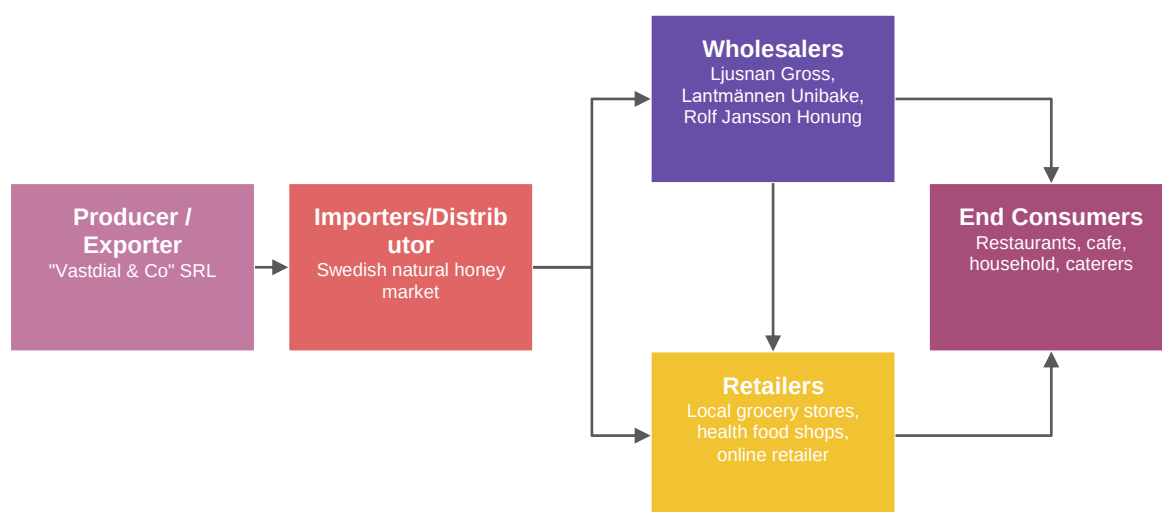


Figure 3. Distribution channel for Moldovan natural honey in the Swedish market

In addition to retail, wholesalers play a supporting role by supplying honey to smaller stores, restaurants, and cafés that emphasize natural or artisanal products. This channel is especially useful for reaching niche markets and specialty food.

Exploring business opportunities in Sweden's natural honey sector involves a strategic approach rooted in research, networking, and relationship-building. To effectively enter and thrive in this market, producers like Vastdial & Co must understand where the strongest prospects lie and how to engage with key players in the food industry.

A strong starting point is engaging with industry associations, which act as hubs for knowledge, collaboration, and visibility. The Swedish Beekeepers Association (Svenska Biodlares Riksförbund) is central to the country's honey sector, offering support and networking for those involved in beekeeping [15]. For broader engagement, the Swedish Food Federation (Livsmedelsföretagen) connects food and beverage producers across Sweden, providing valuable insight into trends and regulatory developments. Businesses focused on organic and health-conscious products will find Hälsans Kök a vital partner, linking companies in the organic food space—including honey producers.



Figure 4. Timeline of trade fairs in Sweden for 2025

Trade fairs offer unmatched access to market insights and potential buyers. These events allow exporters to showcase their products, develop business relationships, and gain exposure. In late 2025, key exhibitions include Sthlm Food & Wine and Bak & Choklad in Stockholm, bringing together food industry professionals from across Northern Europe. November also features the Nordic Organic Food Fair in Malmö, a leading event for sustainable and natural products. Early

2025 continues the momentum with the Fastfood, Cafe & Restaurant Expo and GastroNord & Vinordic, both major platforms for the HoReCa sector. The Nordic Food Industry Fair, taking place in Gothenburg in October 2025, offers a broad view of the regional food market, focusing on both end products and raw ingredients.

In addition to formal events, Vastdial & Co can leverage support from the Embassy of the Republic of Moldova. Embassies often facilitate introductions, host business forums, and assist in navigating local customs and regulatory frameworks—providing a strong entry point for Moldovan exporters.

Identifying the right partners is just as important as finding opportunities. Prospective collaborators must meet several key criteria:

- A solid reputation and consistent track record;
- Strict compliance with Swedish and EU laws on food safety and importation;
- Scalability and potential for growth alongside the business;
- Use of modern technologies and openness to innovation;
- A commitment to sustainability, especially important in Sweden’s eco-focused market;
- Strong quality control processes to ensure consistent standards;
- And finally, trusted references or testimonials from existing partners.

By combining targeted outreach, event participation, and careful partner evaluation, Moldovan honey producers can position themselves effectively within Sweden’s dynamic and quality-driven food sector. With preparation and persistence, companies like Vastdial & Co can create enduring and profitable connections in this promising market.

When entering the Swedish market, it’s important to strike a balance between offering something new—like Moldovan honey with its unique origin—and respecting Swedish preferences and traditions. Swedish consumers and partners appreciate authenticity but also value consistency with their established norms.

Long-term relationships are prioritized in Swedish business dealings. Partnerships are built gradually, with a focus on transparency, reliability, and shared values. This means short-term gains are often set aside in favor of building deep-rooted, mutually beneficial connections. For foreign businesses, patience and commitment are essential, as trust must be earned over time rather than assumed from the outset.

Work-life balance is also highly regarded in Sweden. Meetings are usually scheduled during regular office hours, and punctuality is taken seriously. If delays or schedule changes arise, timely and respectful communication is expected. Additionally, gender equality plays a prominent role in professional environments. Sweden is known for its inclusive approach, with both men and women equally active in the workforce and family life, reinforcing a culture of mutual respect and equity.

Conclusions

Sweden offers a promising market for Moldovan natural honey due to its high demand for organic, eco-friendly, and health-conscious food products. The Swedish consumer aligns well with the values of natural honey—authenticity, sustainability, and wellness.

Successful market entry requires full compliance with EU and Swedish regulations, including food safety standards, labeling laws, organic certifications (EU Organic and KRAV), and quality control systems such as HACCP and ISO 22000. Certification is both a regulatory necessity and a strategic differentiator.

Building long-term relationships is essential in Swedish business culture, where trust, consensus, and sustainability are central. Cultural adaptation, punctuality, and commitment to transparency are key for establishing credibility and lasting partnerships.

Participation in trade fairs, industry associations, and embassy-facilitated networking significantly enhances visibility and access to potential distributors and retailers. These platforms allow Moldovan producers to showcase product quality while aligning with Swedish market expectations.

References

1. European Commission. (2021). Regulation (EU) 2018/848 on organic production and labeling of organic products. Official Journal of the European Union. <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A32018R0848>
2. European Commission. (2002). Regulation (EC) No 178/2002 laying down the general principles and requirements of food law. Official Journal of the European Communities. <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX:32002R0178>
3. European Commission. (2004). Regulation (EC) No 852/2004 on the hygiene of foodstuffs. Official Journal of the European Union. <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A32004R0852>
4. European Commission. (2004). Regulation (EC) No 853/2004 laying down specific hygiene rules for food of animal origin. Official Journal of the European Union. <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A32004R0853>
5. European Commission. (2011). Regulation (EU) No 1169/2011 on the provision of food information to consumers. Official Journal of the European Union. <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A32011R1169>
6. European Commission. (2017). Regulation (EU) 2017/625 on official controls and other official activities. Official Journal of the European Union. <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A32017R0625>
7. European Commission. (1999). Regulation (EC) No 2204/99 on third country duties for honey imports. Official Journal of the European Union.
8. European Commission. (2010). International Accredited Certification Bodies (IACB) Equivalent Organic Production & Processing Standard for Third Countries. <https://ec.europa.eu>
9. Swedish Food Agency (Livsmedelsverket). (2003). LIVSFS 2003:10 – Regulations on honey. <https://www.livsmedelsverket.se>
10. Swedish Food Agency (Livsmedelsverket). (2005a). LIVSFS 2005:20 – Regulations on food hygiene. <https://www.livsmedelsverket.se>
11. Swedish Food Agency (Livsmedelsverket). (2005b). LIVSFS 2005:21 – Regulations on official control of foodstuffs. <https://www.livsmedelsverket.se>
12. Swedish Food Agency (Livsmedelsverket). (2011). LIVSFS 2011:7 – Materials in contact with food. <https://www.livsmedelsverket.se>
13. Swedish Food Agency (Livsmedelsverket). (2014). LIVSFS 2014:4 – Food information to consumers. <https://www.livsmedelsverket.se>
14. Swedish Food Federation (Livsmedelsföretagen). (n.d.). About us. <https://www.livsmedelsforetagen.se>
15. Svenska Biodlares Riksförbund (Swedish Beekeepers Association). (n.d.). Om Svenska Biodlares Riksförbund. <https://www.biodlarna.se>
16. KRAV. (n.d.). KRAV standards for organic food production. <https://www.krav.se>
17. International Organization for Standardization. (2015). ISO 9001:2015 – Quality management systems – Requirements. <https://www.iso.org>
18. International Organization for Standardization. (2018). ISO 22000:2018 – Food safety management systems – Requirements for any organization in the food chain. <https://www.iso.org>
19. GFSI – Global Food Safety Initiative. (n.d.). Recognized Certification Programmes. <https://mygfsi.com>
20. FSSC 22000. (n.d.). Food Safety System Certification Scheme. <https://www.fssc22000.com>
21. TARIC – European Commission. (n.d.). The integrated Tariff of the European Union. https://ec.europa.eu/taxation_customs/dds2/taric

INNOVATIONS IN THE FINANCING OF SMALL AND MEDIUM-SIZED ENTERPRISES AT THE INTERNATIONAL LEVEL

INOVAȚII ÎN FINANȚAREA AFACERILOR MICI ȘI MIJLOCII PE PLAN INTERNAȚIONAL

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Abstract

In the current context of the global economy, marked by accelerated digitalization, financial uncertainties, and rapid technological change, innovations in the financing of small and medium-sized enterprises (SMEs) play a crucial role in ensuring access to capital and supporting entrepreneurial development. This paper explores emerging international trends regarding alternative financing mechanisms such as crowdfunding, equity crowdfunding, peer-to-peer (P2P) lending, fintech platforms, and hybrid instruments. It analyzes how these innovations have contributed to the democratization of access to financial resources, the reduction of dependency on traditional banking institutions, and the support of start-ups and SMEs in their early stages of development.

Finally, the study proposes strategic directions for encouraging the innovative use of alternative financial instruments, with a focus on digitalization, public-private partnerships, and the integration of SMEs into global financial networks.

Keywords: Peer-to-peer financing, Crowdfunding, Fundraising, SMEs (Small and Medium-sized Enterprises), Fintech platforms, Participatory financing, Business angels, Business incubator

JEL: F37, G15

Introducere

Succesul economic al oricărui stat depinde în mare măsură de atingerea potențialului maxim de dezvoltare al întreprinderilor mici și mijlocii al acestuia. Într-un peisaj economic dinamic și digitalizat, afacerile, fie startup-uri inovatoare sau companii mici, au nevoie de soluții de finanțare rapide, flexibile și adaptate realităților actuale.

În contextul actual al economiei globale, caracterizat prin competitivitate acerbă, presiune pentru inovație și adaptare rapidă la schimbările pieței, eficientizarea managementului a devenit o necesitate strategică pentru întreprinderile autohtone.

Găsirea finanțării potrivite când există probleme de capital, încasare sau de lichidități, la început unei afaceri, pentru a achiziționa o nouă tehnologie de producție, a dezvolta un departament nou sau pentru a extinde un business, este esențială pentru a susține activitatea unei firme. Cunoașterea cât mai multor detalii despre ceea ce oferă piața de servicii financiare și împrumuturi dedicate startup-urilor, companiilor mici și mijlocii este vitală pentru o bună funcționare.

Dezvoltarea tehnologiei informaționale și digitalizarea economiilor a permis dezvoltarea unor noi forme de finanțare, alternative finanțărilor clasice și tradiționale. Înțelegerea, promovarea și aplicarea tehnicilor inovatoare alternative de finanțare a afacerilor în Republica Moldova va permite a impulsiona noi proiecte de dezvoltare a afacerilor și sectorului social, inclusiv.

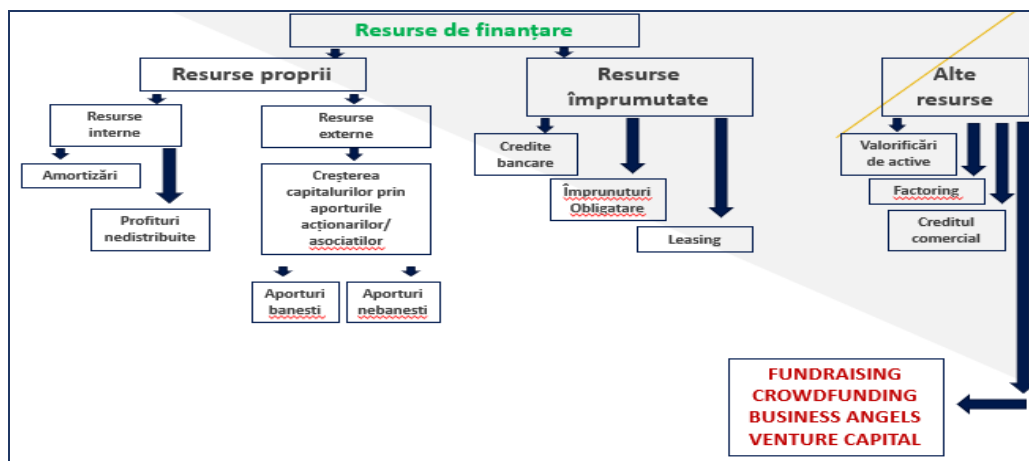


Figura 1. Locul finanțării alternative în sistemul resurselor de finanțare

Sursa: Elaborat de autori

Pe lângă sursele de finanțare deja bine cunoscute și mult descrise în literatura de specialitate cum ar fi finanțarea din surse proprii, ale membrilor familiei sau asociați, creditarea bancară sau împrumuturile, chiar și leasingul și factoringul, mai există multiple alte metode de obținere a finanțării, pe care ni le propunem spre descriere în cele ce urmează.

Rezultate obținute și discuții

Fundraising-ul – reprezintă procesul de solicitare și colectare a contribuțiilor voluntare de bani sau alte resurse, prin solicitarea de donații de la persoane fizice, întreprinderi, fundații caritabile sau agenții guvernamentale. Din început vom concretiza că practica internațională asociază fundraising-ul cu organizațiile non guvernamentale, deși sunt cunoscute destule practice de atragere a acestui tip de finanțare și de către micile afaceri.

Fundraising-ul implică existența a două componente complementare¹:

- procesul de colectare a contribuțiilor voluntare de bani sau alte resurse în urma solicitării donațiilor de la persoane fizice, organizații comerciale, fundații de caritate, instituții de stat.
- ansamblul de activități, metode și strategii care ajută organizațiile să atragă finanțare din exterior, pentru a-și acoperi necesitățile aferente funcționării lor.

Colectarea de fonduri nu este doar despre resurse financiare, dar și despre comunicare. Mai exact despre explicarea eficientă a cauzei pentru care militează organizația.

Orice colectare de fonduri necesită fonduri (resurse). Indiferent de metoda de colectare de resurse aleasă, pentru realizarea campaniei de fundraising este nevoie de resurse: umane, de timp, materiale, financiare.

Fiecare campanie de colectare de fonduri vizează 3 mari componente:

- organizația, ce intenționează să facă apel la fonduri;
- scopul, misiunea și viziunea organizației;
- donatorii.

¹ <http://fp7.asm.md>

Înainte de a se lansa într-un proces de atragere de resurse este absolut necesar de a crea un fondal informațional cu privire la organizația ce solicită fonduri - în față unui potențial donator este necesar de a fundamenta identitatea organizațională, nișa de dezvoltare a afacerii, scopul, misiunea, viziunea organizației.

Este important a argumenta complex și calitativ necesitatea de fonduri. În spatele fiecărei oferte de finanțare se află un anumit scop, care în final trebuie aliniat la scopurile finanțatorului.

Chestionând motivația persoanelor/fundațiilor de a oferi finanțare, s-au identificat mai multe scopuri sau intenții pe care aceștia le urmăresc:

- Realizarea scopurilor sociale;
- Dorința de a soluționa o problemă;
- Simțul utilității;
- Satisfacția de a oferi finanțare/ajutoare;
- Dorința de a-i ajuta pe alții;
- Satisfacția personală.

Selectarea potențialilor finanțatori oferă o mare diversitate de opțiuni. Din punct de vedere legal, e posibil a solicita fonduri de la orice agent economic, fundație, persoană fizică care desfășoară o anumită activitate în limitele legii. Este demonstrat că atragerea fondurilor de la cineva care a mai oferit suport organizației implică mai puține costuri decât atragerea fondurilor de la un donator nou. Ținând cont că donatorii se împart în mai multe categorii: care oferă suport o singură dată, care revin cu donații, donatori permanenți, scopul organizației este cultivarea unei relații cu donatorii pentru a obține adeziunea acestora la obiectivele organizației.

În calitate de metode utilizate în **Fundraising putem evidenția:**

- Un *eveniment de colectare de fonduri* (numit și strângere de fonduri) este un eveniment sau campanie al cărui scop principal este de a colecta resurse financiare pentru o cauză, caritate sau organizație non-profit. În cele mai dese cazuri asemenea evenimente sunt organizate de organizații caritabile, non-profit, religioase sau neguvernamentale, deși există multiple exemple de companii comerciale ce au apelat la asemenea metode de finanțare. Conform platformei Double the Donation 11% din totalul contribuțiilor în numerar ale companiilor comerciale sunt făcute prin programe de fonduri de finanțare².

- *Crearea și cultivarea relațiilor cu donatorii*. Majoritatea strategiilor de dezvoltare de strângere de fonduri împart donatorii într-o serie de categorii în funcție de cantitatea și frecvența donațiilor. De exemplu, finanțarea anuală și finanțarea recurentă reprezintă baza unei piramide de strângere de fonduri. Aceasta ar fi urmată de fonduri de nivel mediu, fonduri planificate, fonduri de importanță majoră și fonduri direcționate. Cercetări recente realizate de Adrian Sargeant și Proiectul de Eficacitate a Strângerii de Fonduri ale Asociației Profesioniștilor în Strângere de Fonduri sugerează că există mari rezerve în îmbunătățirea calității relațiilor cu donatorii. „Sectorul pierde, în general, 50-60% dintre donatorii săi nou-achiziționați între prima și a doua donație și unul din trei, de la an la an după aceea”³.

- O *campanie de colectare a fondurilor sau numită și campanie de capital* este „un efort intens de strângere de fonduri conceput pentru a strânge o anumită sumă de bani într-o perioadă de timp definită pentru a satisface nevoile variate ale afacerii: fie de construire a activelor unei

² <https://doublethedonation.com/matching-gift-statistics/>

³ https://thenonproffitimes.com/npt_management_tips/value-donor-loyalty/

organizații (ca ex. campania cărămidă și mortar, destinată renovării sau construirii de imobile” fie campania de dezvoltare cuprinzătoare, integrată sau totală, care vizează un program mai lung de strângere de fonduri bazat pe o analiză pe termen lung a nevoilor și direcții de dezvoltare a organizației⁴.

- *Colectare de fonduri responsabilă*. Unele organizații non-profit demonstrează o mai mare responsabilitate, arătând donatorilor impactul direct al eforturilor lor de strângere de fonduri. Această responsabilitate poate veni sub forma unui vot, în care membrii selectează un anumit program sau organizație caritabilă la care ar dori să meargă banii lor.

- *Colectare de fonduri prin apel la serviciile intermediarilor profesioniști*. Multe organizații non-profit profită de serviciile unor intermediari profesioniști, de regulă remunerați pentru serviciile lor fie prin comisioane care nu au legătură cu sumele de bani care urmează să fie colectate, fie prin reținerea unui procent din fondurile colectate (compensație bazată pe procente). Această ultimă abordare este interzisă în mod expres conform Codului de Etică al Asociației Profesioniștilor în Colectarea de Fonduri (AFP) din Statele Unite ale Americii⁵.

- *Colectare de fonduri online și cu ajutorul telefoanelor mobile*. Această metodă a devenit populară în ultimii ani datorită accesibilității sale. Organizațiile de strângere de fonduri dezvoltă opțiuni tehnice, cum ar fi aplicații mobile și butoane pentru donații, pentru a atrage donatori din întreaga lume. Conform datelor preliminare pentru anul 2024 în SUA și Canada, strângerea de fonduri digitale ar reprezenta circa 63% din total donații comparativ cu 12% în 2018⁶.

Crowdfunding - finanțare participativă sau multifinanțare.

O metodă care devine interesantă și pentru piețe de investiții din țările Europei de est și pentru cei dornici să-și finanțeze o afacere, este cea de crowdfunding. Aceasta mai este cunoscută și sub numele de finanțare participativă și este o modalitate prin care se pot obține surse de finanțare de pe platforme sau de la grupuri specializate în acest gen de investiții.

Crowdfunding-ul este o tehnică de finanțare a proiectelor folosind resurse online (forumuri, platforme de socializare etc.) desprinsă din **crowdsourcing**. La baza ei stă ideea de a apela la o comunitate ca un potențial finanțator pentru a dezvolta un produs.

Deosebirea între sourcing și funding este resursa pusă în joc de cei interesați – banul.

De fapt, ideea de crowdfunding (multifinanțare) este mult mai veche decât se crede.

În 1865 Frederic-Auguste Bartholdi, un tânăr sculptor francez a avut la Versailles o discuție cu Edouard de Laboulaye, un cunoscut istoric și admirator al Statelor Unite ale Americii. De Laboulaye a menționat că peste 10 ani, în 1875, America urma să împlinească 100 de ani și s-a gândit că un cadou memorial pentru această ocazie ar fi un gest binevenit din partea Franței. Bartholdi a avut ideea unei statui imense a unei femei numită „Libertatea Iluminătoare a Lumii”. Statuia în sine urma să fie plătită de francezi, iar pedestalul de americani.

Câțiva ani mai târziu Bartholdi a înființat Uniunea Franco-Americană, un grup de suporterți americani și francezi, menit să strângă bani pentru statuie. L-a recrutat apoi pe Alexandre-Gustave

⁴ Robert Pierpont, "Capital Campaigns at the Wayback Machine" (2002). Center on Philanthropy, Indiana University – Purdue University Indianapolis, https://web.archive.org/web/20110904104428/http://www.philanthropy.iupui.edu/TheFundRaisingSchool/PrecourseReadings/precourse_capitalcampaignspierpont.aspx

⁵ https://web.archive.org/web/20061206142837/http://www.afpnet.org/ka/ka-3.cfm?content_item_id=1068&folder_id=897

⁶ <https://doublethedonation.com/nonprofit-fundraising-statistics/>

Eiffel (părintele Turnului Eiffel) pentru a proiecta statuia. Pe măsură ce aniversarea se apropia, proiectul se târăgăna și colectarea fondurilor pentru construcția statuii, în Franța, mergea din ce în ce mai prost. Dar Bartholdi nu s-a dezis de idee și în 1880 a inițiat organizarea unei loterii a „libertății”. Din fericire legislația franceză permitea organizarea loteriilor pentru cauze artistice sau caritabile, deci proiectul a fost aprobat de guvern. Premiile erau modele miniaturale ale statuii. A durat ceva timp, dar ideea a dat roade.

În America, însă, lucrurile nu stăteau la fel de bine. Statul nu a aprobat finanțarea proiectului, iar donațiile veneau greu și erau foarte mici. În 1883 Pulitzer a făcut apel la demnitatea și mândria americanilor și le-a cerut donații cât mai mici pentru a putea strânge suma necesară construirii pedestalului pe care urma să fie expusă statuia, explicându-le că e o rușine pentru poporul american să nu fie în stare să se mândrească cu cadoul oferit de francezi. Oamenii au îmbrățișat ideea și banii au început a veni din toată țara, indiferent cât de puțini bani se trimiteau. Adunați, banii au fost suficienți pentru a finaliza construcția⁷.

La ora actuală, tot ce a făcut internetul, a fost să ofere o metodă mai ușoară de a dizolva informația și de a aduna oameni dispuși să ofere bani pentru a susține anumite proiecte. Altfel spus, se discută de o abordare la scară diferită și mult mai complexă. Există un public țintă mult mai larg și mai nișat. În acest context posibilitatea de a crea „comunități de finanțare” devine una foarte mare, cât timp abordarea se face la nivel global. Dar această dezvoltare naște problema viabilității tehnicii de crowdfunding.

Crowdfunding-ul este în esență o strategie de marketing implementată fie înaintea fie în timpul producției unui produs cultural, social sau politic (acestea sunt cele mai abordate nișe, desigur că această tehnică poate fi adaptată și utilizată în orice domeniu). În mare parte este vorba despre fundraising, dar o formă evoluată care tinde să elimine sistemul de donație și îl înlocuiește cu o metodologie de tip recompensă.

Sistemul este relativ simplu. Inițiatorii unui proiect creează în jurul lor o rețea socială căreia îi pune la dispoziție câteva servicii legate de proiect. Membrii rețelei oferă bani în schimbul serviciilor la care au acces, ajutând astfel crearea sau dezvoltarea produsului respectiv. În cel mai optimist caz vorbim de un sistem financiar foarte bine gândit, având în vedere că finanțarea nișată asigură în mare parte distribuția ulterioară a produsului finit, fiind, astfel, departe de problema cheltuielilor inutile și eșecul proiectului vizat. Problema intervine atunci când detaliile sistemului nu sunt bine puse la punct sau ignorate. Deci înainte de a lua în calcul crowdfunding-ul ca sursă de finanțare trebuie analizate atât punctele tari cât și, mai important, punctele slabe ale proiectului sau afacerii. De această analiză ține succesul financiar al proiectului, cel puțin până la finalizarea produsului principal.

Puncte slabe

Puterea rețelei sociale create. Dacă rețeaua creată în jurul produsului nu este suficient de încheată, este improbabil ca suma de bani strânsă în urma crowdfunding-ului să fie suficientă.⁸ De aceea este foarte important alegerea publicului țintă, nișarea exactă și comunicarea în cadrul rețelei, creând astfel o rețea strânsă, ai cărui membrii pot realiza legături rapide și eficiente. Abordarea directă a targetului implică o strategie de risc, un plan de rezervă dar și un posibil succes.

⁷ Surowiecki, James. *The Wisdom of Crowds*. New York: Anchor Books, 2005

⁸ Lawton, Kevin; Marom, Dan. *The Crowdfunding Revolution: Social Networking meets Venture Financing*. New York: 2010

Importanța puterii rețelei sociale crește pe măsură ce proiectul avansează. Dacă lucrurile se destramă aproape de final, riscurile financiare și legale cresc.

Suma necesară. Sistemul de crowdfunding își pierde eficiența cu cât suma de bani necesară este mai mare. Indiferent de puterea financiară a publicului vizat, această tehnică este foarte riscantă cât timp există sume mari în joc. Ideală este alegerea unei finanțări parțiale a proiectului prin acest sistem și obținerea fondurilor complementare pe alte căi. Desigur, suma posibilă este direct proporțională cu mărimea rețelei sociale și cu nișa publicul țintă. De aceea trebuie creată mai întâi rețeaua și apoi stabilită suma în buget. Totuși un proiect cu necesar mic de fonduri poate să existe cu o finanțare crowdfunding de 100%.

Produsul final. Cu cât produsul final este mai credibil, cu atât este mai ușoară strângerea de fonduri. Dacă oamenii au încredere în produs, sunt dispuși să dea bani. De aceea partea de PR a proiectului este extrem de importantă încă din primele stagii. Comunicarea cu publicul devine astfel un aspect vital. De fapt ideea care trebuie luată în calcul este că publicul devine într-o măsură sau alta finanțatorul proiectului. De aceea trebuie tratat ca atare. De asemenea pentru ca produsul final să fie viabil, ideea inițială și planul de acțiune creat la început sunt elemente cheie ale proiectului.

Sistemul de recompensare. Dacă acest sistem nu este bine pus la punct riscul de a strânge prea puțini bani sau chiar deloc crește substanțial. Sunt recomandate recompense cât mai personale și cât mai diferențiate, organizate într-o structură ierarhică bine implementată. Secretul stă în atragerea investitorilor și în recompensarea lor cât mai exactă, fără a pierde bani. Pentru zece dolari este suficient un tricou de un dolar, dacă acel tricou dă impresia că e creat special pentru cel care a dat banii. Pentru 1000 de dolari sunt aproape inutile produsele materiale (în general promoționale), ele fiind asociate cu suvenirurile, iar o astfel de investiție trebuie să-ți aducă mai mult decât un suvenir. Se cere deci un sistem echivalent valoric. Cu cât sistemul este mai complex cu atât investițiile vor veni în număr mai mare.

Puncte tari

Sursă de finanțare cu efort scăzut. Spre deosebire de alte metode, crowdfunding-ul nu necesită o muncă enormă. Este suficient un ochi bun și un creier dezvoltat pentru a face rost de sume decente de bani. Desigur depinde de proiect și de inițiatorul lui. Dar cu atâtea posibilități în față, primul pas este cel mai important. Desigur sistemul nu trebuie subestimat. Vorbim de interacțiune directă între finanțator și proiectul finanțat, deci implementarea unor strategii bine gândite trebuie făcută cu seriozitate. Deși munca fizică nu este copleșitoare, munca intelectuală trebuie să dea randament de 100%.

Puterea social media. Anul 2010 a fost anul decisiv pentru Facebook și Twitter. S-au impus ca lideri pe segmentele lor de piață și au crescut intens zi de zi. Acest lucru permite dezvoltarea unui sistem de crowdfunding în jurul acestor rețele, fiind necesară implicarea unui număr mai mic de resurse financiare decât în crearea unei rețele proprii. În plus există formate deja comunități pe o gamă variată de domenii, posibil și pe cel de care este nevoie. Totodată social media înseamnă globalizare și facilitarea accesului la un public foarte larg și nișat.

Distribuție și promovare sigură. Odată strânși banii necesari și creat produsul final, intrarea lui pe piață se face printr-o strategie de marketing pornită de la 0. În cazul crowdfunding-ului abordarea se schimbă, deoarece există deja un public format în jurul produsului, datorită rețelei sociale și a investitorilor în număr mare din spatele lui. Astfel se beneficiază de o promovare mouth-to-mouth de primă mână în care este implicat interesul personal al investitorilor.

Tabelul 1. Cele mai cunoscute platforme de crowdfunding în plan internațional

Indicatori vizati	Indiegogo	Kickstarter	Patreon	GoFundMe	Fundly	Funding Circle
Fondat	2008	2009	2013	2010	2009	2010
Vizitatori	Peste 15 milioane persoane în fiecare lună	Aproximativ 21 de milioane persoane în fiecare lună	Aproximativ 6 milioane persoane pe lună	Aproximativ 7,5 milioane persoane în fiecare lună	Aproximativ 1,9 milioane persoane pe lună	100.000 de întreprinderi mici din întreaga lume
Proiecte finanțate	Peste 800.000 proiecte	Peste 200.000 proiecte	187.000 de Proiecte/ artiști susținuți	peste 150 de milioane de dolari colectați	s-au colectat circa 330 de milioane de dolari	11,5 miliarde de lire sterline împrumutate
Tip	Model de recompensă. Susținătorii (persoanele care donează pentru a sprijini un proiect) primesc o recompensă sau un „perk” non-monetar.	Model de recompensă. Bazat pe modelul „totul sau nimic” care permite a stabiliți un obiectiv de finanțare și în câte zile se va atinge. Dacă nu se îndeplinesc ambele ținte, proiectul nu este finanțat și banii sunt returnați potențialilor susținători. Odată ce un proiect este finanțat, investitorii primesc o recompensă.	Model de recompensă. Tipul și cantitatea de conținut exclusiv la care au acces susținătorii depinde de nivelul de contribuție lunar pe care îl aleg. Aceste niveluri fixe de plată sunt stabilite de artist (de exemplu, oferind fanilor opțiunea de a contribui cu 5 USD, 10 USD sau 15 USD pe lună).	Model de donație. Cheia succesului acestei platforme este simplitatea ei: pentru a crea o campanie este necesar a stabili obiectivul, a expune povestea (poate inclusiv fotografii și videoclipuri) și a promova proiectul prin intermediul rețelelor sociale, mesaje și e-mailuri. GoFundMe. poate retrage finanțarea oricând, chiar dacă nu s-a atins obiectivul.	Model de donație. Platforma solicită crearea unui profil, partajarea proiectului, descărcarea aplicației pentru a gestiona campania și utilizarea funcției integrate Facebook OpenGraph pentru a-l promova pe Facebook.	Model de împrumut. Pentru înregistrare pe FundingCircle se va completa formularul și se va descrie proiectul. Pe baza ideii, platforma aprobă sau respinge cererea de finanțare (suma maximă aplicată nu va depăși 500.000 GBP).
Cost	Indiegogo percepe un comision de 5% din fondurile colectate. Pentru	Crearea campaniei este gratuită. Dar la atingerea obiectivul, Kickstarter	Artiștii plătesc un comision platformei, iar procentul variază între planuri,	Nu există nicio contribuție obligatorie la platformă. Dar se va percepe un	Se va percepe un comision de 4,9% din suma totală a fondurilor strânse, plus	Se va plăti investitorilor o dobândă lunară (între 4,5 și 6,5%) la suma împrumutată.

	procesarea plăților este reținut un comision cuprins între 3% și 5%.	percepe un comision de 5% din finanțare. De asemenea, se va percepe comision furnizorului de plăți, Stripe, care constituie între 3 și 5%.	variind de la 5% la 12% din colecțiile lor lunare	comision pentru plățile efectuate cu cardul de credit sau de debit (2,9% din suma donației + 0,25 €) care este dedus din suma donației.	un comision de 2,9% la donațiile cu cardul de credit.	
Limbi	Doar limba engleză	7 limbi.	7 limbi.	7 limbi.	Doar limba engleză	Platforma este disponibilă în engleză, germană și olandeză

Sursa: Adaptată de autori în baza https://www.jimdo.com/blog/best-crowdfunding-small-business/?gad_source=1&gclid=CjwKCAiAxea5BhBeEiwAh4t5K1_1vYfRrhZqxuFwwxnpTZqiRCwFyWcq_BxVEuiwZoi5q6DWBblKyxoCzzUQAvD_BwE

Una din platformele de crowdfunding din Moldova este platforma <https://www.particip.md/>, care oferă posibilitate doritorilor de a investi și celor ce caută resurse pentru finanțarea ideii sale de afaceri de a se întâlni și a conlucra în astfel de domenii precum caritate, creație, infrastructură, sport, meșteșugărit, business, etc. O altă platformă de finanțare a ideilor de afaceri este www.fagura.md. Vom menționa că crowdfunding-ul în țara noastră este supus unor reglementări legale sub vizorul Băncii Naționale a Moldovei, dat fiind specificul operațiunilor, acestea fiind înglobate în noțiunea de împrumut. Astfel, pentru protecția clienților, legislația națională stabilește următoarele limite⁹:

- Valoarea mijloacelor bănești ce pot fi acumulate pentru un singur proiect de finanțare participativă (cu excepția împrumuturilor de consum) nu poate depăși 1 milion de euro, iar termenul de acumulare a investițiilor nu poate fi mai mare de 12 luni;
- Valoarea mijloacelor bănești ce pot fi acordate unui debitor-consumator în calitate de împrumut de consum nu poate depăși 7 500 de euro, iar termenul de acumulare a investițiilor nu poate fi mai mare de 6 luni;
- Investitorii nesofisticați pot investi, în decursul unui an, maximum 200 de euro pentru un singur debitor-consumator sau 5 000 de euro într-un singur proiect de finanțare participativă;
- Investitorii nesofisticați pot investi maximum 10 000 de euro pe an pentru totalul investițiilor în finanțare participativă, din care, cel mult, 3 500 euro pot fi îndreptate în împrumuturi de consum.

Business angels

Această finanțare este oferită de un investitor sau un grup de investitori care sunt convinși de potențialul oferit de prezentarea unei afaceri sau de planul de redresare și schimbare conceput de o firmă solicitantă. În general este nevoie de multă originalitate, ingeniozitate, talent în afaceri și de

⁹ <https://bnm.md/ro/content/platformele-de-finantare-participativa-crowdfunding-crowdlending-crowdinvesting-cum>

prezentare pentru a veni cu ceva convingător pentru această categorie de investitori, care sunt foarte atenți și experimentați. Prin astfel de finanțări au reușit multe startup-uri din IT și Tehnologie. În funcție de noutate și impact, obținerea banilor necesari poate fi mai ușoară decât de la o bancă.

Un business angel este o persoană privată, adesea cu o valoare netă mare și, de obicei, cu experiență în afaceri, care investește direct o parte din activele lor în afaceri private noi și în creștere¹⁰. Business angels pot investi individual sau ca parte a unui sindicat în care un înger preia de obicei rolul principal. Pe lângă capital, investitorii îngeri oferă antreprenorului experiență de management al afacerilor, abilități și contacte. Îngerii cu experiență știu, de asemenea, că ar putea fi nevoiți să aștepte o rentabilitate a investiției lor.

Prin urmare, aceasta pot fi o sursă bună de capital „inteligent și răbdător”. Business angels joacă un rol important în economie. În multe țări, acestea constituie a doua cea mai mare sursă de finanțare externă în noile întreprinderi, după familie și prieteni. Aceștia sunt din ce în ce mai importanți ca furnizori de capital de risc și contribuitori la creșterea economică și la progresele tehnologice.

Business Angels Moldova (BAM) este o organizație bazată pe membri, care reunește un grup de oameni de afaceri privați cu experiență și directori seniori dornici să investească capital și timp în startup-uri și afaceri mici¹¹. Membrii BAM beneficiază de due diligence și asistență juridică, precum și de o varietate de programe educaționale și evenimente de networking, având ca scop consolidarea portofoliului de investiții și a rețelei de startup-uri.

Business Angels Moldova colaborează strâns atât cu investitori, cât și cu startup-uri, acționând ca punte de legătură între aceștia. Contribuie la creșterea comunității de investitori îngeri în Moldova și sprijină investitorii cu programe educaționale, due diligence și startup scouting. Ajută startup-urile să acceseze finanțare, mentorat și conexiuni.

Uniunea Europeană a creat European Business Angels Network, în calitate de organizație de supraveghere și monitorizare a activității business-angel în țările membre și a crea baza legislativă și stimulatorie a finanțării afacerilor prin aceste instrumente. Spre ex. în anul 2022 organizația a raportat 1,255 miliarde EUR finanțate prin intermediul business angel, direcționate în 4789 proiecte în domeniile sănătății (18%), programare pentru business (16%), tehnologii în domeniul financiar (12%), etc¹².

O formă alternativă de finanțare ar putea capitalul cu risc sporit sau numit și venture capital. **Companiile de venture capital** sau capitalul de risc sunt fonduri gestionate profesional care investesc în afaceri cu potențial imens de dezvoltare, dar și riscuri asociate sporite. Capitalul de risc oferă expertiză, mentorat, evaluând afacerea în termeni de sustenabilitate și expansiune. Investițiile de capital de risc pot fi adecvate pentru întreprinderile mici care au trecut de faza de pornire și generează deja venituri. Aceste fonduri urmăresc în mod eficient progresul companiei în care au investit, asigurând astfel sustenabilitatea și creșterea investițiilor lor.

Capitalul de risc (cunoscut și sub denumirea de „VC”) este o formă de capital privat și finanțare oferită întreprinderilor mai noi și startup-urilor cu potențial de creștere pe termen lung. Acest capital este furnizat de bănci de investiții, investitori individuali sau firme dedicate în mod special investițiilor cu capital de risc¹³. Valoarea oferită de capitaliștii de risc se extinde adesea

¹⁰ <https://cursuri.youth.md/lessons/fundraising-sau-strangerea-de-fonduri/>

¹¹ https://single-market-economy.ec.europa.eu/access-finance/policy-areas/business-angels_en

¹² <https://www.eban.org/eban-annual-statistics-compendium-for-2023/>

¹³ <https://www.businessangels.md/who>

dincolo de forma monetară, incluzând expertiza tehnică sau managerială, precum și rețeaua și alte resurse ale acestora.

Capitalul de risc a devenit o sursă populară de finanțare inițială pentru companiile care doresc să strângă capital fără credit, istoric de operare sau garanții pentru a obține un împrumut tradițional de la o bancă. Deoarece aceste proiecte de regulă vizează întreprinderi cu risc ridicat și cu recompense sporite, finanțatorii capitalurilor de risc își asumă adesea o participație semnificativă, adesea împreună cu un rol de lider în activitatea și operațiunile afacerii. Înainte de a investi, capitaliștii de risc efectuează diligența necesară, care include o investigație asupra echipei de management, produselor, istoricului, situațiilor financiare și modelului de afaceri al întreprinderii.

Există mai multe etape de finanțare cu capital de risc.

Etapa de finanțare este direct corelată cu evoluția și maturitatea unei întreprinderi – de la doar o idee la aproape gata pentru o IPO¹⁴. În timp ce sumele și runde de finanțare se modifică în timp și în funcție de industrie, iată o listă utilă de runde împreună cu o sumă tipică strânsă.

Etapa preinvestire

Rude, prieteni și familia: De obicei <50. 000 USD;

Business Angels (Îngeri): De obicei 25 -100 mii USD.

Etapa de derulare a investiției:

Adesea 500. 000 USD - 2 Mil USD;

Runda 1: Adesea 2-15 \$ Mil USD;

Runda 2: Adesea 10-30 Mil USD;

Runda 3: Adesea 20-50 Mil USD.

Evaluările recente continuă să crească, în special în sectorul tehnologic. Aceste valori sunt furnizate pentru a oferi o estimare aproximativă, în timp ce valorile reale variază foarte mult.

Incubatoare de afaceri

De regulă incubatoarele de afaceri sunt entități non-profit care susțin inițiativele antreprenoriale și oferă consultanță și ajutor în perioada de început a unei firme. Acest ajutor poate să constea în foarte multe aspecte, plecând de la oferirea unui birou gratuit, formare și cursuri de specialitate, asistență juridică, consultanță, mentorat, până la acces la diverse forme de finanțare, precum crowdfunding sau business angels, contacte cu investitori etc.

Această formă de suport este foarte importantă pentru startup-uri și companii unde fondatorii au idei bune, dar mai puțină experiență în administrare și afaceri. În cadrul Incubatoarelor de Afaceri antreprenorii incubati sunt asigurați cu spațiu pentru activitate, suport consultativ, asistență profesională, tehnică și administrativă. Perioada de incubare este de până la 3 ani.

În Țara noastră în anul 2013 a fost creată Rețeaua Incubatoarelor de Afaceri din Moldova (RIAM) de către ODA cu suportul Uniunii Europene. Membrii RIAM sunt Incubatoarele de Afaceri: Ștefan-Vodă, Dubăsari, Leova, Ceadâr-Lunga, Rezina, Nisporeni, Sângerei, Soroca, Cimișlia, Cahul și Călărași.

¹⁴ IPO - Oferta Publică Inițială (în engleză Initial Public Offering, IPO) este un termen din domeniul pieței de capital ce denumește oferta inițială de acțiuni a unei societăți ce urmează să fie cotate la bursă.

Concluzii

În **concluzie** vom menționa că subfinanțarea sau insuficiența banilor reprezintă una dintre cele mai frecvente probleme cu care se confruntă cele mai multe companii mici și mijlocii, fie că sunt la început, fie că sunt în proces de extindere sau dezvoltare.

Accesul la surse de finanțare, linii de credite bancare și împrumuturi nebankare este vital pentru funcționare și derularea activității antreprenoriale în condiții normale, atunci când există probleme de lichidități, inflație sau crize economice.

Surse de finanțare a afacerii menționate în acest capitol reprezintă o paletă diversificată, din care pot fi alese mai multe variante, în funcție de idea de business, plan de afaceri, stadiul de evoluție a businessului, dorința de extindere, nevoia de lichidități.

În Republica Moldova se înregistrează deja primii pași concreți în direcția promovării tehnicilor inovative, ceea ce reprezintă un semnal pozitiv pentru dezvoltarea ecosistemului antreprenorial și pentru adoptarea noilor tehnologii.

Susținerea inovării, a înnoirii tehnologice și a îmbunătățirilor investiționale în sectorul întreprinderilor mici trebuie să fie asigurată prin politici publice coerente, care includ atât programe guvernamentale dedicate, cât și prevederi legislative adecvate menite să faciliteze accesul la resurse și stimulente.

Difuzarea și promovarea metodelor și tehnicilor moderne de atragere a capitalurilor trebuie consolidată prin activități educaționale și de informare, precum training-uri specializate, mese rotunde și întâlniri interactive între reprezentanții mediului de afaceri și experți în finanțare.

Este necesară stimularea oportunităților de asistență integrată — financiară, managerială, de marketing și tehnică — pentru întreprinderile care doresc să acceseze noile modalități de finanțare, inclusiv prin implicarea activă a companiilor de consultanță în afaceri, care pot facilita tranziția și adoptarea rapidă a acestor soluții.

Bibliografie

1. BERGER, A. N., & UDELL, G. F. (2006). A More Complete Conceptual Framework for SME Finance. *Journal of Banking & Finance*, 30(11), 2945–2966. <https://doi.org/10.1016/j.jbankfin.2006.05.008>
2. CUMMING, D. J., & SCHWIENBACHER, A. (2018). *Financing Entrepreneurs: Crowdfunding, Venture Capital and Angel Investment*. Handbook of Research on Crowdfunding, Edward Elgar Publishing.
3. LAWTON Kevin; MAROM Dan. *The Crowdfunding Revolution: Social Networking meets Venture Financing*. New York: 2010
4. PIERPONT Robert, "Capital Campaigns at the Wayback Machine" (2002). Center on Philanthropy, Indiana University – Purdue University Indianapolis, https://web.archive.org/web/20110904104428/http://www.philanthropy.iupui.edu/TheFundRaisingSchool/PrecourseReadings/precourse_capitalcampaignspierpont.aspx
5. SUROWIECKI James. *The Wisdom of Crowds*. New York: Anchor Books, 2005
6. TUFANO P. (2003). Financial Innovation. *The Handbook of the Economics of Finance*, 1, 307–335. [https://doi.org/10.1016/S1574-0102\(03\)01014-0](https://doi.org/10.1016/S1574-0102(03)01014-0)
7. Banca Națională a Moldovei (2022). Accesul IMM-urilor la Finanțare în Republica Moldova. <https://bnm.md>
8. Cambridge Centre for Alternative Finance (2021). *Global Alternative Finance Market Benchmarking Report*. University of Cambridge. <https://www.jbs.cam.ac.uk/faculty-research/centres/alternative-finance/>
9. Comisia Națională a Pieței Financiare (2024). Legea nr. 181/2023 privind Finanțarea Participativă. <https://www.cnpf.md>
10. European Commission (2020). *Capital Markets Union: Action Plan on Financing Innovation*. Brussels. https://ec.europa.eu/info/publications/cmu-action-plan_en
11. Fagura (2023). Raport de Impact: Finanțare prin platforme digitale în Moldova. <https://fagura.com>
12. OECD (2020). *SME and Entrepreneurship Outlook 2020: Financing Innovative Firms*. OECD Publishing. <https://doi.org/10.1787/34907e9c-en>

13. StartUp Moldova (2024). Raportul Ecosistemului de Startup-uri din Republica Moldova. <https://startupmoldova.digital>
14. UNDP Moldova (2023). Instrumente Alternative de Finanțare pentru Comunități și IMM-uri în Moldova. <https://www.undp.org/ro/moldova>
15. World Economic Forum (2022). The Future of Capital Markets: Democratizing Access to Innovation Finance. Geneva. <https://www.weforum.org/reports>
16. <http://fp7.asm.md>
17. <https://bnm.md/ro/content/platformele-de-finantare-participativa-crowdfunding-crowdlending-crowdinvesting-cum>
18. <https://cursuri.youth.md/lessons/fundraising-sau-strangerea-de-fonduri/>
19. <https://doublethedonation.com/matching-gift-statistics/>
20. <https://doublethedonation.com/nonprofit-fundraising-statistics/>
21. https://single-market-economy.ec.europa.eu/access-finance/policy-areas/business-angels_en
22. https://thenonproftimes.com/npt_management_tips/value-donor-loyalty/
23. https://web.archive.org/web/20061206142837/http://www.afpnet.org/ka/ka-3.cfm?content_item_id=1068&folder_id=897
24. <https://www.businessangels.md/who>
25. <https://www.eban.org/eban-annual-statistics-compendium-for-2023/>
26. https://www.jimdo.com/blog/best-crowdfunding-small-business/?gad_source=1&gclid=CjwKCAiAxea5BhBeEiwAh4t5K1_1vYfRrhZqxuFwwxnpTZqiRCwFyWcq_BxVEuiwZoi5q6DWBblKyxoCzzUQAvD_BwE

S2

**THE SUSTAINABLE DEVELOPMENT OF COOPERATIVES AND THEIR
CONTRIBUTION TO ACHIEVING THE SDG_s**

**DEZVOLTAREA SUSTENABILA A COOPERATIVELOR ȘI CONTRIBUȚIA LOR LA
REALIZAREA ODD**

INTERNATIONAL YEAR OF COOPERATIVES 2025: COOPERATIVES IN SUSTAINABLE DEVELOPMENT AND AGENDA 2030

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Abstract

With the proclamation of the International Year of Cooperatives 2025, a new opportunity arises to strengthen the role of cooperatives in achieving the Sustainable Development Goals (SDGs). With only five years remaining until the 2030 deadline, current progress is proving insufficient. The United Nations General Assembly has assigned cooperatives a renewed strategic role in promoting economic, social, and environmental development. Its Resolutions recognise cooperatives as key actors in the fight against poverty, hunger, and environmental degradation. This study focuses specifically on United Nations resolutions, highlighting references to Goal 13 of the 2030 Agenda (Climate Action) and the 2024 UN General Assembly Report on the implementation status of the SDGs. The paper also presents selected case studies of international cooperatives engaged in environmental initiatives. The International Year of Cooperatives 2025 represents a strategic opportunity to strengthen the legal recognition of cooperatives within the framework of international environmental law and to promote the implementation of the core principles of the 2030 Agenda for Sustainable Development. The contribution is structured into four sections: definition of cooperative principles, UN legal framework, cooperation and sustainable development, and final considerations.

Keywords: International cooperatives; International law; UN Resolutions; Agenda 2030; Climate Change

JEL: K33, L31, L52, O10, P16

1. Introduction

The proclamation of 2025 as the International Year of Cooperatives by the United Nations General Assembly (Resolution 78/289 of June 19, 2024) represents a significant step in the formal recognition of the role of cooperatives within contemporary international law (UN GA Res.). Founded on democratic participation, equity, and sustainability (ICA), cooperatives are increasingly viewed as key actors in inclusive and sustainable development processes, in line with the Sustainable Development Goals (SDGs) of the 2030 Agenda.

While international law has traditionally recognised states as its primary subjects, it has gradually opened normative and political spaces for non-state actors, such as civil society organisations and cooperative enterprises.

Through a combination of binding legal instruments (complex law) and non-binding frameworks (soft law), the United Nations has developed a favourable regulatory environment for the promotion of the cooperative model, as reflected in General Assembly resolutions, International Labour Organization (ILO) instruments—especially Recommendation No. 193/2002—and global sustainable development strategies, including the Addis Ababa Action Agenda on Financing for Development.

In this context, the 2025 International Year of Cooperatives assumes a dual significance: on one hand, it serves as a tool for political and cultural awareness-raising regarding the value of cooperatives in global processes of economic transformation; on the other hand, it represents a strategic opportunity to strengthen their legal recognition within international law, particularly in key areas such as decent work, social protection, climate change mitigation, and participatory governance (ILO).

This paper aims to analyse the evolution of the legal recognition of cooperatives in international law, with particular attention to their role in achieving the SDGs, and to offer a critical reflection on the legal opportunities and challenges related to implementing the International Year of Cooperatives 2025.

2. Results obtained and discussions

2.1. Definition and Principles of Cooperatives

The foundational principles of cooperatives trace back to establishing the Rochdale Equitable Pioneers Society in England in 1844. According to rigorous historical analysis, earlier cooperative formations can be identified (Enzo Pezzini). The International Cooperative Alliance (ICA) was founded in London in the late 19th century to unite cooperatives worldwide and promote shared values and principles (ICA Report – Foundation). In 1995, the ICA adopted the Revised Statement on the Cooperative Identity, marking the centenary of its establishment.

The revised statement defines a cooperative as an autonomous association of persons united voluntarily to meet their everyday economic, social, and cultural needs and aspirations through a jointly owned and democratically controlled enterprise (ICA Statement). The document includes both Cooperative Values and Principles.

The core values include self-help, self-responsibility, democracy, equality, equity, and solidarity (note 4). The Cooperative Principles are: Voluntary and Open Membership; Democratic Member Control; Member Economic Participation; Autonomy and Independence; Education, Training and Information; Cooperation among Cooperatives; and Concern for Community (ICA Values/Principles). From the perspective of international law, cooperatives are not considered subjects of international law in the strict sense, yet they are increasingly recognised as key actors in economic and social development. While not enjoying legal subjectivity under international law, cooperatives benefit from broad recognition within the framework of soft law – that is, non-binding but influential norms recognised at the international level.

The Cooperative Identity Statement has been acknowledged by various international organisations, including the International Labour Organisation (ILO), the United Nations, and other global institutions. The ILO provided its definition of cooperatives in Recommendation No. 193 of 2002.

This Recommendation describes a cooperative as an autonomous association of persons voluntarily united to meet their everyday economic, social, and cultural needs and aspirations through a jointly owned and democratically controlled enterprise (ILO).

In its Preamble, the Recommendation highlights the role of cooperatives in promoting job creation, mobilising resources, and generating investment as a contribution to economic development.

It also affirms that cooperatives, in their various forms, promote full and active participation in social, economic, and cultural development (ILO, Preamble).

3. UN Resolutions

3.1. Resolution 64/136 (2009) – Cooperatives in Social Development

In Resolution 64/136 of 2009, entitled "Cooperatives in Social Development," the United Nations General Assembly acknowledges the important role cooperatives play at the global level.

The Resolution recalls all previous cooperatives and social development resolutions in the Preamble. It recognises that cooperatives, in their various forms, promote full participation in economic and social development (UN Res.).

The Resolution notes the significant contribution of cooperative development in improving indigenous peoples' and local communities' social and economic conditions. It also recalls ECOSOC Resolution 1980/67 of July 25, 1980, concerning international years and anniversaries. By taking note of the report of the Secretary-General, the General Assembly proclaims 2012 as the International Year of Cooperatives. It encourages Member States of the United Nations. All relevant stakeholders to seize the opportunity of the International Year to promote cooperatives and raise awareness of their contribution to social and economic development (ibid., para. 3). Furthermore, it invites governments, in cooperation with the cooperative movement, to develop programs aimed at strengthening the development capacity of cooperatives, including through the enhancement of organisational, managerial, and financial skills among their members (ibid., para. 7). It also calls upon governments and international organisations, in collaboration with cooperative organisations, to promote the growth of agricultural cooperatives by facilitating access to finance, adopting sustainable production techniques, and investing in rural infrastructure and systems of rural infrastructure and irrigation systems (ibid., para. 8).

The Resolution also requests the Secretary-General to submit to the General Assembly, at its sixty-sixth session, a report on the implementation of the present Resolution, including recommendations on activities to be undertaken during the International Year of Cooperatives, within existing resources (ibid., para. 12).

3.2. Resolution 76/135 of December 16 2021 – "Cooperatives in Social Development"

In its Resolution 76/135, adopted on December 16 2021 and entitled "Cooperatives in Social Development," the United Nations General Assembly recalls its previous resolutions on cooperatives and social development (UN Res.). The Resolution recognises that cooperatives promote the full participation of local communities - and of all individuals, including persons with disabilities and Indigenous Peoples - in economic and social development (ibid.). It further acknowledges that cooperatives and other social organisations can play a key role in promoting climate change adaptation and mitigation (ibid., Preamble). The Resolution appreciates the potential of cooperative development to improve the social and economic conditions of Indigenous Peoples and rural communities. It invites all Member States, the United Nations, and other relevant stakeholders to share best practices identified during the International Year of Cooperatives 2012 (UN Res.). Finally, the Resolution requests the Secretary-General, in cooperation with relevant United Nations agencies, to continue supporting Member States in creating enabling environments for cooperative development. It also urges the Secretary-General to submit a report on the implementation of the present Resolution at the seventy-eighth session of the General Assembly (ibid., para. 14).

3.3. Report of the Secretary-General A/78/187 (2023)

In response to United Nations General Assembly Resolution 76/135 of December 16 2021, the Secretary-General submitted the Cooperatives in Social Development (A/78/187) report, dated July 17, 2023 (UN Report). The report outlines the policies and strategies enabling cooperatives to support Member States in achieving the Sustainable Development Goals (SDGs) of the 2030

Agenda for Sustainable Development (UN Report). In paragraph 1 of the report's Preamble, the Secretary-General highlights the values and principles of cooperatives as fundamental elements for sustainable development (ibid., para. 1). In paragraph 2 of the Preamble, the report further emphasises the values and principles of cooperative enterprises that make them particularly relevant for sustainable development. The General Assembly had already underlined these same principles in Resolution 76/135 and recognised cooperatives' important role as sustainable and inclusive enterprises, capable of generating employment, reducing poverty, and facilitating access to education, social protection, universal healthcare, financial inclusion, and affordable housing. Accordingly, the same Resolution encourages States to review existing legislation in order to promote a more enabling legal environment for cooperative development (ibid., para. 2). In Chapter II of the Report, entitled "Cooperatives in Sustainable Development," the Secretary-General states in paragraph 5 the number of cooperatives operating globally. It emphasises that in many countries, cooperatives significantly impact the national economy and focus in particular on marginalised groups, by creating employment opportunities and supporting sustainable development (UN Report). Paragraph 6 notes that, in many cases, workers and members of cooperatives achieve better social and economic outcomes than national averages. This is supported by studies conducted on cooperatives in Kenya, Peru, the Philippines, and Poland (Report, para. 6). Paragraph 7 highlights that cooperatives are also part of recent policy frameworks launched in Europe, such as the EU Action Plan and the OECD Global Action Initiative. Paragraph 8 addresses cooperatives' challenges, noting that overall knowledge and training related to the cooperative model remain insufficient. For this reason, it is important to implement an analytical framework capable of fostering a more supportive environment for cooperatives. Due to space constraints, the present analysis has been limited to the first two sections of Report A/78/187. Nevertheless, the Introduction and Chapter II already provide significant insights into the growing recognition of cooperatives by the United Nations as effective instruments for implementing the Sustainable Development Goals (SDGs) of the 2030 Agenda for Sustainable Development, adopted in 2015.

3.4. Resolution 78/289 of June 19, 2024 – "International Year of Cooperatives 2025"

With Resolution 78/289 of June 19, 2024, the United Nations General Assembly proclaimed 2025 as the International Year of Cooperatives, recalling, among other texts, Resolution 65/184 of December 21, 2010, which had designated 2012 as the first International Year of Cooperatives. In the body of the Resolution, the General Assembly invites Member States to consider adopting appropriate measures to prepare for and follow up on initiatives related to the International Year of Cooperatives. It further urges the Secretariat Department of Economic and Social Affairs, international organisations, and other relevant stakeholders to facilitate the implementation of the planned activities. This invitation serves as an important instrument to enhance the role of cooperatives in promoting economic and social development and to support Member States in the planning and realising concrete initiatives during the International Year. The Resolution also specifies that the costs arising from its implementation may be covered through voluntary contributions from the public and private sectors. Finally, the Assembly invites the Secretary-General to bring the contents of the Resolution to the attention of all Member States and relevant stakeholders, so that they may be duly informed (UN).

4. Cooperatives and the 2030 Agenda for Sustainable Development

4.1. Transforming Our World: A Cooperative 2030

The Committee for the Promotion and Advancement of Cooperatives (COPAC) is a multilateral partnership composed of global public and private institutions that promotes and supports cooperative enterprises as key actors in sustainable development. From a legal perspective, COPAC is not an autonomous international organisation but an inter-institutional coalition formed by entities with international legal relevance, each operating through its own normative, technical, and political instruments. Members of COPAC include the International Cooperative Alliance (ICA), the United Nations Department of Economic and Social Affairs (UNDESA), the International Labour Organisation (ILO), the International Trade Centre (ITC), and the Food and Agriculture Organisation of the United Nations (FAO). COPAC has been tasked with coordinating global initiatives for the International Year of Cooperatives 2025, proclaimed by the United Nations under the theme "Cooperatives Build a Better World" (IYC2025). In 2019, COPAC published a series of documents entitled "Transforming Our World: A Cooperative 2030," which explores the contribution of the cooperative movement to the achievement of the 17 Sustainable Development Goals (SDGs) of the 2030 Agenda. One of these documents addresses explicitly Goal 13 – Climate Action, under the title "Transforming Our World: A Cooperative 2030 – Cooperative Contributions to SDG 13" (SDG13). The report highlights concrete examples of cooperative organisations actively combating climate change and its effects. A notable case is the UIREVI Cooperative, based in Côte d'Ivoire: an agricultural union bringing together 42 local cooperatives, established to support small-scale cocoa and coffee producers. UIREVI is internationally recognised for its efforts to combat deforestation and climate change. In 2019, UIREVI partnered with the state-owned company SODEFOR (Forestry Development Corporation) to convert farmers' perennial crop areas into classified forests. The main objective is to contribute to the fight against climate change by creating community forests by rural populations. Another exemplary initiative is the Rede Cata Sampa network of cooperatives, composed of 22 cooperatives and worker associations based in Mogi das Cruzes, in São Paulo, Brazil. The network specialises in collecting recyclable waste and is committed to improving waste pickers' working and living conditions. It actively promotes the solidarity economy and civic engagement. Thanks to its community-based organisational model, Rede Cata Sampa has received numerous national and international awards (Rede Cata Sampa).

4.2. A Brief Mention of the SDG Report 2024

In September 2023, Heads of State and Government gathered in New York for the Sustainable Development Goals (SDG) Summit. The leaders of sovereign states acknowledged that achieving the goals is currently at risk and declared their intention to make every effort to achieve them by 2030. The SDG Report 2024 highlights the world's significant challenges in making concrete progress toward the 2030 Agenda's goals. While concerning trends have emerged, the document also notes some encouraging progress: a reduction in child mortality, a decrease in HIV infections, and improvements in access to drinking water, healthcare, energy, and broadband. However, the report also highlights critical areas where urgent intervention is needed, particularly climate change, peace and security, and social inequalities. With only six years remaining until the 2030 deadline, current progress remains insufficient. Without significant investments and more decisive actions, the risk of failure is real. The causes of failure are manifold: from the prolonged

effects of the COVID-19 pandemic to armed conflicts, geopolitical tensions, and the increasing climate disorder. Among the most urgent priorities, the report pays particular attention to SDG 13 of the 2030 Agenda for Sustainable Development: "Take urgent action to combat climate change and its impacts." In 2023, the rise in temperatures did not slow down, and CO₂ emissions continued to increase steadily. Communities worldwide suffer the consequences of increasingly frequent extreme weather events and natural disasters. The international community thus finds itself at a critical juncture.

All countries must accelerate the transition to low-carbon economic models to avoid escalating economic and social costs. The upcoming review cycle of the Nationally Determined Contributions (NDCs) in 2025 represents a key opportunity to draft more ambitious climate action plans, simultaneously stimulating economic and social progress. In this process, cooperatives can play a decisive role. A concrete example is Kenya, which, in its 2025 NDC revision, included an ambitious program comprising the expansion of renewable energy, the promotion of resilient agriculture, and other environmental measures. This plan aims to reduce CO₂ emissions, strengthen climate change adaptation, and generate social benefits in rural areas (Kenya). Future climate action plans must be even more ambitious to close the current gaps and cover the entire economy and all greenhouse gases. The Paris Agreement aims to limit global temperature rise to well below 2°C, aiming to keep it ideally below 1.5°C (Paris Agreement).

5. Conclusions

The United Nations General Assembly of the International Year of Cooperatives 2025 proclamation represents a strategic moment to globally promote the cooperative model as a sustainable, democratic, and inclusive form of enterprise. From a legal perspective, it offers a unique platform to strengthen the regulatory recognition of cooperatives within international law and to stimulate legislative reforms at national and regional levels. In this context, cooperatives emerge not only as tools for economic participation but as true agents of social transformation, capable of making a tangible contribution to achieving the Sustainable Development Goals (SDGs), particularly in reducing inequalities, promoting decent work, and developing local communities. However, for 2025 to mark a real turning point, the political and symbolic momentum tied to this event must translate into concrete, consistent, and lasting legal and institutional actions. First and foremost, this means strengthening the integration of cooperatives within national legal systems by explicitly recognising their legal specificities and fundamental principles. Secondly, it is crucial to consolidate the role of cooperatives in multilateral decision-making processes, leveraging international platforms such as COPAC, ILO, and ICA. Finally, investing in monitoring tools, training, and technical cooperation will ensure these entrepreneurial forms' sustainability and resilience. Ultimately, the International Year of Cooperatives 2025 should not merely be a celebratory occasion, but a starting point for consolidating, globally, a legal and political culture that recognises cooperatives as an innovative and necessary model to address the challenges of our time.

References

1. A 33 Paris Agreement, <https://eur-lex.europa.eu/IT/legal-content/glossary/paris-agreement.html>. Accessed May 19, 2025.
2. COPAC SDG 13 Transforming our world: a cooperative 2030. https://www.copac.coop/wp-content/uploads/2019/10/COPAC_TransformBrief_SDG13-final2.pdf. Accessed May 19, 2025.
3. COPAC: COMMITTEE FOR THE PROMOTION AND DEVELOPMENT OF COOPERATIVES: A cooperative 2030. Cooperative contributions to Sustainable Development Goal 13. https://www.copac.coop/wp-content/uploads/2019/10/COPAC_TransformBrief_SDG13-final2.pdf. Accessed May 19, 2025.
4. COPAC: IYC 2025 Cooperatives build a better world information on the International Year of Cooperatives. <https://2025.coop/>. Accessed May 19, 2025.
5. ICA Cooperative Identity Declaration. <https://ica.coop/en/whats-co-op/co-operative-identity-values-principles>. Vedi nota 4. Accessed May 15, 2025.
6. ICA Declaration on Cooperative Identity of the International Cooperative Alliance (ICA), 1995. <https://www.ica.coop/en/cooperatives/cooperative-identity>. Accessed May 15, 2025.
7. ICA FOUNDATION: Report of the First International Cooperative Congress. <https://catalog.princeton.edu/advanced>. Accessed May 15, 2025.
8. ICA Values and Principles. <https://ica.coop/en/whats-co-op/co-operative-identity-values-principles>. Accessed May 15, 2025.
9. ILO International Labour Organization: Recommendation on the Promotion of Cooperatives, 2002 (No. 193) https://normlex.ilo.org/dyn/nrmlx_en/f?p=NORMLEXPUB:12100:0::NO::P12100_ILO_CODE:R193. Accessed May 15, 2025.
10. ILO Preamble: Recommendation on the Promotion of Cooperatives, 2002 (193). https://normlex.ilo.org/dyn/nrmlx_en/f?p=NORMLEXPUB:12100:0::NO::P12100_ILO_CODE:R193. Accessed May 15, 2025.
11. Kenya: Climate, Energy and Jobs Programme for Rural Communities. https://unfccc.int/sites/default/files/2025-05/KENYAS%20SECOND%20NATIONALLY%20DETERMINED%20CONTRIBUTION%202031_2035.pdf. Accessed May 19, 2025.
12. PEZZINI Enzo: COOPERATIVES, GOOD COMPANIES “BY DEFINITION” ? Italian Confederation of Cooperative. Pag. 2. https://library.uniteddiversity.coop/Cooperatives/Cooperative-Good_Companies_By_Definition.pdf. Accessed May 15, 2025.
13. RED CATA SAMPA. <https://cadastroempresa.com.br/fornecedor/rede-cata-sampa-08597421000153>. Accessed May 15, 2025.
14. SDG The Sustainable Development Goals Report 2024 UNITED NATIONS. <https://unstats.un.org/sdgs/report/2024/The-Sustainable-Development-Goals-Report-2024.pdf>. Accessed May 15, 2025.
15. UN REPORT A/78/187 Chapter II Cooperatives in Sustainable Development page 2/13. Point 5 Page. <https://documents.un.org/doc/undoc/gen/n23/209/11/pdf/n2320911.pdf>. Accessed May 15, 2025.
16. UN REPORT A/78/187 Cooperatives in Social Development, July 17 2023. <https://documents.un.org/doc/undoc/gen/n23/209/11/pdf/n2320911.pdf>. Accessed May 15, 2025.
17. UN REPORT A/78/187 Cooperatives in Social Development, July 17 2023 Summary page 1. <https://documents.un.org/doc/undoc/gen/n23/209/11/pdf/n2320911.pdf>. Ibidem Preambolo punto 1. Ibidem Preambolo punto 2. Accessed May 15, 2025.
18. UN REPORT II CHAPTER POINT 6. <https://documents.un.org/doc/undoc/gen/n23/209/11/pdf/n2320911.pdf>. Accessed May 15, 2025.
19. UN Resolution 76/135 of 16 December 2021 “Cooperatives in Social Development” Preamble first recital. <https://documents.un.org/doc/undoc/gen/n21/401/09/pdf/n2140109.pdf>. Ibidem Preambolo secondo considerando. Ibidem Preambolo quarto considerando. UN Resolution Point 2. Ibidem Preambolo punto 14. Accessed May 15, 2025.
20. UN Resolution 78/289: International Year of Cooperatives 2025. <https://documents.un.org/doc/undoc/gen/n24/181/94/pdf/n2418194.pdf>. Accessed May 15, 2025.
21. UN RESOLUTION: Resolution 78/289 International Year of Cooperatives 2025 of June 19 2024. <https://documents.un.org/doc/undoc/gen/n24/181/94/pdf/n2418194.pdf>. Accessed May 15, 2025.
22. UN: A/RES/64/136: Resolution 64/136 of 2009 Cooperatives in social development. Preamble, second recital. <https://www.un.org/esa/socdev/documents/resolutions/2009/a-res-64-136-sp.pdf>. Ibidem “Preambolo punto 3. Ibidem” Preambolo punto 7. Ibidem” Preambolo punto 8. Ibidem Preambolo punto 12. Accessed May 15, 2025.

LANGUAGE AND SOCIAL PRACTICE IN COOP ITALIA'S 2023 SUSTAINABILITY REPORT

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Abstract

This study examines Coop Italia's 2023 Sustainability Report (Rapporto Sostenibilità e Valori 2023), published by Coop Italia. Through a linguistic and discourse analysis, it focuses on how language may be employed to build up a narrative of ethical responsibility and environmental commitment. By taking on Critical Discourse Analysis and Appraisal Theory and drawing on the ideological functions of discourse, the research explores how Coop expresses its sustainability concern in line with the United Nations Sustainable Development Goals (SDGs). Through some linguistic strategies that promote a shared moral identity, the research highlights the use of inclusive pronouns such as "we", modal expressions like "must", "need to", and evaluative terms as "responsible" and "sustainable", to convey urgency and ethical duty. By promoting the need to respect ecological issues, Coop portrays itself as an ethical mediator between social values and consumer practices. The report is an informational document, however, it is also a performative text that somehow influences consumer behaviour. This paper argues that such corporate communications act as vehicles of ideological influence and integrate sustainability within the language of routine practices to engage their audience. Hence, findings show that language plays a powerful role in shaping how people and institutions understand text and how, in turn, they respond to environmental needs and challenges.

Keywords: Sustainability, Coop, Critical Discourse Analysis, Appraisal Theory

JEL: M14, Q56, D83

1. Introduction

In the context of increasing environmental concerns and in line with the global adoption of the United Nations Sustainable Goals (SDGs) (United Nations, 2015), corporate communication has become a vital tool for companies to show and express their commitment to sustainability and ethical responsibility. This study examines Coop Italia's 2023 Sustainability Report through a linguistic and discourse-analytical lens, focusing on the sections dedicated to biodiversity protection, supply chain innovations, and environmental protection. Hence, pages 55 to 77 of the Report focus on Coop's sustainability promotion and look at its ethical initiatives for the protection of people and animals.

These sections align with the overall objectives of the SDG: 12 "Responsible Consumption and Production", 13 "Climate Action", and 15 "Life on Land". Drawing on Critical Discourse Analysis (CDA) [10, 11, 13], Appraisal Theory [19], and van Dijk's [26] theories of ideological discourse structures, the research explores how language choices, especially the use of modal verbs, inclusive pronouns, and evaluative adjectives, and other linguistic features, construct a narrative of collective moral duty and corporate ethical agency.

The methodological approach follows a three-dimensional model [10]:

1. textual analysis of linguistic features,
2. analysis of discursive practices, and
3. analysis of wider socio-cultural practices.

The pages that have been selected from the report are those that deal with the respect for the environment, recycling eco-design and best packaging (pp. 56-64), responsible food business and

marketing practices (pp. 57-59), biodiversity projects for example, protection of pollinators (pp. 73-75), urban green spaces and logistical innovations like pooling systems (p. 76), Green Router emissions tracking, and renewable energy like photovoltaic installations (pp. 76-77).

All these points offer a rich corpus for analysing how sustainability discourse not only informs an audience but also performs ideological work [24]; [18]. Coop uses a rhetoric that serves both as informational and performative regarding environmental values in everyday consumer and citizen practices.

In the lens of eco-linguistics [21] and according to the principles of environmental communication outlined by Cox [7], Coop Italia uses a language that plays an important role in promoting and legitimizing sustainable practices that should be shared collectively. In corporate social responsibility (CSR) discourse, this highlights how corporate discourse is becoming effective in shaping societal understandings of behaviour for ethical purposes.

2. Methodological Framework

2.1. Theoretical Foundations

This research is grounded in Critical Discourse Analysis (CDA) in line with Norman Fairclough [10, 11, 12, 13], which analyses how language reflects and constructs social realities. According to this theory, language is not neutral as it has a role in power relations and ideological processes. Considering CDA, Coop Italia's 2023 Sustainability Report aims to frame the company as an ethical actor aligned with the United Nations Sustainable Development Goals (SDGs) hence, CDA provides a suitable lens to examine the role of language and how it is strategically employed to naturalize certain values, in this case around environmental responsibilities and collective duty. Furthermore, the analysis incorporates Appraisal Theory [19], which focuses on how speakers and writers express attitudes, whether they are for or against others, and how they construct emotional positions through language. In particular, the categories of *Affect* (emotions), *Judgement* (moral evaluations of behaviour), and *Appreciation* (evaluations of things and processes) were applied to trace how Coop's discourse valorizes certain actions (e.g., pollinator protection, logistics optimization) as inherently "good" or "necessary". Moreover, the ideological dimension of discourse is also explored through the theories of van Dijk [26], who emphasizes the role and importance of discourse in reproducing and legitimizing ideologies, particularly the emerging societal ideology of sustainability considered as a collective ethical obligation. Again, eco-linguistics [21] and environmental communication studies [7] supplement the analysis, emphasizing how language choices contribute to the social construction of "sustainable lifestyles" as desirable, achievable, and normative.

2.2. Analytical Strategy

The methodology adopted follows Fairclough's [10] three-dimensional framework for discourse analysis:

1. Textual Analysis: Examination of linguistic features, e.g., vocabulary, grammar, cohesion, rhetorical devices, in the selected sections of the report.
2. Discursive Practice: Analysis of the production, distribution, and consumption of the text, considering Coop's intended audiences (consumers, partners, civil society).

3. Socio-cultural Practice: Going beyond the text within wider societal discourses on environmental issues, corporate social responsibility (CSR), and sustainable development.

These approaches lead to micro-level linguistic choices which are linked to the ways texts are produced and shared whilst also situating them within a larger social and ideological context.

2.3. Corpus and Sampling

The analysis focuses specifically on pages from the Coop Italia 2023 Sustainability Report that address:

1. Biodiversity Protection: Initiatives for safeguarding pollinators (e.g., bees, beehives) and urban green space creation.
2. Supply Chain Sustainability: Using pooling systems and logistics optimization (e.g., GreenRouter emissions tracking).
3. Energy Transition: Installation and use of photovoltaic systems on logistics facilities.

2.4. Data Analysis Procedure

The excerpts were subjected to:

1. **Close reading** to identify key rhetorical and linguistic patterns.
2. **Categorization** of language features according to Appraisal Theory dimensions (Affect, Judgement, Appreciation).
3. **Mapping** linguistic strategies onto ideological constructs such as “collective environmentalism,” “corporate stewardship,” and “eco-modernization” [8].
4. **Interpretation** of how these language patterns serve Coop's strategic positioning as a moral, socially embedded actor.

3. Analysis and Results

3.1. Linguistic Features Analyzed

Specific linguistic elements analyzed were as follows:

Pronouns: Frequent use of “we” and “our” to establish inclusivity and collective responsibility, as for Martinović and Verkuyten [20, p. 125] on pronoun usage.

Modal Verbs: “Must,” “need to,” and “should” to convey necessity and moral obligation on modality [15].

Evaluative Language: Adjectives like “responsible,” “sustainable,” “balanced,” “ensuring,” and “efficient” are used to positively qualify actions and strategies [19].

Narrative Structures: Telling about projects and initiatives to frame Coop as an ethical protagonist, as for Bamberg [3], on narrative identity.

Intertextual References: Explicitly or implicitly mention broader environmental movements and SDGs to legitimize the company’s actions [10].

3.2. Textual Analysis

From a **textual level**, some specific linguistic features highlight Coop's construction of itself as an ethical and environmentally responsible actor. See the following examples:

Pronouns and Inclusivity:

Throughout its report, Coop employs the inclusive first-person plural *we*, for example, *abbiamo attivato* "we have activated" and *continuiamo il nostro impegno* "we continue our commitment" to cultivate a shared moral identity in the company, with its partners, and its consumers. This usage builds solidarity and collective agency, and positions sustainability not merely as Coop's sole responsibility but also as a joint civic mission [19]. By so doing, Coop invites its audience to share responsibility for environmental action.

Modal Verbs Indicating Necessity and Obligation:

Modal verbs such as *dobbiamo* "we must" and *è necessario* "we need to" appear frequently in discussions of pollinator protection, logistical innovations, and the reduction of CO₂ emissions. These modal verbs convey a sense of moral urgency; they function as a force that implies immediate action, and it is non-negotiable in the face of environmental challenges [15]; [19]. Therefore, the language Coop uses emphasizes that addressing environmental and social challenges is not a choice but a need, a necessity and a moral duty for everyone to take action for the sake of the environment.

Appraisal Language:

The text is saturated with positive evaluations of Coop's initiatives, using phrases such as *azioni responsabili* "responsible actions", *scelte sostenibili* "sustainable choices", and *impegno costante* "constant commitment". From the perspective of the Appraisal Framework [19], these evaluations play a crucial role. They align the reader's emotions and judgments with the company's ethical stance, not only praising the initiatives but also encouraging the audience to perceive Coop's actions as ethically sound. This understanding helps the reader grasp the persuasive intent of the text.

Lexical Choices:

The discourse prominently features words related to ecology, innovation, and community are such as *biodiversità* "biodiversity", *pollinazione* "pollination", *ottimizzazione* "optimization", *filiera sostenibile* "sustainable supply chain", *tutela ambientale* "environmental protection". These lexical selections anchor Coop's message within broader environmental and social frameworks, aligning closely with SDGs 12, 13, and 15 of the United Nations Sustainable Development Goals.

Rhetorical Strategies:

Concrete numerical details such as *328 alveari* "328 beehives", *85 nidi* "85 nests", and *180 ettari di frutteto* "180 hectares of orchard" create a quantitative ethos (Aristotle, 2007/ca 350 BCE, appeal to the credibility or character of the speaker). This reliance on specific numbers appeals to logos, enhancing Coop's credibility by providing tangible evidence of the company's ecological impact. Such specificity underscores the scale of Coop's efforts, making their claims more concrete.

3.3. Discursive Practice Analysis

As for the discursive practice level, Coop's text production and circulation strategies reveal a conscious effort to construct and disseminate an environmental identity across multiple platforms.

Production:

In Coop's 2023 Sustainability Report, there is a reference to a collaboration with scientific institutions, like DiSTA, the University of Bologna, as well as to non-governmental organizations like LifeGate. This means that there is more than one language style; in fact, it goes from business to science and activism. This approach towards the same goal gives Coop more authority and credibility in sustainability matters.

Distribution:

Coop's ecological initiatives involve various platforms and projects. It promotes pollinator-friendly practices by providing seeds and bee shelters. Additionally, it encourages consumers to participate in biodiversity conservation, highlighting the importance of bees (*ogni ape conta*). From an educational point of view, Coop actively engages in numerous initiatives and events, such as Didacta, to show its commitment to ecological concerns. The "Community under 30" initiative further demonstrates this involvement by targeting younger audiences and raising their awareness of environmental issues. This communication strategy is in line with van Dijk's [26] concept of discourse as a form of social practice.

Consumption:

The people whom the Report addresses include agricultural partners, civil society organizations, and internal stakeholders. The language used infers behaviour as both desirable and accessible. By putting in evidence initiatives such as the reduction of pesticides and agricultural *supply chains*, as well as promoting urban oases through tree planting, Coop positions ethical consumption as a responsibility that everyone should share. This approach aligns with Jørgensen and Phillips' [17] discourse analysis framework, wherein language shapes social identities and practices.

Briefly, by integrating scientific collaboration, multi-platform dissemination, and inclusive language, Coop effectively promotes sustainability as a collective civic mission.

3.4. Socio-Cultural Practice Analysis

From a macro-social level, Coop Italia's sustainability discourse reflects and reinforces the prevailing ideas about the responsibility of corporate environmental stewardship and civic engagement. By integrating sustainability into everyday life, Coop normalizes sustainable practices, such as using reusable pooling systems, promoting biodiversity, and installing photovoltaic systems. This contributes to the "naturalization" of environmental responsibility within civil society [10]. In doing so, sustainability is framed as a standard, everyday behaviour aligned with the dominant ecological values of the early 21st century [14]. Coop not only aligns with the key Sustainable Development Goals (SDGs), it also contributes significantly to their achievement, even if not explicitly referenced in the text. Examples include:

- a) SDG 12: *The reduction of waste through pooling logistics.*
- b) SDG 13: *Decrease in emissions through renewable energy installations.*
- c) SDG 15: *Biodiversity preservation through pollinator projects.*
- d) SDG 4: Educating citizens through programs like *Didacta* situates Coop within global sustainability efforts [9] while maintaining its identity as a locally focused organization at the same time.

Shaping Ideological Perspectives: Coop's discourse frames ethical consumption as both achievable and necessary. It not only reflects societal expectations but actively influences them, promoting a vision of citizenship wherein consumers are active participants in environmental stewardship [26]; [11]. The table below highlights key features of the text (pages 56-77) and is supported by relevant examples and theoretical frameworks. This analysis demonstrates how Coop Italia employs language and communication strategies to reinforce its ecological initiatives and adopt a collective commitment to sustainability.

Table 1. Key features of the text

Analytical Step	Features Analyzed	Examples from the Coop Report	Theoretical reference
Textual Analysis	Modal verbs	Use of “must,” “need to,” and “have to” to express urgency and moral necessity, found across pages 56-60.	Fairclough [10]; Halliday and Matthiessen [16]
	Evaluative language	Terms like “responsible,” “sustainable,” and “ethical” highlight positive appraisals of actions, especially on pages 61-65.	Martin & White [19]
	Inclusive pronouns	Frequent use of “we,” “our” to foster collective identity and solidarity, present on pages 66-68.	Fairclough [13]
	Scientific and technical register	Collaboration with DiSTAL (University of Bologna) introduces scientific discourse, featured prominently on page 74	Fairclough [10]; Aristotelian Rhetoric [1]
	Strategic Intertextuality (UN SDGs)	Inferring SDGs 12, 13, and 15 to situate Coop within the global sustainability goals on pages 73-77.	Wodak [22]
Discursive Practice	Production	Partnerships with DiSTAL and LifeGate provide scientific and ethical legitimacy on pages 66-74.	Fairclough [10]
	Distribution	Multi-channel dissemination (online, physical stores, educational materials) as explained on pages 66-68.	Fairclough [10]
	Consumption	Consumers positioned as active participants (e.g., “friends of pollinators”), emphasized on pages 74-75.	Austin [2]; Butler [6]
Socio-Cultural Practice	Embedding environmentalism into CSR discourse	Framing sustainability as a habitual civic behaviour, explored on pages 56-60.	Banerjee [4]; Van Dijk [26]
	Ideological naturalization of green practices	Environmental responsibility is normalized as part of good citizenship on pages 61-65.	Van Dijk [26]; Bourdieu [5]
	Sustainability as Cultural Capital	Sustainability seen as an ethical distinction and civic engagement, highlighted on pages 66-77.	Bourdieu [5]

3.5. Discursive Units and Micro-Functions in Coop Italia's Sustainability Practices

The table below outlines the discursive moves, functions, linguistic markers, strategies, and theoretical frameworks in Coop Italia's 2023 Sustainability Report. Italian examples are paired with their direct English translations to preserve context while ensuring accessibility. These elements highlight how Coop Italia constructs narratives and engages stakeholders to reinforce its ecological and sustainable ethos.

Table 2. Discursive and linguistic markers

Discursive Markers	Function	Linguistic Markers	Discursive Strategy	Framework
Reference to high fertilization rate	Construction of scientific credibility	<i>con una efficacia di oltre il 90% / "with an efficiency exceeding 90%"</i>	Legitimization through quantification	CDA
Comparison with bee species	Construction of a complementary narrative	<i>rispetto all'ape mellifera</i> "compared to the honeybee"	Emphasizing collaboration	Socio-cognitive model
Quantification of bees and orchards	Construction of scale and commitment	<i>328 alveari, "3 milioni di api, 180 ettari / "328 beehives", "3 million bees", "180 hectares"</i>	Amplification of impact	Appraisal Theory
Scientific monitoring reference	Construction of empirical rigor	<i>studio ha mostrato, supporto del DiSTAL / "study has shown", "support from DiSTAL"</i>	Invoking academic authority	CDA
Presence of pesticides from external sources	Externalization of threats	<i>pesticidi non utilizzati dagli agricoltori coinvolti</i> "pesticides not used by the farmers involved"	Defense of moral integrity	Ideological approach
Communication in stores	Consumer involvement	<i>iniziative di comunicazione a punto vendita / "in-store communication initiatives"</i>	Mobilization of public support	Socio-cognitive model
Practical advice to consumers	Behaviour normalization	<i>Decalogo per gli amici delle api / "Guidelines for the bees' friends"</i>	Involving the audience in action	CDA
Emotionalization with bee houses	Affection for bees and emotional bonding	<i>cassette-rifugio disponibili nei punti vendita / "bee shelter boxes available in stores"</i>	Emotional proximity	Appraisal Theory (Affect)
Youth engagement with diaries	Building identification through storytelling	<i>Diario dell'apicoltore domestico / "Diary of the home beekeeper"</i>	Narrative personalization	Socio-cognitive model

Promotion of pollinator-friendly seeds	Expansion of participatory ecology	<i>semi di piante amiche degli impollinatori / "seeds of pollinator-plant friends"</i>	Inclusion of consumers	Discourse and social change
Update with new hives and bees	Continuity and commitment over time	<i>60.825 arnie", 1.306.615.980 individui / "60,825 hives", "1,306,615,980 individuals"</i>	Cumulative reinforcement of action	Appraisal Theory
Expansion to urban green areas	Reaffirmation of territorial presence	<i>80 arnie per api solitarie / "80 hives for solitary bees"</i>	Spatial expansion	Socio-cognitive model
Reference to the scientific research project	Systematic approach to legitimization	<i>progetto di ricerca scientifica sulle api selvatiche e mellifere / "scientific research project on wild bees and honeybees"</i>	Establishing scientific cooperation	CDA
Mention of CONAPI	Reinforcement of collective expertise	<i>600 apicoltori e circa 110.000 alveari / "600 beekeepers and about 110,000 hives"</i>	Collective competence	Socio-cognitive model
Biodiversity monitoring aims	Validation of effectiveness	<i>monitorare la biodiversità e lo stato di salute / "monitoring biodiversity and health status"</i>	Evaluation and feedback	CDA

Conclusions

The discourse analysis of Coop Italia's Sustainability Report 2023 (*Rapporto Sostenibilità e Valori 2023*) reveals that corporate environmental communication is not merely descriptive but deeply performative and ideological. Using Fairclough's [10]; [11] three-dimensional model, the textual features analyzed, such as the frequent use of inclusive pronouns "we", modal verbs "must," "need to", and positive evaluative adjectives "responsible," "sustainable," "ethical", demonstrate how language is mobilized to build up a shared moral identity between the company and its stakeholders. This strategic framing aligns Coop's communication with broader societal discourses on sustainability and the United Nations Sustainable Development Goals (UN SDGs). Particularly, the company's reference to concrete actions (e.g., promoting biodiversity, reducing CO₂ emissions, installing solar panels) and their quantitative outcomes supports the image of Coop as an active moral agent, rather than a passive reporter of facts. The analysis carried out has shown that a range of linguistic devices for the discursive choices, supplies Coop with a double role, on one hand the role of a responsible corporate actor and on the other hand the role of a cultural mediator that educates and involves citizens in sustainable practices, resonating with Banerjee's [4] notion of CSR (corporate social responsibility) as an ideological practice. The study also highlights how Coop incorporates scientific language style discourse when stating its collaboration with NGO (Non-Governmental Organizations) and institutions like DiSTAL (Department of Agricultural and

Food Sciences at the University of Bologna) and LifeGate (an Italian organization that focuses on promoting sustainability and environmental awareness). This façade strengthens the *ethos* of Coop's intent (Aristotelian rhetoric) by presenting its sustainability claims as rooted in scientific expertise rather than self-promotion. If we follow Bourdieu's [5] theory of symbolic power, it is clear that Coop strengthens its social position and its environmental message by relying on credible sources (academic institutions and environmental NGOs) to help promote sustainability as an essential part of culture, and it reinforces its reputation. Moreover, the Report operates within a performative framework as outlined by Austin [2] and Butler [6]. The language used throughout not only states facts but also acts so as to position Coop and its audience/target group within an ongoing practice of sustainability. The expressions of commitment and ethical obligation are intelligently studied and arrayed to naturalize and raise awareness of environmental responsibility. It is part of everyday consumers' behaviour to contribute to what Halliday and Matthiessen [16] describe as the habitualization of action through linguistic structures. Therefore, from a socio-cultural perspective, Coop's discourse reflects wider societal transformations in how sustainability is perceived and practiced. It constructs an ideology [26] wherein corporate practices and consumer behaviours converge towards mutual environmental goals. By aligning itself with the SDGs, Coop situates its actions within a global moral order, it reinforces its legitimacy and its capacity to influence public opinion and discourse on sustainability. However, it must be said that although the Report emphasizes transparency and accountability, it remains a corporate document with persuasive intentions. As Wodak and Meyer [25] argue, discourse is always situated within power relations that can subtly obscure contradictions, tensions, or limitations; thus, this insight is highly relevant to the sustainability practices of Coop's Report.

In conclusion, the analysis confirms that sustainability reports are highly structured forms of discourse that integrate linguistic, ideological, and socio-cultural strategies to promote a particular vision of ethical consumption and mutual responsibility. It proves that sustainability reports, such as Coop Italia's, are meticulously crafted documents that serve as more than mere accounts of environmental practices.

The use of strategic terms and linguistic structures work together to reinforce a document in order to arouse ethical responsibility, civic engagement, and environmental leadership. From a textual and intertextual level of study, results show that textual elements within discursive practices play a fundamental role in Coop Italia's 2023 Sustainability Report. In other words, through a carefully blended language, Coop successfully communicates its environmental commitments, builds credibility, and reinforces the importance of individual and collective contributions to global environmental goals. At the same time, however, it holds its position of leadership and authoritative voice in sustainability discourse.

Limitations

This paper has focused on the language insights of the ecological section of Coop Italia's 2023 Sustainability Report. The other areas of the Report have not been explored for their minor relevance to the aim of this research, which was to focus on the language and practice used by Coop to express its involvement in ecological and sustainability issues.

References

1. ARISTOTLE (2007/ca. 350 BCE). *On Rhetoric: A Theory of Civic Discourse* (G. A. Kennedy, Trans.). Oxford University Press.
2. AUSTIN, J. L. (1962). *How to do things with Words*. Oxford University Press.
3. BAMBERG, M. (1997). Language, Concepts and Emotions: The role of language in the construction of emotions. *Language Sciences*, 19 (4) 1, 309–340.
4. BANERJEE, S. B. (2008). Corporate Social Responsibility: The Good, the Bad and the Ugly. *Critical Sociology*, 34 (1), 51–79.
5. BOURDIEU, P. (1984). *Distinction: A Social Critique of the Judgement of Taste* (R. Nice, Trans.). Harvard University Press. (Original work published 1979). <https://www.mit.edu/~allanmc/bourdieu1.pdf>
6. BUTLER, J. (1997). *Excitable speech: A politics of the performative*. Routledge.
7. COX, R. (2013). *Environmental Communication and the Public Sphere* (3rd ed.). SAGE Publications.
8. DRYZEK, J. S. (2005). *The Politics of the Earth: Environmental Discourses* (2nd ed.). Oxford University Press.
9. DRYZEK, J. S. (2013). *The Politics of the Earth: Environmental Discourses* (3rd ed.). Oxford University Press.
10. FAIRCLOUGH, N. (1992). *Discourse and Social Change*. Polity Press.
11. FAIRCLOUGH, N. (1995). *Critical Discourse Analysis: The Critical Study of Language*. Longman.
12. FAIRCLOUGH, N. (2001). *Language and Power* (2nd ed.). London: Longman.
13. FAIRCLOUGH, N. (2003). *Analysing discourse: Textual analysis for social research*. Routledge. <https://howardaudio.wordpress.com/wp-content/uploads/2018/01/n-fairclough-analysing-discourse.pdf>
14. GRAMSCI A. (1971) *Selections from the Prison Notebooks*. Hoare Q, Nowell Smith G (eds). New York, NY: International Publishers.
15. HALLIDAY, M. A. K. (1994). *An Introduction to Functional Grammar* (2nd ed.). Edward Arnold.
16. HALLIDAY, M. A. K., & MATTHIESSEN, C. M. I. M. (2014). *Halliday's introduction to functional grammar* (4th ed.). Routledge.
17. JØRGENSEN, M. W., & PHILLIPS, L. J. (2002). *Discourse analysis as theory and method*. SAGE Publications
18. MACHIN, D., & MAYR, A. (2012). *How to Do Critical Discourse Analysis*. Sage Publications.
19. MARTIN, J. R., & WHITE, P. R. R. (2005). *The Language of Evaluation: Appraisal in English*. Palgrave Macmillan.
20. MARTINOVIC, B., & VERKUYTEN, M. (2024). Collective psychology ownership as a new angle for understanding group dynamics. *European Review of Social Psychology*. 35 (1) 123-161. <https://doi.org/10.1080/10463283.2024.2321691>
21. STIBBE, A. (2015). *Ecolinguistics: Language, Ecology and the Stories we Live by*. Routledge.
22. WODAK, R. (2001). What CDA is about: A Summary of its History, Important Concepts, and its Developments. In R. Wodak & M. Meyer (Eds.), *Methods of Critical Discourse Analysis* (pp. 1–13). London: Sage Publications.
23. WODAK, R. (2006). *The Discourse of Politics in Action: Politics as Usual*. Palgrave Macmillan.
24. WODAK, R., & MEYER, M. (2009). Critical Discourse Analysis: History, Agenda, Theory, and Methodology. In R. WODAK & M. MEYER (Eds.), *Methods for Critical Discourse Analysis* (pp. 1–33). London: Sage Publications.
25. WODAK, R., & MEYER, M. (2016). *Methods of Critical Discourse Studies* (3rd ed.). SAGE Publications.
26. VAN DIJK, T. A. (1998). *Ideology: A Multidisciplinary Approach*. SAGE Publications.
27. Coop Italia. (2023). *Rapporto Sostenibilità e Valori 2023*. Coop Italia. Available: <https://www.e-coop.it>
28. United Nations. (2015). *Transforming our world: The 2030 Agenda for Sustainable Development*. United Nations. Available: <file:///C:/Users/Windows/Downloads/Agenda2030-eng.pdf>

SUSTAINABLE HUMAN RESOURCE MANAGEMENT IN THE CONTEXT OF CONTEMPORARY ORGANIZATIONAL TRANSFORMATIONS

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Abstract

This article explores the importance of sustainable human resource management (HRM) in the context of ongoing organizational transformations, with a specific focus on the Republic of Moldova. As organizations face increasing pressures from digitalization, workforce mobility, demographic shifts, and changing employee expectations,

the need to implement sustainable HRM models becomes critical for long-term organizational performance and social stability.

The study aims to analyze the extent to which sustainable HRM practices-such as continuous professional development, employee well-being, ethical leadership, and inclusive policies-are applied in Moldovan organizations. The research methodology combines a review of theoretical literature with empirical investigation, including a structured questionnaire distributed among employees and interviews with HR professionals and managers across various sectors.

The results reveal that while there is growing interest in sustainable HRM, implementation remains inconsistent and often limited to surface-level initiatives. Organizations that invest in long-term employee development and promote participatory leadership tend to report higher retention rates, improved job satisfaction, and increased adaptability to change.

The study concludes with a proposed model for sustainable HRM adapted to the Moldovan socio-economic context, offering both academic insight and practical guidance for policymakers and organizational leaders.

Keywords: sustainable human resource management, organizational change, employee retention, workforce development

JEL: M12, O15, Q01

Introduction

In recent decades, the organizational environment has undergone profound transformations, influenced by a range of global factors such as accelerated digitalization, technological advancement, the growing economic and social interdependencies worldwide, as well as the emergence of systemic crises - economic, health-related, ecological, or geopolitical in nature. These phenomena have generated an organizational climate characterized by uncertainty, rapid change, and constant pressure for innovation, adaptability, and efficiency. Organizations, regardless of size or field of activity, are compelled to rethink their strategies, structures, and internal processes in order to remain relevant and competitive in an ever-evolving context.

Digitalization, in particular, has become a catalytic force of transformation. Emerging technologies - artificial intelligence, automation, big data, cloud computing - have reshaped economic and social activities, profoundly influencing the organization of work, the types of skills required, and the relationships between employees and employers. Simultaneously, globalization has intensified competition and diversified the labor market, amplifying professional mobility as well as the complexity of intercultural management. On the other hand, socio-economic crises - such as the COVID-19 pandemic, geopolitical instability, or global inflation - have placed additional pressure on organizations, demanding rapid and sustainable solutions for resource management and operational stability.

In this dynamic and often unpredictable context, human resources gain unprecedented strategic importance. Human capital is no longer perceived as a mere production factor or a functional component of the organizational system, but rather as a central element in the process of adaptation, innovation, and sustainable transformation. Employees contribute actively to organizational success not only through their technical and functional skills, but also through their ability to learn continuously, collaborate, generate new ideas, and build effective interpersonal relationships. Moreover, in an era marked by volatility and rapid change, employee well-being, satisfaction, and engagement are directly linked to long-term organizational performance.

In this context, adopting a sustainable approach to human resource management becomes not just beneficial but necessary - one that balances economic goals with a strong sense of social

responsibility and individual well-being. The idea of sustainable HRM took shape as a way to weave economic, social, and environmental considerations into how organizations manage their people, ultimately fostering more resilient and ethically grounded institutions. Unlike traditional models, which are primarily focused on productivity and individual performance, the sustainable approach seeks a balance between employee well-being, continuous professional development, fairness in labor relations, and the protection of human capital from disruptive changes. This perspective is particularly relevant today, as organizations must rapidly adapt to new working realities - remote work, automation, generational diversity, and ethical pressures from civil society.

Sustainable human resource management also reflects a forward-thinking approach to human capital - one that views employees as essential partners in achieving organizational success and as rightful beneficiaries of its progress. When companies embrace sustainable HR practices, they're better positioned to gain long-term advantages, minimize the risks linked to employee turnover, and adapt more readily to external pressures. At the same time, such practices help foster a fairer, more inclusive, and resilient society overall.

In this context, the present research aims to analyze the theoretical and practical foundations of sustainable human resource management, explore how it addresses contemporary challenges, and identify best practices capable of supporting organizational performance in a responsible and equitable manner. The study adopts an integrative approach, combining the analysis of specialized literature with relevant case studies, in order to shape a practical reference framework for the strategic transformation of human resource management.

Results obtained and discussions

Amid growing global crises, heightened corporate social responsibilities, and the ongoing shift toward a greener and more digital economy, sustainable human resource management (HRM) has emerged as a key strategic focus. In contrast to traditional HR models that center on operational efficiency, cost minimization, and short-term performance gains, sustainable HRM emphasizes a more balanced and accountable approach to managing human capital. It integrates economic, social, and environmental considerations directly into HR strategies and everyday practices [1, 2, 10].

Within academic discourse, sustainable HRM is typically defined as a framework of policies and actions aimed at fostering employee development, advancing social equity, promoting workplace well-being, and ensuring the long-term sustainability of human resources. This approach moves beyond immediate organizational metrics, shifting the focus toward institutional resilience, broader stakeholder accountability, and the safeguarding of human potential for future generations [1, p. 215].

A relevant theoretical framework for understanding sustainable HRM is the triple bottom line model proposed by Elkington [3], which advocates for a balance between profit (economic), people (social), and planet (environmental). Applied to the field of human resources (Figure 1), this model suggests that organizations should adopt practices that not only optimize costs and productivity but also protect the physical and mental health of employees, promote diversity and inclusion, and minimize negative impacts on the natural environment [2, p. 1073].

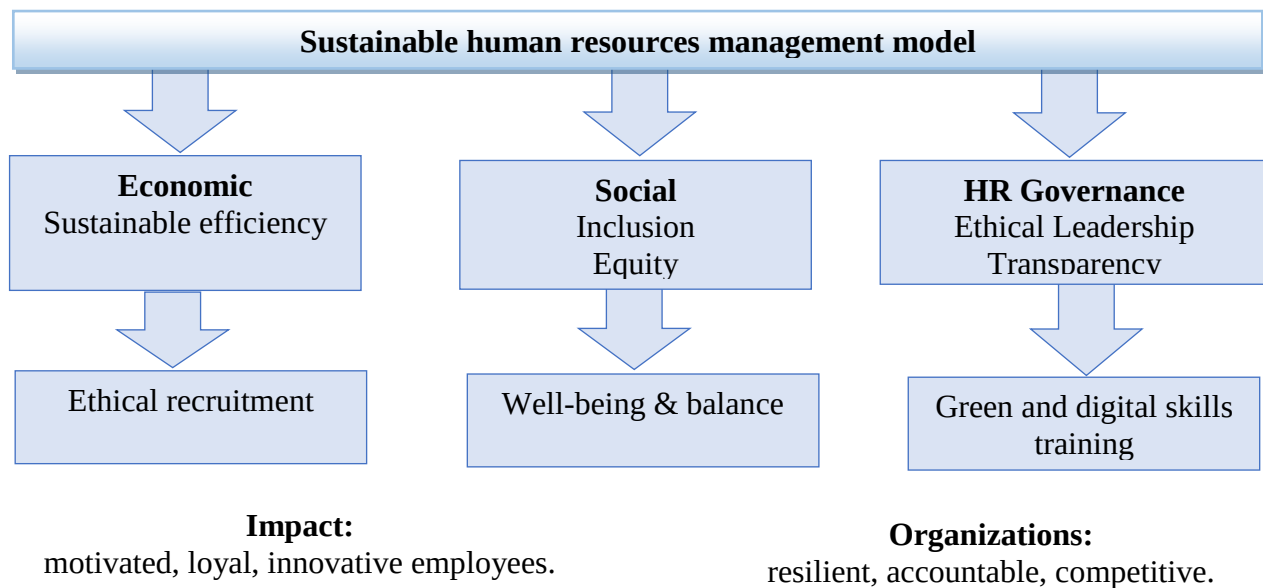


Figure 1. The Model of Sustainable Human Resource Management

Source: elaborated by the author

Furthermore, sustainable human resource management stands at the crossroads of two foundational frameworks: the sustainable development paradigm and the strategic paradigm of human resource management. Thus, sustainable HRM requires aligning personnel policies with the organization's long-term strategies and with sustainability objectives as defined by international standards such as the Global Reporting Initiative (GRI), ISO 26000, or the new European Sustainability Reporting Standards (ESRS).

Sustainable human resource management encompasses a range of practices, including ethical approaches to recruitment and selection, the cultivation of green and digital competencies, performance assessments that incorporate non-financial metrics, the encouragement of responsible leadership, support for work-life balance, and the fostering of meaningful social dialogue with employees. Moreover, in the context of contemporary organizational transformations - such as digitalization, automation, and remote work - it becomes essential to implement a sustainable HRM framework that anticipates changes, prevents imbalances, and facilitates employee adaptation to new demands [9].

Sustainable human resource management is not merely a trend or an ethical ideal, but a strategic necessity for modern organizations striving for competitiveness, social legitimacy, and long-term stability. This approach requires a paradigm shift - from control and efficiency to collaboration, responsibility, and the holistic development of human capital.

In an economic environment marked by accelerated change, increasing ethical pressures, and growing societal expectations, the HR function becomes essential in supporting organizational sustainability. The conventional HRM model - centered on operational efficiency and short-term performance gains - is increasingly ill-equipped to meet emerging challenges such as the green transition, digital transformation, generational diversity, and the growing focus on employee well-being. In contrast, the sustainable human resource management paradigm provides a more strategic and cohesive framework, one that prioritizes social equity, environmental accountability, and the long-term development of human potential.

The comparative table below provides a synthesized view of the two perspectives, highlighting fundamental differences in vision, practices, and the impact on both organizations and employees.

Table 1. A comparison between traditional and sustainable paradigms in human resource management

Criterion	Traditional HRM	Sustainable HRM
Strategic orientation	Short-term, focused on efficiency and profit	Long-term, integrated into sustainability strategy
Objectives	Maximizing performance and reducing costs	Ensuring resilience, equity, and employee well-being
Employee relationship	Contractual, transactional	Partnership-based, participative, built on trust
Core values	Competitiveness and control	Social responsibility, inclusion, and personal development
Performance indicators	Financial KPIs, individual productivity	Sustainable KPIs (well-being, diversity, engagement, retention, etc.)
Recruitment practices	Focused on current skills	Focused on potential, diversity, and shared values
Professional development	Based on immediate job needs	Continuous learning, adaptability to change, organizational learning
Health and safety	Minimum legal compliance	Promotion of physical, mental, and social well-being
Change adaptability	Structural rigidity	Organizational flexibility and resilience
Environmental impact	Not linked to ecological dimension	Integrated into environmental protection and green HRM policies

Source: elaborated by the author

The differences between traditional and sustainable approaches to human resource management reflect a fundamental paradigm shift in organizational thinking. Traditional HRM is oriented toward efficiency and short-term objectives, while sustainable HRM prioritizes long-term development, social equity, employee well-being, and environmental responsibility. The sustainable paradigm fosters a partnership-based relationship with employees, emphasizes continuous learning, diversity and inclusion, and integrates well-being into HR strategy. Unlike the classical transactional model, sustainable HRM adopts performance indicators that reflect not only productivity but also the quality of professional life. Furthermore, sustainable HRM contributes to an organization's ability to adapt to digital and ecological transformations by enhancing internal resilience and fostering socially responsible positioning. This holistic approach is becoming increasingly necessary in the current context, dominated by instability, digitalization, and sustainability pressures.

Contemporary organizations are undergoing a continuous process of transformation, driven by a range of endogenous and exogenous factors such as digitalization, globalization, systemic crises, ecological transition, and demographic shifts. These transformations are generating a new operational and strategic framework in which the human resource function must undergo profound adaptation to support both performance and institutional sustainability.

One of the most evident transformations is the accelerated digitalization of organizational processes. The integration of emerging technologies - such as artificial intelligence, automation, and big data - is profoundly reshaping job structures, required skill sets, and modes of professional interaction. As a result, HRM is challenged to reconfigure recruitment, training, and development policies, manage digital skill transitions, and create flexible, tech-enabled work environments.

The COVID-19 pandemic has accelerated the adoption of hybrid work models, triggering a paradigm shift in how work is organized. Flexibility, autonomy, and output-based performance have taken precedence over physical presence and hierarchical control. For HRM, this shift entails the development of new tools for performance management, maintaining cohesion among geographically dispersed teams, and promoting work - life balance.

Organizations today face mounting pressure to align their operations with the core principles of sustainable development, which requires embedding social, economic, and environmental responsibility across all areas - including human resource management. Thus, the concept of green HRM has emerged, promoting environmentally conscious recruitment, training in green competencies, reducing the ecological footprint of HR processes, and encouraging sustainable behavior in the workplace.

The diversification of the workforce in terms of gender, ethnicity, age, and culture demands the adoption of inclusive and equitable HR policies. HRM must manage differences, promote equal opportunities, and cultivate an organizational culture rooted in mutual respect and the valorization of diversity. In this context, the HR function becomes a key vector for social cohesion and organizational justice.

Amid growing uncertainty and external complexity, new leadership models are taking shape - collaborative, empathetic, and transformational - that emphasize ethics, transparency, and collective engagement. HRM plays a vital role in identifying, training, and supporting leaders capable of guiding organizations through profound change and fostering commitment in volatile conditions.

Contemporary organizational transformations demand a radical redefinition of the human resource function. Moving from an administrative and reactive role, HRM is evolving into a strategic, proactive, and sustainable function, capable of addressing the complex challenges of the modern world. In this new context, sustainable human resource management becomes not merely an option but an essential condition for the long-term resilience, relevance, and performance of organizations.

To illustrate the practical applicability of sustainable HRM principles, a comparative analysis was conducted on several organizations that implement sustainability-oriented HR policies. The study focuses on two categories of entities: organizations from the Republic of Moldova and internationally recognized companies known for their best practices in the field. The analysis is structured around three fundamental pillars of sustainable HRM: social equity and inclusion, employee well-being, and the development of green and digital competencies.

Table 2. Comparative assessment of the implementation level of sustainable human resource practices in organizations from the Republic of Moldova and internationally

Criterion	Orange Moldova	Kaufland Moldova	Endava Moldova	Unilever (ref.)
Continuous learning	Practice is present, but implemented partially or at an early stage	Practice is present, but implemented partially or at an early stage	Practice is well implemented, with visible and documented results	Practice is excellently implemented, strategically integrated and continuously improved
Well-being & work-life balance	Practice is present, but implemented partially or at an early stage	Practice is well implemented, with visible and documented results	Practice is excellently implemented, strategically integrated and continuously improved	Practice is excellently implemented, strategically integrated and continuously improved
Diversity and inclusion	Practice is present, but implemented partially or at an early stage	Practice is excellently implemented, strategically integrated and continuously improved	Practice is well implemented, with visible and documented results	Practice is excellently implemented, strategically integrated and continuously improved
Ethical leadership & transparency	Practice is well implemented, with visible and documented results	Practice is well implemented, with visible and documented results	Practice is well implemented, with visible and documented results	Practice is excellently implemented, strategically integrated and continuously improved

Source: elaborated by the author

Orange Moldova, operating in the telecommunications sector, is making significant strides toward aligning its human resource policies with sustainability principles. The company runs programs such as “Orange Digital School,” aimed at developing employees’ digital competencies, and targeted initiatives supporting employee well-being, particularly through flexible working arrangements and internal awareness campaigns on work - life balance. From an economic perspective, Orange Moldova applies fair wage principles and supports continuous learning, although these initiatives are still in the early stages of strategic development. Socially, the company promotes inclusion, though diversity policies and support for vulnerable groups require more systemic strengthening. In terms of governance, Orange Moldova is characterized by an open organizational climate, supported by ethical leadership and effective internal communication channels. There is a clear orientation toward responsibility and professionalism, and a feedback culture is encouraged within teams.

The comparative evaluation places Orange Moldova in a transitional phase toward sustainable HRM, with promising practices and a clear openness to aligning with ESG standards. Future priorities include the systemic consolidation of professional development, expanding diversity policies, and fully integrating sustainability into HR strategy.

Kaufland Moldova, operating in the retail sector, stands out as a notable example of integrating sustainability principles into human resource management. The company has developed

a coherent and structured approach to sustainable HRM policies, focusing on equity, inclusion, and social responsibility. One of the most prominent initiatives is the “Kaufland for All” program, which promotes diversity and actively supports employees from vulnerable groups, including persons with disabilities. From an economic perspective, Kaufland Moldova has implemented a fair compensation system aligned with competence and sustainable performance, and provides motivation-based bonuses that reflect not only financial achievements but also commitment to the company’s ethical and social values.

On the social dimension, the company promotes active inclusion policies, upholding equal opportunity principles and investing in safe and decent working conditions, alongside psychosocial support through well-being campaigns, counseling, flexible hours, and family support programs. Regarding governance, Kaufland Moldova organizes recurring training on ethical leadership and internal compliance, contributing to an organizational culture rooted in transparency, responsibility, and professionalism. Internal communication is maintained through effective formal channels, and employee participation in decision-making is encouraged through structured feedback mechanisms and regular evaluations.

In the comparative analysis, Kaufland Moldova achieves high levels in applying diversity and inclusion principles, being one of the few organizations in Moldova that actively promotes social equity as a core part of its HR strategy. Moreover, employee well-being is managed competently, and ethical leadership is reinforced through clear policies and corporate governance measures. The only area still in partial development is continuous training, where there remains potential for systemic enhancement and stronger alignment with long - term ESG strategies.

Overall, Kaufland Moldova represents a national best-practice model in the implementation of sustainable HRM, contributing to the modernization of the human resource function and the development of an inclusive, ethical, and high-performing organizational culture.

Endava Moldova, operating in the information technology and outsourcing sector, is distinguished by its advanced model of sustainable human resource management. The company promotes well-defined and structured policies for continuous professional development, offering employees access to international certifications, digital educational resources, and personalized career development plans. From an economic perspective, Endava’s HR strategy focuses on direct investment in human capital, emphasizing talent retention and long-term performance through development initiatives.

Socially, the company excels in promoting employee well-being, providing a framework conducive to work - life balance, mental health support, and organizational flexibility. Diversity and inclusion are actively addressed, although there are still opportunities for improvement in gender diversity within leadership roles. In terms of governance, Endava is characterized by strong ethical leadership, transparent decision-making, and a culture of continuous feedback, which enhances employee trust and engagement.

The comparative evaluation positions Endava Moldova among organizations with well-developed and strategically oriented sustainable practices aligned with global trends. The company demonstrates that sustainable HRM not only supports competitiveness in digital industries but also serves as a pillar of organizational stability and innovation.

Unilever, operating globally in the fast-moving consumer goods (FMCG) sector, is frequently cited as a benchmark for applying environmental, social, and governance (ESG) principles in human resource management. Its “Future of Work” strategy fully integrates

sustainability into HRM policies, addressing economic performance as well as employee well-being and corporate social responsibility. Economically, Unilever offers complex continuous training programs covering green skills, digital literacy, and transformational leadership.

Socially, the company is a global leader in inclusion and diversity policies, with measurable outcomes in increasing minority representation and combating systemic discrimination. In the governance sphere, Unilever has a robust framework of ethical leadership, codes of conduct, and compliance systems, fostering an organizational culture built on accountability, transparency, and sustainable innovation.

Unilever's model serves as an aspirational example for organizations in Moldova and other emerging economies, demonstrating how HRM can decisively contribute to achieving the Sustainable Development Goals (SDGs) and to the sustainable transformation of the business environment.

Contemporary organizational transformations require a profound reconfiguration of the human resource function so that it becomes a strategic actor in promoting sustainability. The case studies analyzed demonstrate that, despite sectoral and institutional maturity differences, there is a common trend toward adopting practices that support employee well-being, social equity, and organizational responsibility. From this perspective, it becomes essential to formulate coherent and durable policies capable of generating systemic impact and long-term added value.

First and foremost, it is necessary to establish a clear policy on continuous learning and the development of green and digital skills. Organizations should implement personalized learning programs tailored to the requirements of the digital transition and the objectives of the green economy. These programs must be based on regular assessments of employee skill needs, provide open access to e-learning platforms, foster partnerships with educational institutions for relevant certifications, and integrate sustainability into managerial training curricula.

Secondly, the development of an organizational well-being policy is essential - one that addresses not only physical health, but also mental well-being and social balance. Such a policy should promote the creation of a healthy and inclusive work environment, ensure flexible work arrangements (including hybrid formats), facilitate access to psychological counseling and emotional support, and guarantee ergonomic and safe working conditions.

A further strategic priority involves adopting a diversity, equity, and inclusion (DEI) policy - an essential step toward eliminating discrimination and fully harnessing the richness of human capital in all its forms. This policy must promote fair and transparent recruitment based on merit and potential, include support measures for disadvantaged groups, encourage inclusive leadership with balanced gender and generational representation, and carry out internal campaigns to raise awareness of DEI values.

Additionally, strengthening a policy of ethical leadership and participatory governance is recommended. This involves adopting clear and consistently applied codes of conduct, creating effective internal reporting mechanisms for misconduct (whistleblowing), periodically evaluating managers based on integrity, ethics, and social responsibility, and promoting a participatory framework in which employees are actively involved in decision-making through consultations, surveys, and structured feedback sessions.

The implementation of these sustainable policies does not merely involve technical adjustments but requires a profound shift in organizational culture. HRM thus becomes a catalyst for sustainable transformation, contributing to the balance between economic performance and

social responsibility. In the Republic of Moldova, reinforcing the legislative framework and promoting collaboration between the public and private sectors can significantly advance the human resource function toward greater sustainability.

Conclusions

The findings reaffirm that sustainable human resource management is emerging as a vital element of organizational strategy amid today's evolving transformations. The integration of economic, social, and governance dimensions into HR policies significantly contributes to the resilience, adaptability, and competitiveness of modern organizations. Case studies conducted on companies in the Republic of Moldova reveal a growing openness to adopting sustainability principles; however, their application is often partial and lacks an integrative vision.

Practices such as continuous learning, the promotion of equity, support for employee well-being, and the strengthening of ethical leadership are recognized as relevant, but their implementation varies significantly depending on the sector and the maturity level of management. Moreover, compared to internationally recognized organizations such as Unilever, local companies are still in the early stages of integrating sustainability principles into the HR function, highlighting the urgent need for institutional strengthening and long-term strategic alignment.

Facilitating a successful shift toward sustainable human resource management requires the creation and execution of cohesive policies that foster the long-term development of human capital. This includes introducing continuous professional development programs aimed at building green and digital competencies, alongside establishing enduring partnerships with educational institutions and innovation hubs.

Additionally, promoting an organizational framework that supports work-life balance, mental health, and employee well-being is essential - through well-being policies, flexible work arrangements, and psychosocial support. Strengthening an inclusive organizational culture through active diversity, equity, and inclusion policies becomes another key pillar in creating a fair and participatory work environment.

On the governance dimension, it is necessary to promote ethical, transparent, and responsible leadership, supported by clear codes of conduct, internal reporting mechanisms, and regular evaluations of managerial performance. Furthermore, the HR function must be aligned with the organization's strategic sustainability objectives by integrating ESG indicators into internal assessments and complying with the new European non-financial reporting standards.

To ensure a systemic approach, it is essential to reinforce sustainable human resource management policies at the national level through targeted legislative measures, economic incentives, and the cultivation of long-term collaboration between the public sector, private enterprises, and academic institutions.

References

1. EHNERT, I. Sustainable Human Resource Management: A conceptual and exploratory analysis from a paradox perspective. Heidelberg: Physica-Verlag, 2009, 292 p. ISBN 978-3-7908-2187-1.
2. KRAMAR, R. Beyond strategic human resource management: Is sustainable human resource management the next approach? *The International Journal of Human Resource Management*, 2014, vol. 25(8), pp. 1069–1089.
3. ELKINGTON, J. *Cannibals with Forks: The Triple Bottom Line of 21st Century Business*. Oxford: Capstone Publishing, 1997.
4. WILKINSON, A., REDMAN, T., DUNDON, T. *Contemporary Human Resource Management: Text and Cases*. 5th ed. Harlow: Pearson Education, 2017.

5. ZAUGG, R. J., BLUM, A., THOM, N. Sustainability in Human Resource Management. Bern: University of Bern, Institute for Organization and Human Resource Management, 2001.
6. SÂRBU, O., NIREAN, E. Economia Moldovei. Manual. Chişinău: Centrul editorial al UASM, 2015. 164 p. ISBN 978-9975-56-260-7.
7. GUERCI, M., LONGONI, A., LUZZINI, D. Translating stakeholder pressures into environmental performance – the mediating role of green HRM practices. International Journal of Human Resource Management, 2016, vol. 27(2), pp. 262–289.
8. MARIAPPANADAR, S. Harm of efficiency-oriented HRM practices on stakeholders: An ethical issue for sustainability. Society and Business Review, 2012, vol. 7(2), pp. 168–184.
9. STANKEVIČIŪTĖ, Ž., SAVANEVIČIENĖ, A. Sustainability as a concept in human resource management. Sustainability, 2019, vol. 11(16), 4394. <https://doi.org/10.3390/su11164394>.
10. SÂRBU, O., COŞER, C. Assessment of human potential increase by stimulating the degree of employees labor satisfaction. Journal of Scientific papers series “Management, economic engineering in agriculture and rural development”, 2017, vol. 17(2), pp. 309-313.
11. SÂRBU, O., CIMPOIEŞ, L. Labor force underutilization as a social and economic problem in Moldova. Journal of Scientific papers series “Management, economic engineering in agriculture and rural development”, 2020, vol. 20(1), pp. 539-548.
12. SÂRBU, O. Particularities of employment in rural areas of the Republic of Moldova. Journal of Scientific papers series “Management, economic engineering in agriculture and rural development”, 2013, vol. 13(1), pp. 361-370.
13. SÂRBU, O., CIMPOIEŞ, L. Problems of human capital formation and use in rural area of Moldova. In: Economic growth in conditions of globalization: welfare and social inclusion. International Conference, 15-16 October 2021, Chisinau: National Institute for Economic Research, 2022, vol. I, pp. 255-264. ISBN 978-9975-3529-4-9.
14. GLOBAL REPORTING INITIATIVE (GRI). GRI Standards: Consolidated Set of Standards 2021. Amsterdam: GRI, 2021.
15. INTERNATIONAL ORGANIZATION FOR STANDARDIZATION (ISO). ISO 26000: Guidance on Social Responsibility. Geneva: ISO, 2010.
16. EUROPEAN COMMISSION. Corporate Sustainability Reporting Directive (CSRD) – Official text and implementation guidelines. Brussels: EC, 2022.

THE ROLE OF FUNDRAISING AS AN ALTERNATIVE METHOD IN BUSINESS FINANCING

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Abstract

Fundraising, or raising funds, has become an increasingly used method of financing businesses in recent decades, especially for start-ups, innovative projects and initiatives with social impact. This article aims to explore the concept of fundraising, its defining characteristics, the stages of the process, the actors involved, relevant platforms, successful examples at a global level, recent statistics and opportunities for application in the Republic of Moldova.

Keywords: Fundraising, Target audience, Kickstarter, alternative financing, business

JEL: F37, G15

Introduction

In a dynamic and competitive business environment, entrepreneurs often encounter barriers when attempting to access traditional financing channels such as bank loans or venture capital.

Fundraising, including its modern online forms, has emerged as a viable alternative. The following analysis delves into this phenomenon, its mechanisms, and its impact on business development.

Fundraising is the process of attracting financial resources from external sources, without resorting to classic financing instruments (bank loans, capital investments, government subsidies). In the business environment, fundraising involves mobilizing financial support from communities, individual or institutional investors, through online platforms or dedicated campaigns.

Law of the Republic of Moldova No. 181 of 07-07-2023 on crowdfunding services, art. 2 provides:

- investment-based crowdfunding – acquisition or subscription by investors, through an investment vehicle, of the developer's shares or shares within a crowdfunding project;
- loan-based crowdfunding – granting by one or more investors of loans for a crowdfunding project or for one or more consumer loans in exchange for interest, through a crowdfunding platform;

Characteristics of Fundraising

- Global accessibility: the use of the internet allows for the attraction of funds from supporters around the world.
- Flexibility: adaptable to any field of activity (technology, art, education, health, etc.).
- Transparency: requires clear and honest communication about the purpose and use of funds.
- Collective participation: involves broad communities, not just professional investors.
- Diversity of methods: crowdfunding (mass financing), individual donations, charitable events, corporate sponsorships, etc.

The fundraising process comprises several essential components that collectively determine the success and efficiency of a campaign. Each element plays a strategic role in aligning the campaign's objectives with the expectations of its target audience and funding platform dynamics.

1. Campaign Goal

At the core of any fundraising initiative lies the clear and well-defined articulation of both financial and non-financial objectives. These goals must be realistic, measurable, and aligned with the broader mission of the project or organization. A precise objective serves not only to guide internal planning but also to inspire confidence among potential contributors.

2. Target Audience

A crucial step in the process is the identification and segmentation of the target audience. This includes determining who the potential donors, supporters, or investors are, what motivates them, and how they prefer to engage with fundraising campaigns. Understanding the audience allows for tailored communication and more effective outreach strategies.

3. The Message and the Story

A compelling narrative is fundamental to any fundraising campaign. Crafting a message that is both emotionally engaging and factually persuasive helps establish authenticity and build trust. The story should clearly articulate the problem, the proposed solution, the expected impact, and the role that supporters can play in achieving the vision.

4. Communication Channels

Selecting the appropriate communication and promotional channels is key to ensuring message visibility. Depending on the target audience, these may include social media platforms,

email marketing, online forums, traditional media, or dedicated landing pages. An integrated communication strategy increases reach and engagement.

5. Reward Structure

In reward-based crowdfunding models, establishing a well-structured system of incentives is essential. These rewards, whether symbolic or material, should correspond to contribution levels and reflect the project's values. A transparent and appealing reward scheme enhances donor motivation and campaign credibility.

Results obtained and discussions

Why is Fundraising Interesting for Moldova?

Fundraising, and particularly crowdfunding, presents a highly relevant and timely opportunity for Moldova's economic and social development for several key reasons:

1. Alternative Access to Capital

Moldova's financial system is often characterized by limited access to credit, high collateral requirements, and underdeveloped venture capital infrastructure. Fundraising offers an inclusive and low-barrier alternative for startups, SMEs, and NGOs to obtain the financial resources they need to grow or implement innovative projects.

2. Empowerment of Local Communities

Fundraising empowers citizens to directly contribute to projects that affect their lives. Whether through the restoration of local infrastructure, support for education, or environmental initiatives, crowdfunding allows Moldovan communities to self-organize and co-finance development from the bottom up.

3. Engagement of the Moldovan Diaspora

With a diaspora exceeding 1 million people, Moldova has a unique opportunity to tap into emotional, financial, and intellectual capital from abroad. Fundraising platforms create structured channels for diaspora members to support projects in their home communities, increasing the efficiency and impact of remittances.

4. Digital Transformation and Youth Engagement

Fundraising aligns with Moldova's digitalization agenda by leveraging online platforms, social media, and digital payments. It also resonates with younger generations who are digitally literate and more inclined toward entrepreneurial and civic engagement.

5. Promotion of Transparency and Civic Participation

Crowdfunding campaigns require transparency in communication and clear reporting of outcomes. This strengthens democratic practices, builds trust in institutions, and increases public accountability in both public and private sector projects.

6. Catalyst for Innovation and Social Entrepreneurship

Crowdfunding supports riskier, early-stage, or socially-oriented ventures that traditional financiers might overlook. It is particularly useful in sectors like clean energy, agri-tech, health, and creative industries—areas that are strategic for Moldova's sustainable development.

Current State of Fundraising in Moldova

1. Legal & Regulatory Framework

In July 2023, Moldova's Parliament approved Law No. 181/2023 on crowdfunding, which came into force on March 1, 2024. The National Commission for Financial Market (NCFM) now oversees licensing, supervision, and regulation of participatory financing platforms.

Moldova's legal framework aligns with EU best practices, allowing both equity and debt-based crowdfunding, with standardized thresholds.

2. Platform Landscape

Local players:

1. Sprijina.md

The first notable local crowdfunding platform in Moldova, launched by the NGO "Community of Ambitious Young People". Supports both personal projects (medical, social) and entrepreneurial or creative initiatives. Features donation-based crowdfunding, with campaigns typically promoted via social media. Free for initiators, with transparent rates for donors and variable commissions depending on the success of the campaign (3–5%). Success rate: modest, but growing; largely depends on the visibility and marketing of each campaign.

2. Fagura

A Moldovan crowdlending and equity crowdfunding platform, launched in 2019. It is the first platform in Moldova to obtain the European Crowdfunding Service Provider License (Nov. 2024), allowing it to offer collective loans with credit checks and adapted interest rates. By 2024, it had mediated over EUR 8.5 million for entrepreneurs, with EUR 1.25 million returned to investors. It functions as a digital "community bank" for small and medium-sized enterprises

3. Guvern24.md (inactive/sometimes on hiatus)

Initially launched to support civic and social projects. It has faced periods of inactivity due to limited user engagement and difficulties in reaching critical mass.

4. Balkanika Finance (BALKANIKA)

Approved in November 2024, this is the second officially authorized platform in Moldova, with Estonian and Moldovan headquarters. Offers real estate secured loans, with additional protection for investors.

5. InspireMe.Fund

A general crowdfunding platform, also available in Moldova, designed for personal support, initiatives or charitable crowdfunding. Boasts 0% commission for organizers; but relies on donor tips

3. Municipal & Community Crowdfunding

Embedded within the UNDP–EU “Mayors for Economic Growth” (M4EG) initiative, since 2015 over 83 local projects raised ~\$339,000 from 12,000+ contributors, including diaspora. In 2024, 10 municipalities participated in UNDP's Crowdfunding Academy:

Anenii Noi raised ~\$3,000 for an inclusive playground.

Strășeni secured ~\$5,100 for urban signage.

Ungheni raised 40% of its goal for a stray-dog shelter.

4. Startup & Private-sector Fundraising

Through non-crowdfunding channels, Moldovan startups raised \$7.9 million in 2024 across 30 companies, boosting total ecosystem investment to ~\$23 million. Moldova ranked among the top 100 global startup ecosystems, positioning #22 regionally and #85 globally in 2024. *Fagura*, a fintech originally from Moldova, raised €780,000 via Seedrs and \$1.1 million in convertible notes; *Balkanika* also received €250,000 in 2024.

5. Market Size & Outlook

Statista highlights Moldova's crowdfunding sector is in **early-growth stage**, with reward-based and donation-based campaigns gaining popularity. Overall ecosystem is increasingly digital and becoming more accessible; fintech platforms and regulatory support are expanding financial inclusion.

In this way, Moldova now has **fully regulated crowdfunding**, including equity, debt, and donation models—with licensed providers like Balkanika entering the market. Both **municipal (community)** and **private sector** crowdfunding have shown successful pilots, raising visibility and trust. The broader startup ecosystem is scaling rapidly, though primarily through grants and VC funding rather than pure crowdfunding. Despite challenges—limited domestic platforms and nascent fintech infrastructure—the trajectory is upward, with strong momentum in regulation, platform innovation, and ecosystem maturation.

Effectiveness of Fundraising Platforms in Moldova

1. Limited but Growing Infrastructure

Fundraising platforms in Moldova are still at an **early stage of development**, with only a small number of active local platforms and relatively modest campaign volumes. Historically, donation-based platforms such as **Sprijina.md** filled a niche in local charitable and civic initiatives. However, its closure in 2024 reflects the fragility of Moldova's platform ecosystem and the need for sustained institutional and financial support.

Example: Between 2015 and 2024, Sprijina.md supported over 83 campaigns with a total of ~\$339,000 raised — a modest but symbolically important contribution to community development.

2. Emerging Private-sector Platforms

The launch of platforms like Balkanika in 2024 marked a shift toward equity and debt-based crowdfunding, targeting both local and international investors. These platforms integrate fintech solutions such as collateral-backed lending, signaling a step forward in platform maturity and investor confidence.

Case study: Balkanika, registered under Moldova's new crowdfunding law, raised €250,000 in its launch year and offers real estate-backed loans — a model with higher trust and lower perceived risk.

3. Diaspora Engagement and Community Impact

Moldovan crowdfunding has been most effective in diaspora-linked campaigns and municipal-level projects, where emotional and social investment drives participation. Projects that are locally rooted but globally visible perform significantly better, especially when framed within civic or humanitarian goals.

Example: The UNDP's Crowdfunding Academy helped municipalities like Strășeni, Anenii Noi, and Ungheni raise thousands of dollars for local projects in 2024 — often exceeding 40% of their goals within weeks.

4. Regulatory and Institutional Support

The effectiveness of platforms has improved following the adoption of Law No. 181/2023, which provides the necessary legal clarity, licensing procedures, and investor protection mechanisms. This legal foundation is expected to catalyze the growth of new platforms and enhance user trust.

Insight: Moldova is now aligned with EU Regulation 2020/1503, allowing licensed platforms to attract cross-border capital — a critical enabler of effectiveness in a small domestic market.

5. Challenges Limiting Full Effectiveness

Despite promising developments, several **barriers persist**:

- Low public awareness of crowdfunding as a financing tool.
- Limited digital and financial literacy, especially in rural areas.
- Insufficient payment and currency infrastructure (e.g., limitations in processing MDL cross-border).
- Lack of investor incentives, such as tax benefits or guarantees.

Table 1. Effectiveness Summary

Metric	Status (2024)	Notes
Platform availability	Limited but improving	Only one active licensed investment platform
Fundraising success rates	Moderate (30–60%)	Higher in community/NGO projects than business
Diaspora engagement	Strong in donation-based campaigns	Key source of capital and visibility
Legal framework	Newly established (2024)	Provides strong foundation for future growth
Trust and transparency	Improving with regulation	Still requires awareness-building and safeguards

Source: created by authors

Recommendations for Effective Utilization of Fundraising Platforms in Moldova

To harness the full potential of fundraising platforms and crowdfunding mechanisms in Moldova, a coordinated and strategic approach is required. The following recommendations target government bodies, financial institutions, platform operators, NGOs, and entrepreneurs.

1. Strengthen Institutional and Legal Support

- Operationalize and Monitor Law No. 181/2023 on crowdfunding by issuing clear implementation guidelines, risk controls, and reporting standards.
- Create a dedicated crowdfunding unit within the National Commission for Financial Market (NCFM) to provide ongoing regulatory support, licensing services, and supervision.
- Facilitate Moldova's integration into the EU crowdfunding passporting system, enabling Moldovan platforms to raise capital cross-border.

2. Stimulate Platform Development and Innovation

- Launch a public grant program or matching fund to support the creation and scaling of local crowdfunding platforms (reward-, equity-, or donation-based).
- Encourage fintech–platform partnerships to develop secure, user-friendly digital tools (e.g., mobile payment integration, real-time dashboards, ID verification).

- Promote open APIs and interoperability with EU-standard platforms like Seedrs, CrowdCube, or LITA.co.

3. Enhance Public Awareness and Education

- Organize national campaigns to educate the public on crowdfunding: its benefits, risks, and success stories.
- Integrate crowdfunding literacy into high school, university, and entrepreneurial training curricula.
- Partner with media outlets and influencers to share case studies and promote ongoing campaigns, especially from rural or underserved communities.

4. Leverage the Diaspora Network

- Establish a Diaspora Crowdfunding Hub, supported by the Bureau for Diaspora Relations and Ministry of Economy, to promote diaspora-driven fundraising initiatives.
- Offer tax incentives or symbolic recognitions for diaspora contributions to Moldovan civic and business projects.
- Create bilingual platform interfaces and storytelling tools that appeal emotionally and culturally to Moldovans abroad.

5. Support Entrepreneurs and Municipalities

- Provide technical assistance and mentoring to entrepreneurs and NGOs for designing and launching effective campaigns (messaging, visuals, budgeting).
- Institutionalize municipal crowdfunding within local development strategies and decentralization policies.
- Use public crowdfunding to co-finance urban and rural infrastructure in partnership with international donors and local communities.

6. Ensure Transparency, Trust, and Accountability

- Develop a public registry of licensed platforms and verified campaigns, maintained by NCFM, to improve visibility and prevent fraud.
- Encourage platforms to publish impact reports, donor statistics, and financial disclosures post-campaign.
- Introduce digital trust tools, including blockchain-backed funding traceability and peer review systems.

Conclusions

Fundraising has emerged as a highly versatile and effective tool for alternative business financing. It democratizes access to capital, fosters innovation, and builds engaged communities around impactful projects. However, its effective implementation requires a well-defined strategy, transparent operations, and continuous communication with stakeholders.

Recent developments in Moldova's entrepreneurial landscape reveal the growing potential of crowdfunding as a key enabler of innovation financing. While traditional funding sources remain limited—particularly for micro and small enterprises—fundraising provides a democratic and inclusive financial mechanism accessible to a broad base of entrepreneurs.

The Moldovan diaspora, estimated at nearly one million people, represents a vast reservoir of social capital and financial resources. These can be strategically activated through targeted fundraising campaigns, strengthening ties between the homeland and its global community.

Aligning Moldova's regulatory framework with the EU Crowdfunding Regulation (Regulation EU 2020/1503) would not only enhance investor protection and platform credibility but also integrate Moldova into the broader European financial ecosystem. This step is crucial for ensuring cross-border interoperability and accessing a wider pool of capital.

With adequate policy support and ecosystem development, Moldova could experience significant growth in fundraising volumes, following trajectories similar to those observed in Romania and the Baltic states. This evolution would diversify the country's financing channels, stimulate entrepreneurship, and promote long-term economic resilience.

References

1. BELLEFLAMME, P., LAMBERT, T., & SCHWIENBACHER, A. (2014). Crowdfunding: Tapping the right crowd. *Journal of Business Venturing*, 29(5), 585–609. <https://doi.org/10.1016/j.jbusvent.2013.07.003>
2. BLOCK, J., COLOMBO, M. G., CUMMING, D. J., & VISMARA, S. (2018). New Players in Entrepreneurial Finance and Why They Are There. *Small Business Economics*, 50, 239–250. <https://doi.org/10.1007/s11187-016-9826-6>
3. CUMMING, D., LEBOEUF, G., & SCHWIENBACHER, A. (2020). Crowdfunding Models: Keep-It-All vs. All-Or-Nothing. *Financial Management*, 49(2), 331–360. <https://doi.org/10.1111/fima.12262>
4. MOLLICK, E. (2014). The dynamics of crowdfunding: An exploratory study. *Journal of Business Venturing*, 29(1), 1–16. <https://doi.org/10.1016/j.jbusvent.2013.06.005>
5. ZIEGLER, T., et al. (2021). The 3rd Global Alternative Finance Market Benchmarking Report. Cambridge Centre for Alternative Finance, University of Cambridge. <https://www.jbs.cam.ac.uk/ccaf/research>
6. European Commission. (2020). Regulation (EU) 2020/1503 on European Crowdfunding Service Providers (ECSP). Official Journal of the European Union. <https://eur-lex.europa.eu/eli/reg/2020/1503/oj>
7. European Investment Fund (EIF). (2021). EIF Working Paper 2021/77: European Small Business Finance Outlook. https://www.eif.org/news_centre/publications/eif-working-paper-2021-77.htm
8. National Commission for Financial Market (NCFM) Moldova (2024). Law No. 181/2023 on Crowdfunding and Licensing Guidelines. <https://www.cnpf.md>
9. OECD (2022). Financing SMEs and Entrepreneurs 2022: An OECD Scoreboard. OECD Publishing. <https://doi.org/10.1787/5aebd5c2-en>
10. UNDP Moldova (2023). Crowdfunding Academy Moldova – Impact Report. United Nations Development Programme. <https://www.undp.org/moldova/publications>
11. World Bank (2020). Crowdfunding as a Tool to Mobilize Funding in Emerging Markets: Lessons for Eastern Europe. Washington, DC. <https://openknowledge.worldbank.org>
12. Annual Transparency Report: Alternative Lending and Crowdfunding in Moldova. <https://www.fagura.com>
13. Fagura.com (2024).
14. Kickstarter. (2024). Stats and Project Reports. Retrieved from www.kickstarter.com
15. Indiegogo. (2024). Platform statistics. Retrieved from www.indiegogo.com
16. Sprijina.md (Archive). (2023). Impact of Community Crowdfunding in Moldova. (Archived community data; source now inactive.)
17. StartUp Moldova Foundation (2024). Moldovan Startup Ecosystem Report. <https://www.startupmoldova.digital>
18. Statista (2024). Crowdfunding – Global and Regional Market Trends. <https://www.statista.com/statistics/792321/global-crowdfunding-market-size>

GEOPOLITICAL TRANSFORMATIONS AND TRADE PROSPECTS: INTEGRATION OF THE REPUBLIC OF MOLDOVA INTO GLOBAL VALUE CHAINS THROUGH STRATEGIC PARTNERSHIPS WITH CHINA

TRANSFORMĂRI GEOPOLITICE ȘI PERSPECTIVE COMERCI- ALE: INTEGRAREA REPUBLICII MOLDOVA ÎN LANȚURILE VALORICE GLOBALE PRIN PARTENERIATE STRATEGICE CU CHINA

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Abstract

The purpose of this research is to analyze the impact of geopolitical transformations on the integration of the Republic of Moldova into global value chains, with a special focus on the strategic partnerships developed with the People's Republic of China. In the context of a changing international order and intensified geo-economic competition, new trade opportunities are emerging for small states such as the Republic of Moldova, which seek to diversify their external relations and strengthen their position in the global economy.

The originality of the topic lies in the integrated approach to the geopolitical and commercial dimensions of Moldovan-Chinese cooperation, highlighting how bilateral partnerships can facilitate Moldova's access to international networks of production, investment, and technology. The paper explores Moldova's potential to become a logistical and commercial hub in the region, benefiting from global initiatives such as the "Belt and Road."

The importance of the research stems from the need to formulate smart foreign strategies that contribute to reducing economic vulnerabilities, increasing competitiveness, and ensuring the sustainable integration of the Republic of Moldova into the circuits of the world economy. The methodology used includes documentary analysis of trade agreements and bilateral initiatives, evaluation of relevant economic indicators, case studies on the success of other small states in partnerships with China, as well as consultation of expert opinions in geopolitics and international economics.

The conclusions highlight that the effective integration of Moldova into global value chains depends on the adoption of pragmatic foreign policies, the strengthening of national infrastructure, and the promotion of a favorable investment climate. The strategic partnership with China, if managed in a balanced way, can become a catalyst for economic development and for the diversification of the country's international trade relations.

Keywords: geopolitics, international trade, global value chains, strategic partnership, China, economic integration, Belt and Road Initiative

JEL: F13, F15, F51, O57

Introducere

În epoca globalizării fragmentate și a policentrismului emergent, transformările geopolitice redefinește constant arhitectura relațiilor internaționale și provoacă statele mici și medii să-și regândească strategiile de dezvoltare economică, integrare regională și poziționare strategică.

Republica Moldova, situată la confluența intereselor geopolitice ale Uniunii Europene, Federației Ruse și, mai recent, ale Chinei, se confruntă cu imperativul de a-și ajusta vectorii externi în funcție de mutațiile de fond ale economiei globale și de realitățile regionale tot mai instabile.

Pe fundalul tensiunilor geopolitice amplificate de agresiunea rusă asupra Ucrainei, a crizelor energetice și a întreruperii unor fluxuri comerciale tradiționale, Republica Moldova a fost forțată să își diversifice parteneriatele economice externe. Această diversificare nu este doar un imperativ de supraviețuire economică, ci și o oportunitate strategică pentru consolidarea suveranității comerciale și re poziționarea țării în cadrul lanțurilor valorice globale. În acest context, parteneriatul strategic cu Republica Populară Chineză capătă relevanță majoră, fiind abordat nu doar ca o alternativă economică, ci și ca un instrument de reconstrucție a infrastructurii, atragere de capital și inserție tehnologică într-un spațiu global dominat de competiția dintre marile puteri [1].

China și-a afirmat, în ultimele două decenii, statutul de actor economic global, modelând rețele transcontinentale prin intermediul Inițiativei „*Belt and Road*” (BRI) – un proiect geo-economic de anvergură ce vizează extinderea infrastructurilor logistice, financiare și industriale în Asia, Europa și Africa. Moldova, semnatară a Memorandumului de Înțelegere cu China privind BRI din 2013, a fost una dintre primele țări din regiune care și-a exprimat oficial interesul pentru conectarea la aceste rețele. În timp, această orientare s-a concretizat printr-o serie de proiecte și inițiative bilaterale care au vizat, printre altele, construcția de autostrăzi, modernizarea infrastructurii de transport, colaborarea în domeniul telecomunicațiilor și facilitarea schimburilor comerciale [10].

În pofida potențialului evident, relația economică moldo-chineză rămâne caracterizată de o asimetrie semnificativă: Republica Moldova importă masiv din China, în special echipamente tehnologice, bunuri de larg consum și produse industriale, în timp ce exporturile sale către această piață sunt modeste și concentrate în câteva nișe, precum vinurile și produsele agricole. Această disproporție comercială ridică întrebări legitime privind sustenabilitatea și echilibrul parteneriatului, dar și privind capacitatea Republicii Moldova de a accesa rețelele globale de producție și de a transforma aceste conexiuni în avantaje structurale pe termen lung.

În acest cadru analitic, cercetarea de față pornește de la premisa că transformările geopolitice recente creează nu doar constrângeri, ci și oportunități pentru statele mici, în special în contextul unei ordini internaționale în reconfigurare. Astfel, Republica Moldova poate valorifica dinamica globală pentru a-și redefini poziția economică internațională, cu condiția să adopte o politică externă flexibilă, un cadru investițional competitiv și o strategie clară de integrare în lanțurile valorice regionale și globale.

Lucrarea își propune să exploreze, într-o manieră comprehensivă, potențialul relației moldo-chineze de a deveni un vector al modernizării economice, printr-o abordare integrată care combină analiza geo-economică cu evaluarea politicilor comerciale, infrastructurale și investiționale. În mod particular, accentul cade pe posibilitățile de dezvoltare a unor sectoare strategice (infrastructură, transport, digitalizare, etc.), precum și pe analiza mecanismelor prin care Republica Moldova ar putea deveni un nod logistic în regiune, valorificând atât apartenența la spațiul european, cât și parteneriatele din afara acestuia.

Totodată, articolul analizează riscurile asociate unei cooperări extinse cu China, în special în ceea ce privește dependența financiară, transparența contractuală, compatibilitatea cu standardele europene și impactul asupra relațiilor Moldovei cu ceilalți parteneri strategici, în special din Uniunea Europeană și din spațiul euroatlantic. Aceste aspecte sunt cruciale pentru evaluarea realistă

a oportunităților și limitelor unei integrări sustenabile în rețelele comerciale și investiționale ale Chinei.

Prin urmare, această cercetare își asumă un dublu obiectiv: pe de o parte, să ofere o radiografie detaliată a dimensiunii comerciale a parteneriatului moldo-chinez, iar pe de altă parte, să formuleze recomandări strategice privind modalitățile prin care Republica Moldova poate transforma acest parteneriat într-un pilon al propriei dezvoltări durabile, fără a compromite traiectoria sa europeană și fără a agrava dezechilibrele structurale deja existente.

Materiale și metode

Pentru realizarea acestei cercetări, a fost adoptată o metodologie mixtă, de tip calitativ și cantitativ, care a permis analiza multidimensională a relațiilor comerciale și geopolitice dintre Republica Moldova și Republica Populară Chineză. Metoda principală utilizată a fost analiza documentară, prin examinarea critică a surselor primare și secundare relevante: acorduri bilaterale, rapoarte guvernamentale, inițiative comerciale și strategice (inclusiv Memorandumul privind participarea Moldovei la Inițiativa Belt and Road), precum și date statistice oficiale privind comerțul internațional și investițiile.

Datele cantitative au fost utilizate pentru a evalua evoluțiile comerțului bilateral, fiind axate pe analiza volumelor, structurii și ponderii schimburilor comerciale dintre Republica Moldova și China. Acestea au fost completate cu informații statistice oficiale naționale și surse de date economice disponibile public. Pentru componenta calitativă, cercetarea a inclus studii de caz comparative (ex. Muntenegru și Serbia), ce au fost utilizate pentru a evidenția bune practici, riscuri și modele relevante în cooperarea cu China. De asemenea, au fost consultate opiniile și analizele unor experți în geopolitică, economie internațională și politici comerciale, provenind din think tank-uri europene și asiatice.

Triangularea acestor surse, statistice, documentare și analitice, a permis formularea unei perspective echilibrate asupra impactului geopolitic și economic al relației moldo-chineze, asigurând totodată validitatea științifică a concluziilor.

Rezultate și discuții

Republica Moldova se confruntă cu efecte profunde cauzate de recente evoluții internaționale, care au scos la iveală atât slăbiciuni structurale, cât și noi oportunități de re poziționare economică. Agresiunea militară a Federației Ruse asupra Ucrainei a destabilizat regiunea, a întrerupt rutele comerciale tradiționale și a generat costuri semnificative pentru stat, de la gestionarea unui val de refugiați, la crize energetice și pierderea piețelor estice de export [2].

Aceste evoluții au dus la reconfigurarea relațiilor economice externe ale Republicii Moldova: ponderea comerțului cu Rusia s-a prăbușit la doar ~3,7% din total în 2023, în timp ce Uniunea Europeană domină cu 53,7%, urmată de Ucraina (13,1%) și China (8,1%). Această realiniere strategică a creat oportunități, dar și necesitatea ca un stat mic precum Republica Moldova să-și diversifice partenerii externi pentru a-și reduce vulnerabilitățile și a-și consolida reziliența economică.

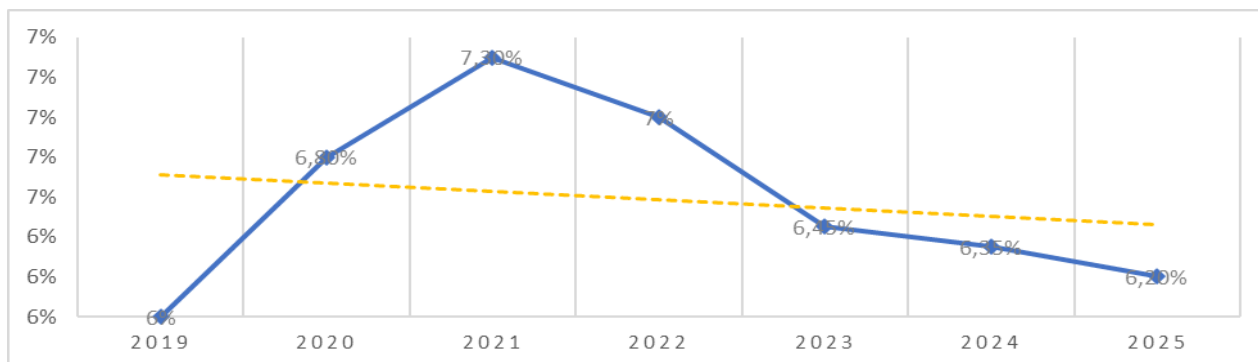


Figura 1. Evoluția ponderii comerțului extern al Republicii Moldova cu China, (2019-2025)

Sursa: elaborată de autor în baza sursei [13]

Analizând evoluția ponderii comerțului extern al Republicii Moldova cu China în perioada 2019–2025, evidențiind un trend compus din două etape distincte: creștere accelerată urmată de stagnare și descreștere moderată.

În perioada 2019–2021, se observă o tendință ascendentă a ponderii Chinei, de la 6,0% la 7,3%, pe fondul intensificării schimburilor comerciale bilaterale, al creșterii importurilor de produse tehnologice și industriale și al repoziționării geopolitice a Moldovei în urma degradării relațiilor economice cu Federația Rusă. Această evoluție poate fi corelată cu extinderea implicării chineze în regiune prin proiecte logistice și forumuri economice bilaterale [7].

După 2021, graficul indică o stabilizare urmată de un declin gradual, cu o scădere estimată până la 6,2% în 2025. Această tendință descendentă poate fi explicată prin diversificarea relațiilor comerciale ale Republicii Moldova, creșterea ponderii Uniunii Europene în comerțul extern și intensificarea reglementărilor legate de standardele de securitate, transparență și compatibilitate cu acquis-ul comunitar [8].

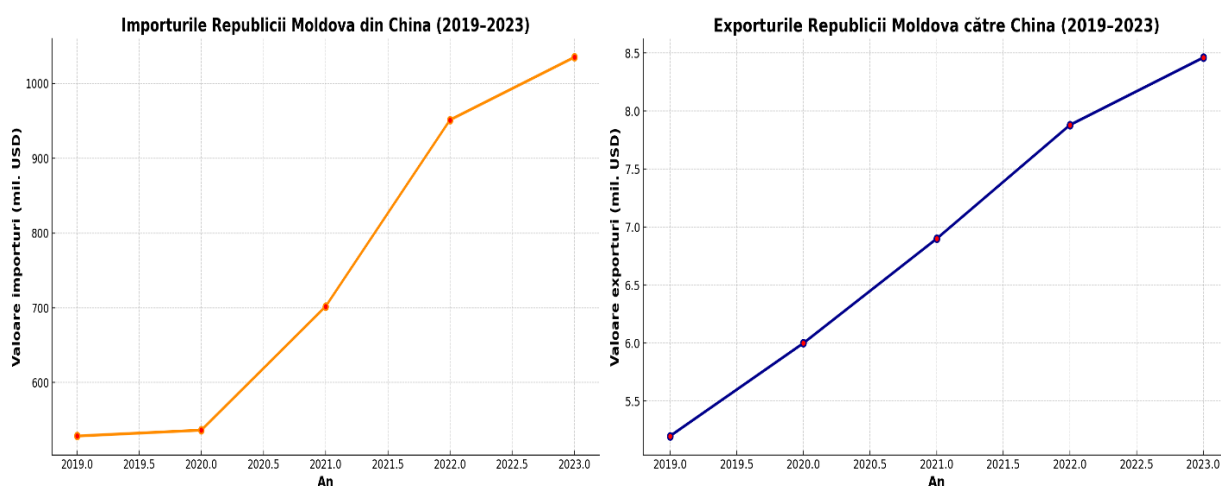


Figura 2. Dinamica comerțului bilateral dintre Republica Moldova și Republica Populară Chineză în perioada 2019–2023, mln. USD

Sursa: elaborată de autori în baza sursei [12]

Republica Populară Chineză s-a afirmat drept actor economic global prin inițiative precum Belt and Road Initiative (BRI) („Centura și Drumul”), extinzându-și investițiile și comerțul în

Europa Centrală și de Est. Republica Moldova a manifestat interes timpuriu față de această inițiativă, semnând un Memorandum de Înțelegere cu China încă din decembrie 2013. Ulterior, autoritățile și-au declarat în mod repetat dorința de a se alătura proiectelor *Belt and Road* și de a valorifica poziția țării ca posibil coridor de tranzit între piețele UE și Asia [11]. Tendința Republicii Moldova de deschidere către China s-a accentuat în ultimul deceniu, pe măsură ce statul caută atât integrarea europeană (prin statutul de stat candidat UE din 2022), cât și parteneriate strategice extra-europene pentru dezvoltare.

Analizând dinamica importurilor Republicii Moldova din China evidențiază o creștere substanțială, de la 528,5 milioane USD în 2019 la peste 1,03 miliarde USD în 2023.

Această tendință reflectă o dublare a valorii importurilor în doar cinci ani, sugerând consolidarea Chinei ca furnizor major de produse pentru piața moldovenească, în special în sectoarele tehnologic, industrial și al bunurilor de larg consum.

În contrast, exporturile Republicii Moldova către China au crescut într-un ritm mult mai lent, de la 5,2 milioane USD în 2019 la doar 8,46 milioane USD în 2023. Deși trendul este pozitiv, valorile rămân modeste, indicând un dezechilibru comercial semnificativ și o integrare limitată a Republicii Moldova în lanțurile valorice chineze. Reieșind din datele Biroului Național de Statistică, China a devenit cel de-al treilea partener comercial al statului nostru, situându-se după România și Ucraina [13].

Această asimetrie comercială sugerează că, în pofida intensificării relațiilor bilaterale, Republica Moldova acționează în principal ca piață de desfacere pentru exporturile chinezești, fără a valorifica pe deplin oportunitățile de acces pe piața chineză.

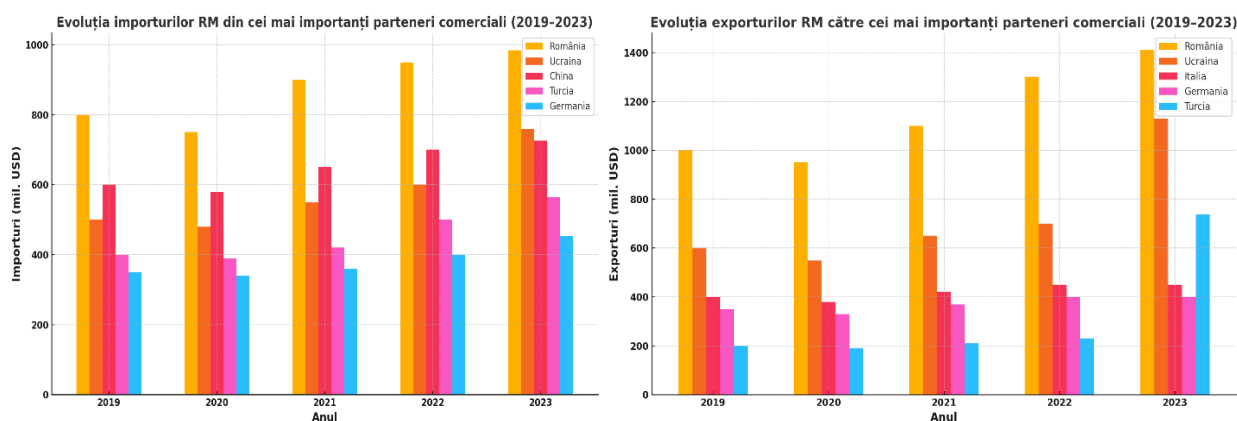


Figura 3. Evoluția importurilor/exporturilor RM cu cei mai importanți parteneri comerciali, 2019-2023

Sursa: elaborată de autori în baza sursei [12]

Exporturile moldovenești către China rămân modeste (predominant vinuri, produse agricole și unele materii prime), în timp ce importurile din China acoperă o gamă largă de produse, de la echipamente electrice, mașini și componente industriale, până la bunuri de larg consum.

Totuși, există trenduri pozitive: autoritățile statului raportează că exporturile moldovenești spre China au crescut în ultimii ani, iar un exemplu emblematic este vinul moldovenesc, un produs exportat tradițional spre Federația Rusă, dar redirectionat tot mai mult către piața chineză după embargoul impus de Moscova. China a devenit unul dintre cei mai mari importatori de vin moldovenesc, achiziționând anual între 6 și 8 milioane de sticle de vin moldovenesc [16]. Acest

lucru plasează China ca piață cheie pentru vinurile Republicii Moldova și sugerează potențialul de creștere pentru întregul sector agroalimentar.

În contextul globalizării accelerate și al reorganizării lanțurilor valorice globale (GVC), analiza participării țărilor în aceste rețele devine esențială pentru elaborarea politicilor economice.

Republica Moldova, deși o economie de dimensiuni reduse, își dezvoltă treptat relațiile comerciale cu Republica Populară Chineză. Cu toate acestea, utilizarea exclusivă a datelor la prețuri curente (în USD) poate induce percepții eronate asupra nivelului real de integrare în GVC.

Pornind de la metodologia propusă în Global Value Chain Development Report 2023, această cercetare își propune să evalueze discrepanțele dintre estimările la prețuri curente și constante ale comerțului bilateral Republica Moldova–China în perioada 2019–2023 [6].

Analiza utilizează date comerciale publice privind exporturile și importurile dintre Republica Moldova și China, preluate din sursele OEC și TradingEconomics. Valorile la prețuri constante au fost aproximativ ajustate prin utilizarea indicilor de volum (bază 2019 = 100), presupunând o evoluție moderată a inflației și a cursului de schimb. Conform cadrului analitic din raportul GVC 2023, au fost calculați următorii indicatori:

- Discrepanța medie (avgDisc) – diferența absolută medie dintre valorile la preț curent și cele ajustate la preț constant.
- Variabilitatea discrepanței (VarDisc) – fluctuația anuală a diferențelor.
- Numărul de divergențe – ani în care direcția de evoluție la preț curent diferă de cea la preț constant.

Tabelul 1. Evoluția valorilor comerciale și a indicilor reali în comerțul bilateral Republica Moldova – China, 2019–2023

Anii	Exporturi (mil. USD)	Importuri (mil. USD)	Exporturi reale (index)	Importuri reale (index)
2019	34	550	100	100
2020	30	470	95	97
2021	42	690	110	103
2022	66	950	125	108
2023	71.7	1020	118	102

Sursa: elaborat de autori în baza sursei [7]

1. Discrepanță medie la exporturi: $\text{avgDisc}_{\text{exp}} \approx 58.46$
2. Discrepanță medie la importuri: $\text{avgDisc}_{\text{imp}} \approx 678.4$
3. Divergențe identificate la exporturi (pentru anii 2022 și 2023):

$$\text{Valoarea nominală}_{\text{exp}}^{2022,2023} \neq \text{Valoarea real}_{\text{exp}}^{2022,2023} \text{ cu } \frac{d(\text{val. nom.})}{dt} > \frac{d(\text{val. real.})}{dt} \leq 0.$$

Această ultimă formulare exprimă faptul că, în acei ani, valoarea nominală a exporturilor este în creștere, dar volumul real fie stagnează, fie scade - deci există o divergență între evoluția valorică și cea fizică a exporturilor [6].

Rezultatele arată că în perioada 2019–2023, datele la prețuri curente privind comerțul bilateral dintre Republica Moldova și China pot distorsiona percepția asupra realității economice.

Estimările la preț constant indică o evoluție diferită față de cele nominale, în special pentru importuri, ceea ce atrage atenția asupra necesității ajustării analitice a valorilor comerciale în evaluările oficiale.

Statutul de țară candidată la Uniunea Europeană, obținut de Republica Moldova în iunie 2022, precum și perspectivele deschiderii negocierilor de aderare, au determinat autoritățile de la Chișinău să accelereze procesul de reformă pentru a se alinia standardelor europene. Aceste eforturi au contribuit la crearea unui climat mai favorabil investițiilor și comerțului internațional.

Totuși, apropierea de UE nu presupune o renunțare la relațiile strategice cu state din afara spațiului occidental. Dimpotrivă, analiza evoluțiilor recente sugerează că Republica Moldova urmărește o politică externă echilibrată, orientată spre maximizarea oportunităților atât în relațiile cu Vestul, cât și cu partenerii din Est [16].

În acest context, Republica Populară Chineză s-a arătat receptivă față de deschiderea proactivă a statului. Într-un mesaj diplomatic transmis în 2024, președintele chinez a subliniat continuitatea dezvoltării relațiilor bilaterale și a remarcat progresele realizate în cadrul cooperării în inițiativa *Belt and Road*, reafirmând angajamentul Beijingului pentru consolidarea parteneriatului cu Republica Moldova. Această poziționare exprimată la nivel înalt reflectă faptul că, în actualul context internațional caracterizat prin transformări geopolitice dinamice, China identifică în Republica Moldova un partener prietenos și cu potențial strategic pentru regiune.

În domeniul investițiilor și al proiectelor bilaterale, parteneriatul strategic dintre Republica Moldova și Republica Populară Chineză începe să se contureze tot mai concret, chiar dacă ritmul implementării rămâne unul gradual. Un reper important în această direcție a fost înregistrat în aprilie 2019, odată cu semnarea unui acord de cooperare între Guvernul Republicii Moldova și două companii de stat din China – *China Highway Group* și *China Railway Group*.

Acordul prevedea construcția a aproximativ 300 de kilometri de autostrăzi pe teritoriul Republicii Moldova, pentru o valoare estimată de circa 400 milioane USD.

Proiectul viza o șosea de centură a capitalei Chișinău și o autostradă care să lege nordul țării de Ucraina, reprezentând prima mare investiție chineză în infrastructura moldovenească [4].

Acest acord a fost interpretat ca o aderare de facto a Republicii Moldova la Noul Drum al Mătăsii, autoritățile declarând explicit dorința de a participa la inițiativa BRI și de a-și îmbunătăți conectivitatea regională. În anii următori, interesul Chinei pentru Republica Moldova s-a manifestat și prin extinderea prezenței companiilor chineze în țară (de exemplu, China Shipping a lansat în 2015 servicii de transport containerizat prin Portul Giurgiulești – singurul port al statului, facilitând accesul exporturilor moldovenești la piețele globale prin râul Dunăre, inițierea negocierilor pentru un acord de liber schimb (FTA) în 2017 – care, potrivit estimărilor guvernamentale, ar fi putut crește exporturile Moldovei către China cu ~40% și organizarea de forumuri economice bilaterale.

Un exemplu recent este Forumul de cooperare comercial-economică China–Republica Moldova din iunie 2024, desfășurat la Chișinău, unde peste 200 de reprezentanți ai guvernului și ai mediului de afaceri din ambele țări au discutat oportunități de colaborare în energie și infrastructură [9].

În 2021, partea moldovenească a propus un portofoliu de aproximativ 20 de proiecte (în valoare totală de 1 miliard USD) pentru a atrage investitori chinezi, de la producție farmaceutică și echipamente medicale (Sinopharm a explorat un parteneriat pentru un centru de radioterapie în Chișinău) până la industrie auto (Great Wall Motors), IT și agroindustrie [15].

Tabelul 2. Evaluarea strategică a proiectelor chineze propuse în Republica Moldova și impactul asupra lanțurilor valorice

Proiect	Domeniu	Locație	Parteneri chinezi propuși	Transfer tehnologic	Angajare forță de muncă locală	Integrare în lanțuri valorice	Suma estimată (mil. USD)
Modernizarea Portului Giurgiulești	Logistică & Transport	Sudul Moldovei	China Shipping	Medie	Scăzută	Ridicată	Nedisponibilă
Autostrada Chișinău–Ungheni	Infrastructură rutieră	Centru-vest	China Highway Group	Scăzut	Medie	Indirectă	400
Parc industrial sino-moldovenesc	Industrie ușoară / logistică	Zona Economică Liberă	China Development Bank	Medie	Ridicată	Ridicată	100
Digitalizarea educației	Tehnologie & Educație	Național	Huawei	Medie	Ridicată	Medie	0.056

Sursa: elaborată de autori în baza sursei [14]

Atractivitatea Republicii Moldova pentru China rezidă în poziția geografică favorabilă la intersecția rutelor comerciale, cu acces la transport maritim prin portul Giurgiulești și proximitatea piețelor UE și CSI. Cu alte cuvinte, Republica Moldova este percepută ca un punct nodal ce ar putea facilita accesul Chinei atât spre Uniunea Europeană, beneficiind de Acordul de Liber Schimb, cât și spre spațiul ex-sovietic. Această perspectivă sugerează un potențial rol de hub logistic și industrial al țării pe axa Eurasiană, dacă infrastructura internă și mediul investițional sunt dezvoltate adecvat. Republica Moldova poate deveni o platformă de manufactură și export pentru companiile chineze, iar cadru favorabil (zone economice libere, facilități fiscale, forță de muncă poliglotă) există deja și a fost folosit de investitori din UE, iar extinderea acestuia către investitori chinezi ar putea antrena statul și mai adânc în fluxurile comerciale globale.

Este important de menționat că parteneriatele strategice cu Republica Populară Chineză pot genera multiple beneficii pentru Republica Moldova, contribuind la dezvoltarea economică, diversificarea relațiilor comerciale și consolidarea poziției țării în rețelele economice internaționale. Printre principalele avantaje identificate se numără:

➤ **Diversificarea piețelor de export și extinderea oportunităților comerciale**

Accesul la piața chineză este una dintre cele mai mari și dinamice din lume și oferă Republicii Moldova posibilitatea de a reduce dependența de piețele tradiționale (UE, CSI) și de a valorifica noi nișe de export. Produsele agroalimentare, în special vinurile moldovenești, au fost deja bine primite în China, reprezentând un precedent favorabil [16]. Extinderea exporturilor către alte categorii, precum fructele proaspete, produsele ecologice sau textilele, poate genera o creștere substanțială a veniturilor exportatorilor.

➤ **Atragerea de investiții în infrastructură și modernizare internă**

Cooperarea bilaterală oferă Republicii Moldova oportunitatea de a beneficia de capital chinez pentru dezvoltarea infrastructurii critice: transporturi, energie, logistică. Exemple concrete includ proiectele de autostrăzi contractate cu firme chineze începând cu anul 2019, care promit îmbunătățirea conectivității interne și a accesului regional [4]. Pe termen mediu, modernizarea

infrastructurii reduce semnificativ costurile logistice și sporește atractivitatea investițională a țării, creând un efect multiplicator în economie. Totodată, firmele chineze pot introduce tehnologii moderne și practici ingineresti avansate, contribuind la transferul de know-how.

➤ **Acces la surse alternative de finanțare și cooperare tehnologică**

China oferă oportunități de finanțare pe termen lung pentru proiecte strategice, uneori în condiții mai flexibile decât cele impuse de instituțiile financiare occidentale. Pentru Republica Moldova, care are nevoie de investiții substanțiale în infrastructura energetică, digitală și agricolă, aceste surse pot constitui un instrument eficient de dezvoltare. În plus, companii chineze precum Huawei, deja prezente în Republica Moldova, pot contribui la avansul tehnologic al țării, prin dezvoltarea rețelelor 5G, soluții de tip „*smart city*” și modernizarea sectorului telecomunicațiilor.

Perspectivile includ și colaborarea academică, precum și intensificarea transferului de tehnologie în domenii precum inteligența artificială, agricultură de precizie și eficiență energetică.

➤ **Repoziționare geoeconomică și integrarea în lanțurile valorice globale**

Datorită poziționării sale geografice strategice, Republica Moldova deține potențialul de a se transforma într-un hub investițional favorabil, precum și într-o zonă de tranzit eficientă pentru mărfurile chinezești destinate pieței Uniunii Europene. În acest context, se remarcă pașii preliminar realizati în cadrul Portului Liber Internațional Giurgiulești, în colaborare cu Inițiativa Belt and Road (BRI), care pot constitui o bază solidă pentru extinderea cooperării bilaterale în domeniul infrastructurii.

În paralel, statul are oportunitatea de a revitaliza sectorul transportului feroviar, de a reabilita rețeaua de drumuri publice existente și de a construi noi artere rutiere, care ar facilita o interconectare mai eficientă cu statele vecine. Această conectivitate sporită nu doar că va stimula mobilitatea regională, ci va susține și apropierea Republicii Moldova de piața europeană [3].

Prin consolidarea implicării în cadrul BRI, Republica Moldova ar putea obține statutul de nod secundar în rețelele eurasiatice de transport și producție și ar contribui activ la procesele de asamblare, prelucrare și redistribuire în cadrul lanțurilor comerciale extinse ce leagă Asia de Europa. Pe termen mediu și lung, acest proces poate reduce semnificativ gradul de marginalizare economică a țării și poate accelera integrarea sa funcțională în lanțurile valorice globale.

Deși parteneriatul strategic cu China oferă oportunități semnificative pentru dezvoltarea economică și modernizarea infrastructurii, acesta comportă o serie de riscuri și provocări care trebuie analizate cu prudență.

Accesul la capitalul chinez, deși tentant, poate implica costuri ascunse și condiții contractuale netransparente. Experiențele altor state din regiune oferă lecții relevante: în 2014, Muntenegru a contractat un împrumut de aproape 1 mlrd. USD din partea Chinei pentru construcția unei autostrăzi, echivalent cu aproximativ o treime din bugetul său național. Ulterior, statul balcanic s-a confruntat cu dificultăți în rambursare și a solicitat sprijinul Uniunii Europene pentru a evita o criză financiară profundă [5]. Pentru Republica Moldova, care dispune de o economie mai mică și vulnerabilă, contractarea unor împrumuturi majore din partea Beijingului fără o analiză riguroasă a sustenabilității ar putea genera dezechilibre bugetare și dependență pe termen lung. Prin urmare, este esențial ca fiecare proiect finanțat de China să fie evaluat din perspectiva viabilității economice, iar condițiile împrumuturilor să fie transparente și aliniate la principiile bunei guvernante.

Parteneriatele economice extinse cu China implică inevitabil și un angajament politic. Republica Moldova și-a exprimat sprijinul pentru politica „O singură Chină” și, în schimb, a

beneficiat de recunoașterea de către Beijing a integrității teritoriale a țării, inclusiv în raport cu problema Transnistriei [10]. Totuși, aprofundarea relațiilor bilaterale ar putea conduce la presiuni de aliniere diplomatică față de pozițiile Chinei în cadrul organizațiilor internaționale, fapt ce poate intra în contradicție cu orientarea pro-europeană a țării sau cu pozițiile Statelor Unite.

Mai mult, prezența companiilor chineze în sectoare strategice, precum telecomunicațiile și energia, stârnește îngrijorări legate de securitate în rândul partenerilor occidentali. Spre exemplu, implicarea Huawei în dezvoltarea infrastructurii digitale din Republica Moldova a fost semnalată în rapoarte de politică americane ca un potențial risc pentru securitatea cibernetică, cu posibile repercusiuni asupra cooperării economice cu SUA [11].

Pe măsură ce Republica Moldova avansează în procesul de integrare europeană, relațiile sale economice și investiționale cu state din afara Uniunii Europene trebuie să se plieze pe exigențele cadrului normativ al acquis-ului comunitar. În acest context, cooperarea cu Republica Populară Chineză, deși poate oferi oportunități semnificative de investiții și dezvoltare, trebuie să se desfășoare în conformitate cu principiile fundamentale promovate de UE, precum transparența proceselor decizionale, protecția mediului, respectarea standardelor sociale și calitatea lucrărilor de infrastructură [11].

Proiectele realizate cu finanțare chineză, fie în domeniul infrastructurii, al energiei sau al industriei, trebuie să respecte reglementările europene privind achizițiile publice, normele de concurență loială și criteriile de sustenabilitate. Derapajele în aceste domenii – concretizate prin lipsa unor licitații publice competitive, excluderea actorilor locali din procesul de implementare sau aplicarea unor practici de muncă sub standarde – pot avea consecințe negative asupra imaginii internaționale a Republicii Moldova [4]. Mai mult decât atât, astfel de practici pot genera rezerve și critici din partea instituțiilor europene, afectând perspectivele de integrare în piața unică și accesul la fonduri de sprijin.

Totodată, Uniunea Europeană promovează, în rândul statelor candidate și partenere, introducerea unor mecanisme eficiente de screening al investițiilor străine directe, cu scopul de a proteja infrastructurile strategice și sectoarele sensibile ale economiei. În acest cadru, există riscul ca, pe termen mediu, anumite entități sau furnizori chinezi să fie supuși unor restricții sau chiar excluși din proiectele naționale, după modelul dezbaterilor europene privind implicarea companiilor chineze în rețelele 5G și riscurile aferente securității cibernetice.

Un alt risc semnificativ este generat de potențiala asimetrie a parteneriatului moldo-chinez, mai ales în ipoteza în care colaborarea s-ar concretiza preponderent prin importuri masive de produse fabricate în China și executarea lucrărilor de infrastructură de către companii chineze, cu utilizarea exclusivă a forței de muncă din afara țării. În absența unui transfer tehnologic real, a unei implicări active a întreprinderilor locale, prin subcontractare, parteneriate de tip joint-venture și crearea de locuri de muncă pentru cetățenii moldoveni, beneficiile economice directe rămân limitate, iar efectul de multiplicare în economia națională este redus [7].

În plus, eventuala liberalizare extinsă a comerțului bilateral, inclusiv prin încheierea unui acord de liber schimb cu China, ar putea genera presiuni concurențiale asupra producătorilor locali, în special în sectoarele economice vulnerabile, afectate de diferențele majore de costuri și standarde [13].

Prin urmare, pentru a transforma cooperarea cu China într-o oportunitate reală și sustenabilă, Republica Moldova trebuie să își orienteze politicile externe și economice spre dezvoltarea unui parteneriat mutual avantajos („win-win”), bazat pe transparență, responsabilitate și beneficii

reciproce pe termen lung. Această direcție presupune nu doar atragerea investițiilor, ci și valorificarea lor eficientă în procesul de modernizare economică și consolidare a parcursului european al țării.

Concluzii

Analiza întreprinsă în cadrul acestui studiu evidențiază faptul că transformările geopolitice recente, în special cele determinate de crizele regionale și de reconfigurarea ordinii economice internaționale, creează un context favorabil pentru re poziționarea Republicii Moldova în cadrul economiei globale. În acest cadru, parteneriatul strategic cu Republica Populară Chineză, consolidat prin participarea activă în cadrul *Inițiativei Belt and Road (BRI)*, reprezintă o oportunitate valoroasă de diversificare a relațiilor externe, de atragere a investițiilor și de integrare a economiei moldovenești în lanțurile valorice globale.

Republica Moldova beneficiază de o poziție geografică favorabilă, situată la intersecția rutelor comerciale dintre Est și Vest, care, împreună cu statutul de țară candidată la Uniunea Europeană, creează premisele unei duble conectivități – cu piața europeană și cu rețelele asiatice. Proiectele deja inițiate sau propuse, precum modernizarea portului Giurgiulești, construcția de autostrăzi, digitalizarea educației și dezvoltarea de parcuri industriale sino-moldovenești, arată că există un potențial real pentru ca Republica Moldova să devină un nod logistic, investițional și de producție în regiune.

Cu toate acestea, cercetarea subliniază că valorificarea deplină a acestui potențial depinde în mod esențial de existența unei guvernante strategice coerente și echilibrate. Parteneriatul cu China comportă și o serie de riscuri, dintre care cele mai semnificative sunt: îndatorarea în condiții netransparente, posibile presiuni diplomatice și geopolitice, dezechilibrul sever al balanței comerciale, precum și dificultățile de compatibilitate cu standardele europene în materie de transparență, concurență și sustenabilitate.

În acest sens, se conturează un set de obiective prioritare care trebuie urmărite pentru a transforma relația cu China într-un veritabil motor de dezvoltare durabilă:

- Diversificarea exporturilor către piața chineză, prin extinderea categoriilor de produse cu valoare adăugată și promovarea produselor agroalimentare, ecologice și industriale moldovenești;
- Implementarea unor mecanisme riguroase de evaluare a investițiilor străine, în vederea filtrării proiectelor care pot genera dependență economică sau care contravin obiectivelor de integrare europeană;
- Stimularea implicării companiilor autohtone în proiectele bilaterale, prin crearea de joint-venture-uri și atragerea de investiții *greenfield* care să asigure transfer de tehnologie și formare profesională;
- Reducerea dezechilibrului comercial bilateral, prin promovarea unui cadru instituțional de susținere a exportatorilor și facilitarea accesului produselor moldovenești pe piața chineză;
- Consolidarea cadrului instituțional de coordonare a relațiilor economice moldo-chineze, pentru a asigura coerența, continuitatea și supravegherea strategică a proiectelor;
- Alinierea tuturor inițiativelor investiționale la standardele UE, pentru a menține compatibilitatea cu procesul de aderare și pentru a proteja sectoarele sensibile ale economiei naționale.

În concluzie, parteneriatul cu China are potențialul de a constitui un pilon complementar al integrării europene a Republicii Moldova, cu condiția ca această relație să fie construită pe principii de transparență, reciprocitate și interes național. Printr-o abordare selectivă și pragmatică, inspirată din bune practici regionale și guvernată de obiective de dezvoltare sustenabilă, Republica Moldova poate transforma cooperarea sino-moldovenească într-un factor de modernizare, conectivitate internațională și creștere economică pe termen lung.

BIBLIOGRAFIE

1. CĂLDARE, G., NAIZAMBAEV, T. Relațiile Republicii Moldova cu Republica Populară Chineză: realități și perspective. *Administrarea publică: teorie și practică*, 2013, (2), pp. 79–88. Chișinău: Academia de Administrare Publică pe lângă Președintele Republicii Moldova.
2. CĂLUGĂREANU, V. Criza energetică generată de Putin poate duce la dispariția enclavei separatiste Transnistria. *Deutsche Welle*, 21 octombrie 2022. [Accesat: 15.04.2025]. Disponibil: <https://www.dw.com/ro/criza-energetic%C4%83-generat%C4%83-de-putin-poate-duce-la-dispari%C8%9Bia-enclavei-separatiste-transnistria/a-63487206>
3. SCLEARUC, S. Dinamica și perspectivele relațiilor comerciale moldo-chineze. Asociația pentru Politică Externă (APE), ianuarie 2023. [Accesat: 15.04.2025]. Disponibil: <http://www.ape.md/2023/01/sorin-sclearuc-dinamica-si-perspectivele-relatiilor-comerciale-moldo-chineze/>
4. KARÁSKOVÁ, I. Moldova's Unexpected Opening to China. *China Observers in Central and Eastern Europe (CHOICE)*, 9 aprilie 2019. [Accesat: 15.04.2025]. Disponibil: <https://chinaobservers.eu/moldovas-unexpected-opening-to-china/>
5. SCHMITZ, R. How A Chinese-Built Highway Drove Montenegro Deep Into Debt. *NPR*, 28 iunie 2021. [Accesat: 15.04.2025]. Disponibil: <https://www.npr.org/2021/06/28/1010832606/road-deal-with-china-is-blamed-for-catapulting-montenegro-into-historic-debt>
6. RESEARCH INSTITUTE FOR GLOBAL VALUE CHAINS et al. *Global Value Chain Development Report 2023: Resilient and sustainable GVCs in turbulent times*. Beijing: University of International Business and Economics, 2023. [Accesat: 15.04.2025].
7. OEC WORLD. *Moldova-China Trade Profile 2019–2023*. [Accesat: 17.04.2025]. Disponibil: <https://oec.world/en/profile/bilateral-country/mda/partner/chn>
8. TRADINGECONOMICS. *Moldova Exports and Imports to/from China*. [Accesat: 17.04.2025]. Disponibil: <https://tradingeconomics.com>
9. XINHUA SILK ROAD. *China-Moldova Trade and Investment Cooperation Forum held in Chisinau*. 11 iunie 2024. [Accesat: 17.04.2025]. Disponibil: <https://en.imsilkroad.com/p/340565.html>
10. INFOMARKET. *Moldova and China are interested in expanding trade, economic and investment cooperation, implementing joint projects and will hold the next meeting of the intergovernmental commission in 2025*. 3 decembrie 2024. [Accesat: 17.04.2025]. Disponibil: <https://infomarket.md/en/analitics/358823>
11. EUROPEAN COMMISSION. *EU trade relations with Moldova*. 2024. [Accesat: 17.04.2025]. Disponibil: https://policy.trade.ec.europa.eu/eu-trade-relationships-country-and-region/countries-and-regions/moldova_en
12. INTERNATIONAL TRADE CENTRE (ITC). *Trade Map – Bilateral Trade between Republic of Moldova and China*. 2024. [Accesat: 17.04.2025]. Disponibil: https://www.trademap.org/Bilateral_TS.aspx?nvpm=1%7c498%7c%7c156%7c%7cTOTAL%7c%7c%7c2%7c1%7c1%7c2%7c2%7c1%7c1%7c1%7c1%7c1%7c1
13. BIROUL NAȚIONAL DE STATISTICĂ AL REPUBLICII MOLDOVA. *Comerțul exterior al Republicii Moldova în anul 2023*. 2024. [Accesat: 17.04.2025]. Disponibil: <https://statistica.gov.md>
14. SOUTH CHINA MORNING POST. *Chinese contractors in talks to build two highways in Moldova*. 28 martie 2019. [Accesat: 17.04.2025]. Disponibil: <https://www.scmp.com/business/china-business/article/3003323/chinese-contractors-talks-build-two-highways-moldova>
15. MINISTERUL AFACERILOR EXTERNE ȘI INTEGRĂRII EUROPENE AL REPUBLICII MOLDOVA. *Republica Populară Chineză*. [fără dată]. [Accesat: 17.04.2025]. Disponibil: <https://mfa.gov.md/ro/content/republica-populara-chineza>
16. GANSU PROVINCIAL DEVELOPMENT AND REFORM COMMISSION. *Belt and Road Portal*. [fără dată]. [Accesat: 17.04.2025]. Disponibil: <http://ydyj.gansu.gov.cn>

INNOVATION AND DIGITALIZATION IN THE BIOMASS SECTOR: STRATEGIC DIRECTIONS FOR A SUSTAINABLE FUTURE

INOVAREA ȘI DIGITALIZAREA ÎN SECTORUL BIOMASEI: DIRECȚII STRATEGICE PENTRU UN VIITOR SUSTENABIL

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Abstract

In the Republic of Moldova, most of the ecological problems have an anthropogenic origin. A large part of the rural population is poor, does not have access to drinking water and equitable sanitation, on the other hand, the population consciously and unconsciously causes pollution of aquatic resources, groundwater and soil. The majority of the population does not know the elementary norms related to the protection of soil and aquatic resources, nor does it know about the reduction of poverty and expenses through the use of ecological renewable energy.

Globally, we are irresponsible for the ecological disaster, the pollution of aquatic resources and soil. This behavior has become the norm for the vast majority of the population. Deforestation and air pollution with CO₂ have caused global warming, which is already causing a lot of damage to our planet.

As a result, we must admit that we have already exceeded all possible and impossible limits of consuming the Earth's natural resources.

Without any sense of caring parents, we are leaving a legacy to our descendants of a multitude of ecological problems, disaster, torment, poverty and futility.

Keywords: biomass, green energy, ecological renewable energy, aquatic resources, sustainable future

JEL: O33, Q42, Q55

Introducere

Biomasa reprezintă o sursă de energie regenerabilă produsă prin digestia anaerobă a materiei organice. Pe lângă contribuția sa la economia circulară, biogazul reduce dependența de combustibilii fosili și valorifică deșeuri agricole și menajere. Cu toate acestea, provocările legate de eficiența tehnologică, costurile ridicate și lipsa integrării în infrastructurile inteligente pot fi depășite prin inovare și digitalizare.

Producerea de biomasă este un proces esențial în tranziția către surse de energie regenerabile și durabile. Biomasa este o sursă de energie derivată din materiale organice, cum ar fi plante, lemn, deșeuri agricole și reziduuri industriale. Cu toate acestea, pentru a maximiza randamentul și eficiența, industria biomasei necesită inovații tehnologice și procese optimizate. Acest articol explorează cele mai recente inovații în procesul de producere a biomasei, punând accent pe tehnologii de pretratare, digestia anaerobă, cogenerare și utilizarea de noi substraturi.

Rezultate și discuții

Tehnologiile moderne de digestie anaerobă includ: sisteme de încălzire inteligente pentru menținerea temperaturii optime; reactoare modulare; sisteme avansate de pretratare a substraturilor (ultrasunete, hidroliză termică); cogenerare de înaltă eficiență (CHP).

Pretratarea biomasei este un pas important în procesul de conversie a materiei organice în biogaz sau bioenergie. Tehnologiile de pretratare ajută la îmbunătățirea eficienței proceselor de digestie anaerobă și creșterea randamentului de biogaz. Inovațiile în acest domeniu include;

- ✓ pretratarea termică (hidroliză termică): Procesul utilizează temperaturi ridicate pentru a descompune structurile celulare complexe ale biomasei, făcându-le mai accesibile pentru procesele enzimatice;
- ✓ pretratarea cu ultrasunete: Aceasta ajută la fragmentarea materiilor organice, creând o suprafață mai mare de contact pentru bacterii;
- ✓ pretratarea chimică: Utilizarea unor soluții chimice pentru a facilita degradarea celulozei și hemicelulozei din biomasa.

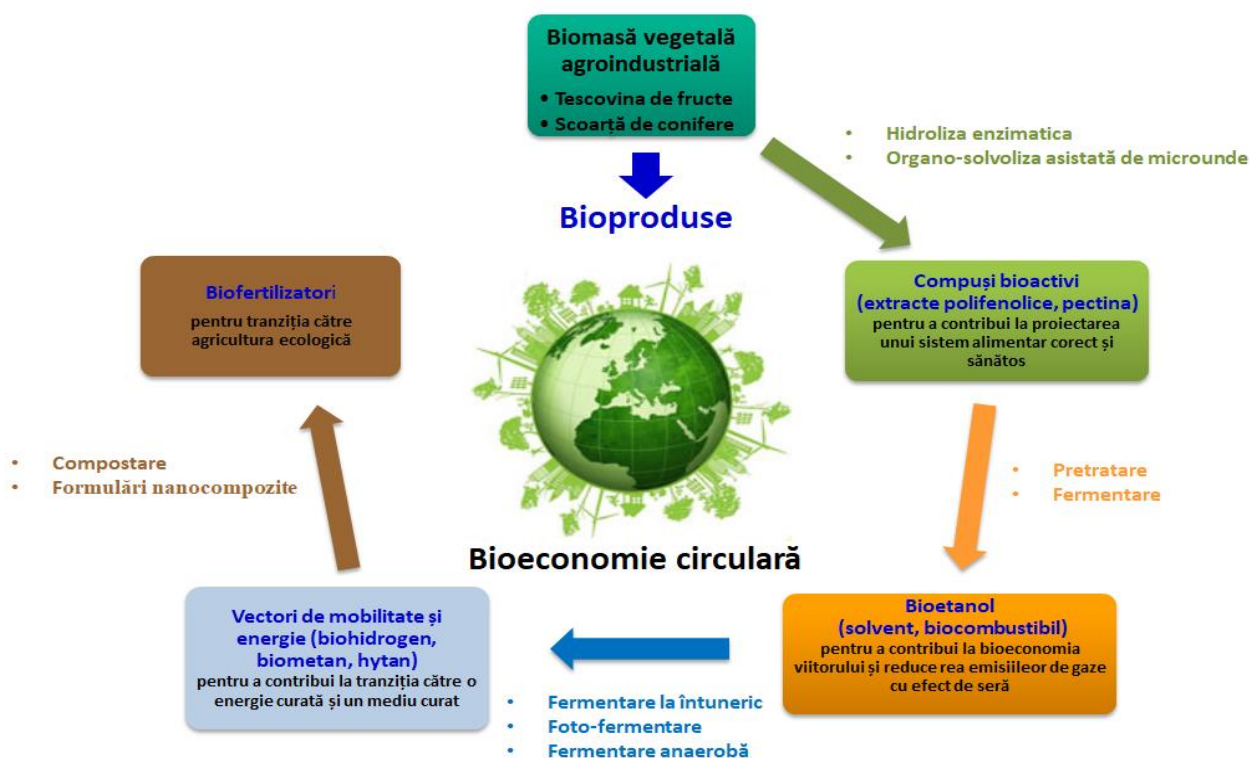


Figura 1. Inovații în Pretratarea Biomasei

Inovații în Digestia Anaerobă

Digestia anaerobă este procesul prin care microorganismele descompun materia organică în absența oxigenului, rezultând biogaz (principalmente metan) și un reziduu solid. Inovațiile în acest proces sunt esențiale pentru îmbunătățirea performanței și a randamentului de biogaz. Printre cele mai importante inovații se numără:

- ❖ reactoare anaerobe modulare: Aceste reactoare permit ajustarea capacității de procesare pe măsură ce cerințele de producție cresc, fiind flexibile și economice;
- ❖ utilizarea de bacterii metanogene modificate genetic: Aceste bacterii pot descompune substraturi mai complexe și pot crește eficiența producției de biogaz.

Tehnologiile de control al temperaturii permit obținerea unui mediu optim pentru microorganismele metanogene, sporind astfel producția de biogaz.

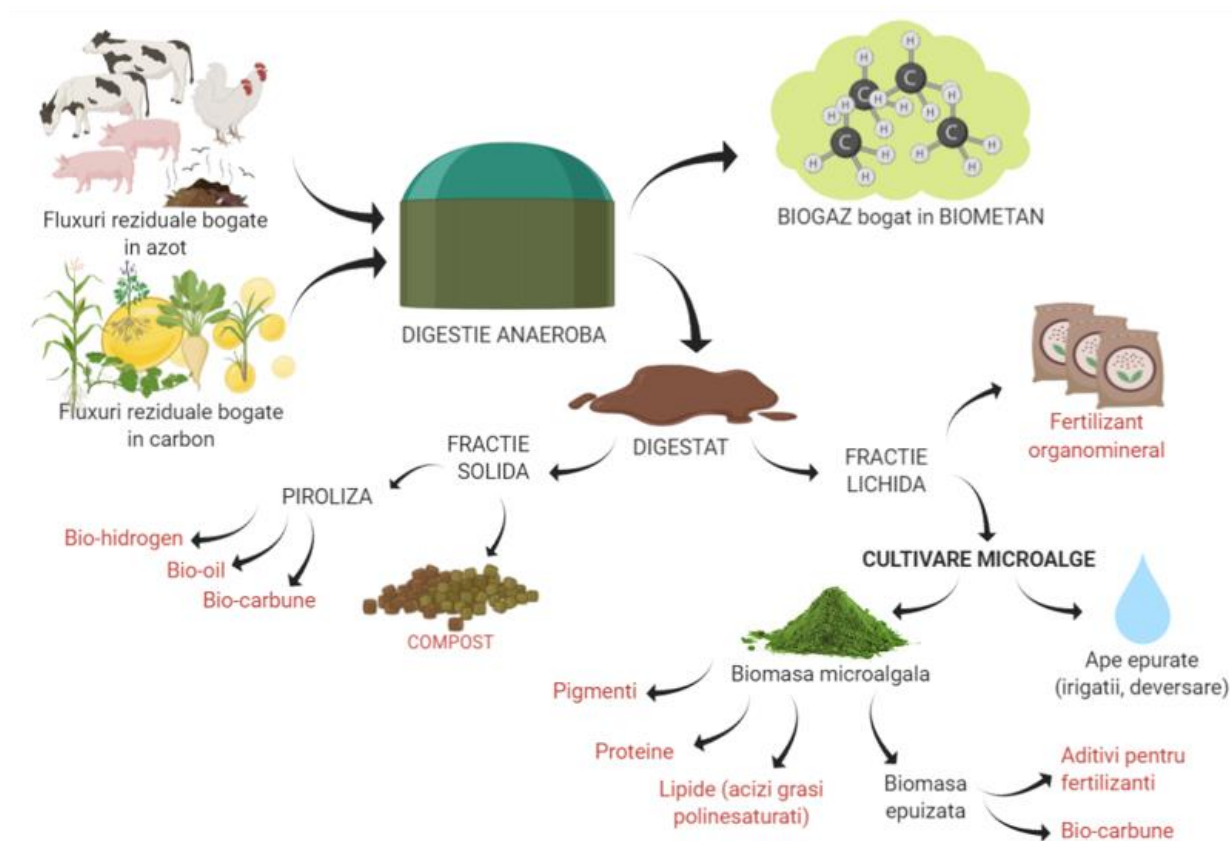


Figura 2. Inovații în Digestia Anaerobă

Inovații în Cogenerare și Utilizarea Biogazului

Cogenerarea este procesul prin care biogazul este utilizat pentru producerea simultană de electricitate și căldură. Inovațiile în cogenerare sunt cruciale pentru eficiența și rentabilitatea unităților de producție de biogaz. Printre inovațiile semnificative se numără:

- Sisteme de cogenerare de înaltă eficiență: Acestea permit utilizarea eficientă a căldurii generate, care poate fi utilizată pentru încălzirea instalațiilor sau pentru alte procese industriale.
- Micro-cogeneratoare: Tehnologia de micro-cogenerare folosește biogazul pentru producerea de electricitate și căldură în cantități mai mici, fiind ideală pentru fermele sau afaceri de dimensiuni mici.

Utilizarea de Noi Substraturi pentru Producerea Biogazului

Inovațiile în identificarea și utilizarea de noi substraturi pentru producerea de biogaz sunt esențiale pentru a maximiza resursele și a reduce costurile. Exemple de substraturi inovatoare include;

- ✓ Deșeuri alimentare: Acestea sunt o sursă semnificativă de materie primă pentru producerea de biogaz și sunt adesea disponibile la costuri reduse;
- ✓ Nămol urban: Nămolurile rezultate din stațiile de epurare a apei pot fi procesate pentru a produce biogaz, reducând în același timp poluarea;
- ✓ Alge și plante acvatice: Acestea pot fi cultivate rapid și utilizate pentru producerea de biogaz, oferind o sursă durabilă de materie primă.

BIOGAS

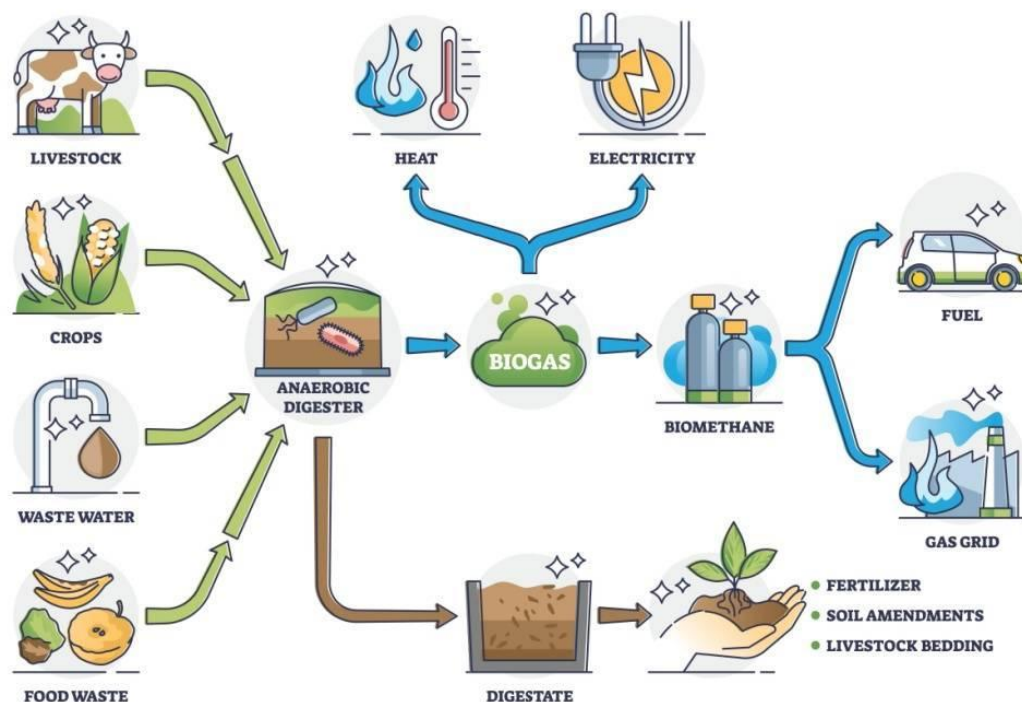


Figura 3. Substraturi pentru Producerea Biogazului

Inovațiile în procesul de producere a biomasei joacă un rol crucial în îmbunătățirea eficienței, reducerea costurilor și creșterea sustenabilității industriei. Tehnologiile moderne de pretratare, digestie anaerobă, cogenerare și utilizarea de noi substraturi permit o utilizare mai bună a resurselor și o reducere semnificativă a emisiilor de gaze cu efect de seră. Aceste inovații sunt esențiale pentru viitorul industriei de bioenergie și pentru tranziția globală către surse de energie regenerabilă.

În Republica Moldova, provocările legate de colectarea și procesarea deșeurilor pentru producția de biogaz sunt amplificate de fragmentarea pieței și de lipsa unor sisteme integrate de management al deșeurilor în multe regiuni. Cu toate acestea, potențialul este imens, având în vedere cantitățile semnificative de deșeuri organice generate în sectorul agricol, industria alimentară și gospodăriile private.

În contextul specific al Republicii Moldova există mai multe abordări eficiente pentru asigurarea unui flux constant de deșeuri organice. Printre acestea se numără:

- Colaborarea cu ferme mari și cooperative agricole din România, care permite accesul la cantități mari de deșeuri vegetale și gunoi de grajd.
- Colaborarea cu lanțuri de retail și industria HORECA. Aceste deșeuri sunt valoroase pentru biogaz, dar necesită sisteme de colectare și sortare bine structurate.
- Parteneriate cu autorități locale și companii de salubritate, care implică investiții în tehnologii de separare, dar asigură un flux constant de deșeuri.
- Centre proprii de colectare și procesare preliminară: companiile care dispun de resurse suficiente pot dezvolta centre proprii pentru colectarea și preprocesarea deșeurilor organice, ceea ce permite un control mai mare asupra calității.

De asemenea, există provocări logistice considerabile legate de colectarea și transportul deșeurilor, precum și aspecte tehnice cum ar fi necesitatea purificării biogazului pentru anumite utilizări. Și, nu în ultimul rând, procesul de obținere a autorizațiilor necesare poate fi complex și îndelungat, iar managementul mirosurilor și al emisiilor potențiale trebuie abordat cu atenție, pentru a evita efectele negative asupra comunităților din apropiere.

Concluzii

Așadar, biogazul reprezintă o soluție practică și eficientă pentru valorificarea deșeurilor organice, transformându-le în energie curată și fertilizanți naturali. Prin parteneriate strategice cu sectorul agricol, industria alimentară și autoritățile locale, companiile pot asigura un flux constant de materie primă pentru producția de biogaz, contribuind la reducerea emisiilor de gaze cu efect de seră și la diminuarea dependenței de resursele convenționale.

Bibliografia

1. Energie regenerabilă - studiu de fezabilitate Chișinău 2002.
http://www.clima.md/files/EficientaEnergetica/Studii%20de%20caz/Energia_Regenerabila_Rom.pdf
2. Clima Republicii Moldova cim.mediu.gov.md/starea/Cap_1.1.1.doc
https://ro.wikipedia.org/wiki/Clima_Republicii_Moldova
3. Construcția colectorului solar http://www.wecf.eu/download/2010/WECF_Construction_of_solar_collectors.pdf
4. Wikipedia: <https://en.wikipedia.org/wiki/Sanitation>
5. Ghid pentru utilizarea produselor EcoSan în calitate de fertilizanți în agricultură în Republica Moldova: (http://apasan.md/files/img/site/doc/Ghid_utilizare_a_produselor_Ecosan.pdf) Ghidul OMS privind utilizarea deșeurilor umane în agricultură: http://whqlibdoc.who.int/publications/2006/9241546859_eng.pdf?ua=1
6. Sisteme de epurare durabilă și eficientă a apelor reziduale din comunitățile rurale și suburbane cu până la 10,000 PE. Ghid: Elaborat de WECF anul 2010 <http://www.wecf.eu/download/2010/03/WastewaterguideRumnisch.pdf>
7. Manual pentru obținerea compostului în gospodării <http://www.twinning-waste-bacau.ro/waste-1/ce-putem-face/materialele/manual-pentru-obtinerea-compostului-in-gospodarii>

FROM RESOURCE MANAGEMENT TO A SUSTAINABLE ECONOMY DE LA MANAGEMENTUL RESURSELOR LA O ECONOMIE SUSTENABILĂ

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Abstract

In the context of global environmental and resource-related crises, effective resource management has become a key condition for the transition toward a sustainable economy. This article addresses the issue of food waste in the Republic of Moldova, highlighting the economic and social impact of the phenomenon and offering perspectives for reducing waste through public policies, education, and innovation within the supply chain. The paper emphasizes the need for an integrated approach to ensure sustainability in resource use and equity in access.

The study aims to highlight the correlation between consumer behavior, public policies, and the level of food waste, proposing a series of solutions applicable to the socio-economic context of the Republic of Moldova. The research is based on national statistical data, expert analyses, and European best practices.

Keywords: environment, resources, food waste, sustainable economy, resource management

Introducere

Economia actuală, bazată pe extracție, consum și eliminare, generează pierderi semnificative de resurse și impacturi negative asupra mediului. Tranziția către un model sustenabil necesită reformularea practicilor de management al resurselor și adoptarea unor politici și comportamente orientate spre durabilitate.

În ultimele decenii, presiunile exercitate asupra resurselor naturale au crescut exponențial, generând dezechilibre economice, sociale și de mediu. Una dintre cele mai acute probleme, cu implicații multidimensionale, este risipa alimentară. În Republica Moldova, nivelul risipei alimentare atinge cote alarmante, cu pierderi estimate la peste 12 miliarde de lei anual. Acest fenomen nu doar că reflectă ineficiența sistemului alimentar, ci și afectează direct sustenabilitatea economică și socială a țării. Articolul de față propune o analiză a acestei problematice în contextul mai larg al managementului resurselor și al economiei sustenabile.

Această cercetare are drept scop investigarea dimensiunii reale a risipei alimentare și integrarea acesteia într-un cadru mai larg de politici de dezvoltare durabilă. De asemenea, se urmărește reliefarea importanței educației pentru consum responsabil și rolul factorilor instituționali în reducerea pierderilor alimentare.

Rezultate și discuții

Contextul teoretic și conceptual

Managementul resurselor reprezintă un set de practici și politici menite să optimizeze utilizarea resurselor naturale și economice, asigurând continuitatea acestora pentru generațiile viitoare. Economia sustenabilă presupune echilibrarea obiectivelor de creștere economică cu protecția mediului și incluziunea socială. Risipa alimentară este un indicator al ineficienței în utilizarea resurselor, generând costuri economice, dar și impact ecologic major prin emisiile de gaze cu efect de seră și risipa de apă, energie și forță de muncă.

În literatura de specialitate, conceptul de „economie sustenabilă” este tot mai des asociat cu noțiuni precum economia circulară, eficiența resurselor, responsabilitatea socială și inovația ecologică. Acest articol își propune să analizeze fenomenul risipei alimentare nu doar ca o problemă izolată, ci ca o expresie a dezechilibrelor din sistemul economic și social, care reclamă reforme structurale.

Conceptul de economie sustenabilă și managementul resurselor: Economia sustenabilă presupune utilizarea eficientă și echitabilă a resurselor naturale. Este fundamentată pe principiile dezvoltării durabile și are la bază echilibrul între cele trei dimensiuni: economică, socială și ecologică.

Prezintă un model conceptual integrat (figura 1) ce evidențiază principalele componente ale tranziției către o economie sustenabilă. Acest model este structurat sub forma unui cerc dinamic, în care fiecare element este interconectat cu celelalte, reflectând caracterul sistemic al procesului de sustenabilitate și subliniază faptul că nicio componentă nu este eficientă în absența celorlalte. Doar o abordare integrată poate asigura tranziția durabilă de la un sistem liniar, bazat pe consum și risipă, la unul circular și echitabil.

Componentele-cheie ale modelului:

- Managementul resurselor – reprezintă punctul de plecare, vizând eficientizarea utilizării resurselor naturale, energetice și umane. Se pune accent pe reducerea pierderilor și optimizarea proceselor de producție.
- Politici publice sustenabile – formează cadrul legislativ și strategic al tranziției. Acestea includ reglementări privind economia circulară, stimulente fiscale, precum și planuri naționale de reducere a risipei alimentare și gestionare a deșeurilor.
- Tehnologie și inovație – facilitează aplicarea practică a principiilor sustenabilității, prin introducerea soluțiilor digitale, automatizare, inteligență artificială și sisteme de trasabilitate, cu rol important în reducerea risipei și creșterea eficienței.
- Educație și conștientizare – sprijină schimbarea comportamentelor de consum, cultivarea responsabilității ecologice și implicarea comunităților locale în procesele decizionale legate de sustenabilitate.
- Economie circulară – este rezultatul final al integrării tuturor acestor elemente, presupunând un model economic regenerativ în care resursele sunt păstrate cât mai mult în circuitul economic, iar deșeurile sunt reduse la minimum.

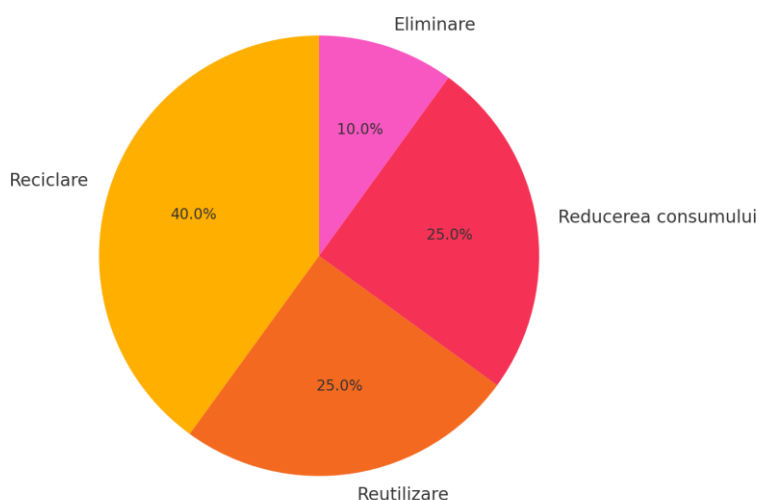


Figura 1. Strategii de utilizare eficientă a resurselor

De la economie liniară la economie circulară: Modelul liniar de dezvoltare este tot mai des înlocuit de economia circulară, care urmărește menținerea valorii resurselor cât mai mult timp în economie. Aceasta presupune re folosirea, reciclarea și reproiectarea produselor și proceselor pentru a minimiza deșeurile.

Managementul durabil al resurselor naturale: O abordare durabilă a resurselor include conservarea solului, gestionarea eficientă a apei și a pădurilor, și promovarea surselor regenerabile de energie.

Politici publice pentru sustenabilitate: Politicile publice sunt esențiale pentru a sprijini tranziția spre sustenabilitate. Ele pot include: reglementări, stimulente fiscale, subvenții pentru tehnologii verzi și strategii de educare a populației.

Tehnologiile emergente în sustenabilitate: Tehnologiile precum IoT, AI și blockchain pot sprijini eficiența energetică, trasabilitatea produselor și prevenirea risipei. Inovațiile pot reduce semnificativ impactul asupra mediului.

Educația pentru sustenabilitate: Educația joacă un rol crucial în formarea unei culturi a responsabilității față de mediu. Este necesară integrarea sustenabilității în programele școlare și universitare, precum și promovarea în mass-media.

Date și tendințe în Republica Moldova

Potrivit datelor IDIS „Viitorul”, în 2023, moldovenii au aruncat la gunoi produse alimentare în valoare de 12 miliarde de lei, echivalentul a 5,2% din cheltuielile lunare ale populației. Aceasta în contextul în care 42% din bugetul unei familii este destinat produselor alimentare – cel mai înalt procent din Europa. De asemenea, anual se risipesc 76 kg de mâncare per persoană, iar pierderile totale de alimente ajung la 19,2 miliarde de lei. Aceste cifre confirmă nu doar problema risipei, ci și nevoia urgentă de reformare a sistemului de producție, distribuție și consum.

Este important de remarcat că, deși populația Moldovei suportă costuri ridicate pentru alimente, o parte semnificativă a acestora nu este consumată. Raportat la dimensiunea economică a țării, Moldova înregistrează unul dintre cele mai ridicate niveluri de risipă alimentară din Europa de Est. Acest fenomen afectează atât securitatea alimentară, cât și mediul, prin acumularea de deșeuri biodegradabile și emisii asociate.

Tabelul 1. Risipa alimentară în diverse țări (1)

Țara	Risipa alimentară (kg/persoană/an)	Observații
Grecia	142	Cea mai mare risipă din UE
Malta	129	Nivel ridicat
Luxemburg	90	Stat dezvoltat, dar cu risipă mare
Moldova	76	Nivel ridicat comparativ cu venituri mici
România	70	Sub media regională
Austria	39	Printre cele mai reduse niveluri
Slovenia	34	Model de eficiență în UE
Rusia	33	Nivel scăzut, dar cu pierderi în lanțul de aprovizionare

Cauze și factori determinanți

Printre cauzele principale ale risipei alimentare se numără: comportamentele de consum iraționale, lipsa educației privind gestionarea alimentelor, infrastructura inadecvată pentru depozitare și distribuție, și lipsa unor politici coerente de prevenire. Inflația și creșterea prețurilor alimentare, paradoxal, nu au redus risipa – ceea ce indică o cultură de consum problematică, mai ales în rândul celor mai înstărite categorii sociale.

În plus, lipsa reglementărilor privind standardele de comercializare și donare a produselor alimentare aflate la limita expirării contribuie la creșterea risipei. Un alt factor este urbanizarea rapidă, care a determinat schimbări în comportamentul alimentar: preferința pentru produse preambalate, porții mari și alimente cu termen scurt de valabilitate. Aceste tendințe necesită o regândire a politicilor publice, inclusiv prin educarea consumatorilor și introducerea de stimulente fiscale pentru reducerea risipei.

Soluții și bune practici

Pentru combaterea risipei alimentare, este necesar un set de măsuri integrate: educație pentru consum responsabil, dezvoltarea rețelelor de donații (ex. Banca de Alimente), politici fiscale de

stimulare a donatorilor, investiții în infrastructura de procesare și stocare, și digitalizarea lanțului de aprovizionare. Exemple din alte state arată că prin colaborare între sectorul public, privat și societatea civilă, risipa poate fi redusă cu până la 50%.

În afara măsurilor menționate, țări precum Franța, Italia și Danemarca au adoptat legi care interzic supermarketurilor să arunce alimente comestibile. În Republica Moldova, un asemenea cadru legislativ ar putea susține inițiativele ONG-urilor și ale rețelelor de solidaritate. De asemenea, digitalizarea și utilizarea inteligenței artificiale pentru optimizarea stocurilor poate reduce semnificativ pierderile din lanțul comercial. Este vitală și cooperarea cu fermierii locali, pentru succesul afacerii.

Exemple extinse de bune practici internaționale:

- Franța – obligația supermarketurilor de a dona surplusul alimentar;
- Danemarca – Too Good To Go, aplicație pentru redistribuirea hranei;
- Italia – deduceri fiscale pentru companiile donatoare;
- Spania – legi locale privind reciclarea alimentelor;
- Japonia – politici stricte anti-risipă și campanii de educare;
- SUA – Feed America, rețea națională de bănci de alimente.

Tabelul 2. Programe de combatere a risipei alimentare (1)

Țara	Inițiativă	Rezultate
Franța	Legea contra risipei alimentare	Scădere cu 10% a risipei în 5 ani
Danemarca	Too Good To Go	1 mil mese salvate lunar
SUA	Feed America	Distribuție anuală de 4 miliarde mese
Italia	Incentive fiscale	Creștere a donațiilor cu 25%

Discuții și concluzii

1. Necesitatea unei tranziții sistemice către sustenabilitate

Republica Moldova se confruntă cu provocări semnificative privind risipa alimentară, ceea ce indică un model de consum ineficient și risipitor. Tranziția către o economie sustenabilă presupune schimbări sistemice, nu doar la nivel economic, ci și cultural și instituțional. Gestionarea eficientă a resurselor devine nu doar o necesitate practică, ci o obligație morală în contextul global actual.

2. Combaterea risipei alimentare ca prioritate națională

Diminuarea pierderilor alimentare ar trebui să fie o prioritate strategică a politicilor publice din Republica Moldova. Risipa alimentară reflectă disfuncționalități structurale și inegalități sociale și economice. Prin reducerea acestui fenomen, pot fi atinse multiple obiective: reducerea sărăciei, creșterea securității alimentare, protejarea mediului și optimizarea resurselor naturale.

3. Politici publice coerente pentru sustenabilitate

Implementarea unor politici publice coerente, bazate pe bune practici europene, este esențială pentru progres. Aceste politici ar trebui să includă:

- ✓ reglementări clare privind gestionarea surplusurilor alimentare;
- ✓ încurajarea fiscală a întreprinderilor care reduc pierderile din lanțul alimentar;
- ✓ promovarea economiei circulare și a parteneriatelor public-private pentru inovare și eficiență.

4. Rolul tehnologiei și al inovației în reducerea risipei

Tehnologiile digitale moderne oferă soluții concrete pentru prevenirea pierderilor alimentare, precum:

- ✓ senzori inteligenți pentru monitorizarea stocurilor și a expirării produselor;
- ✓ aplicații mobile pentru redistribuirea alimentelor neutilizate;
- ✓ algoritmi de inteligență artificială pentru optimizarea consumului;
- ✓ blockchain pentru trasabilitatea și transparența în lanțul de aprovizionare.

Aceste tehnologii pot fi implementate și în Republica Moldova, cu sprijinul sectorului privat, academic și prin fonduri europene de tranziție la economia verde.

5. Educația – pilon al schimbării de comportament

Orice tranziție spre sustenabilitate necesită o schimbare profundă de mentalitate la nivel individual și colectiv. Educația pentru sustenabilitate ar trebui:

- ✓ să fie introdusă progresiv în curriculumul școlar național;
- ✓ susținută prin campanii media și implicarea liderilor de opinie;
- ✓ completată cu inițiative locale de responsabilizare a consumatorilor și încurajare a solidarității sociale.

6. Oportunități pentru dezvoltare durabilă

Combaterea risipei alimentare nu este doar o necesitate, ci o oportunitate. Prin valorificarea eficientă a resurselor locale, stimularea inovației sociale și implicarea comunităților, Republica Moldova își poate construi un model economic sustenabil, competitiv și echitabil.

Bibliografie

1. Barilla Center for Food & Nutrition. Food Sustainability Index 2021. Parma: BCFN Foundation; 2021. Disponibil la: <https://foodsustainability.eiu.com>
2. Diaconia. Raport de activitate: Banca de Alimente Moldova 2023. Chișinău: Misiunea Socială Diaconia; 2023. Disponibil la: <https://bancadealimente.md>
3. Ellen MacArthur Foundation. Towards the Circular Economy: Economic and Business Rationale for an Accelerated Transition. Cowes, UK; 2013. Disponibil la: <https://ellenmacarthurfoundation.org/towards-the-circular-economy>
4. European Commission. Food waste prevention: EU policy and initiatives. Brussels: European Union; 2023. Disponibil la: https://ec.europa.eu/food/safety/food-waste/eu-actions_en
5. European Commission. The European Green Deal – Communication from the Commission to the European Parliament, the European Council, the Council, the European Economic and Social Committee and the Committee of the Regions. Brussels; 2019. COM(2019) 640 final. Disponibil la: <https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX:52019DC0640>
6. Food and Agriculture Organization of the United Nations (FAO). The State of Food and Agriculture 2019: Moving forward on food loss and waste reduction. Rome: FAO; 2019. Disponibil la: <https://www.fao.org/3/ca6030en/ca6030en.pdf>
7. Food and Agriculture Organization of the United Nations (FAO). The State of the World's Land and Water Resources for Food and Agriculture – Systems at Breaking Point (SOLAW 2021). Rome: FAO; 2021. DOI: <https://doi.org/10.4060/cb9910en>
8. Ioniță V. Analize economice: Risipa alimentară în Republica Moldova. Chișinău: Institutul pentru Dezvoltare și Inițiative Sociale (IDIS) „Viitorul”; 2024. Disponibil la: <https://www.facebook.com/IDISViitorul>
9. Mangla SK, Kumar P, Barua MK. Sustainable supply chain management: Review and implications for future research. Int J Mgmt Rev. 2015;17(4):399–417. DOI: <https://doi.org/10.1111/ijmr.12068>
10. Organisation for Economic Co-operation and Development (OECD). Policies for Transitioning to a Circular Economy. Paris: OECD Publishing; 2020. DOI: <https://doi.org/10.1787/2339cf62-en>
11. Organisation for Economic Co-operation and Development (OECD). Policies for transitioning to a circular economy. Paris: OECD Publishing; 2022. Disponibil la: <https://www.oecd.org/environment/waste/policies-for-transitioning-to-a-circular-economy.htm>
12. Rockström J, Steffen W, Noone K, Persson Å, Chapin FS III, Lambin EF, et al. A safe operating space for humanity. Nature. 2009;461(7263):472–475. DOI: <https://doi.org/10.1038/461472a>

13. Sachs JD. The Age of Sustainable Development. New York: Columbia University Press; 2015.
14. United Nations. Transforming our world: the 2030 Agenda for Sustainable Development. New York: United Nations; 2015. Disponibil la: <https://sdgs.un.org/2030agenda>
15. United Nations Environment Programme (UNEP). Food Waste Index Report 2021. Nairobi: UNEP; 2021. Disponibil la: <https://www.unep.org/resources/report/unep-food-waste-index-report-2021>
16. UNESCO. Education for Sustainable Development Goals: Learning Objectives. Paris: United Nations Educational, Scientific and Cultural Organization; 2017. Disponibil la: <https://unesdoc.unesco.org/ark:/48223/pf0000247444>
17. Waste and Resources Action Programme (WRAP). Food Waste Reduction Roadmap: Progress Report 2021. Banbury, UK: WRAP; 2021. Disponibil la: <https://wrap.org.uk/resources/report/food-waste-reduction-roadmap-progress-report-2021>
18. World Bank. Inclusive Green Growth: The Pathway to Sustainable Development. Washington, DC: World Bank; 2012. Disponibil la: <https://openknowledge.worldbank.org/handle/10986/6058>
19. World Bank. Reducing food loss and waste: A global imperative. Washington, D.C.: World Bank Group; 2022. Disponibil la: <https://www.worldbank.org/en/topic/agriculture/publication/reducing-food-loss-and-waste>
20. Zero Waste Europe. Strategies for food waste prevention across the EU. Brussels: Zero Waste Europe; 2020. Disponibil la: <https://zerowasteurope.eu/library/strategies-for-food-waste-prevention-across-the-eu/>

THE ROLE OF SUSTAINABLE PUBLIC PROCUREMENT IN THE DEVELOPMENT OF COOPERATIVES AND COLLECTIVE WELFARE

ROLUL ACHIZIȚIILOR PUBLICE DURABILE ÎN DEZVOLTAREA COOPERATIVELOR ȘI A BUNĂSTĂRII COLECTIVE

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Abstract

The role of sustainable public procurement in the development of cooperatives and collective well-being is a current theme in the context of international concerns related to the environment, sustainable economic development and social inclusion. Thus, sustainable public procurement by integrating economic, social and environmental criteria into national public spending, represents a powerful tool for promoting the Sustainable Development Goals.

The central objective of the study is to examine the impact of applying sustainability criteria in the public procurement process on the development of cooperatives.

Due to their community-based organizational structure and integration of sustainable development goals, cooperatives can be recognized as essential beneficiaries. Thus, sustainable public procurement can stimulate public authorities to collaborate with cooperatives on innovative projects, promoting the development of a circular economy, the creation of ergonomic jobs and social progress.

In conclusion, the article encourages the potential of sustainable public procurement to transform allocated financial resources into levers, to contribute to the sustainable development of cooperatives and ensuring social well-being.

Keywords: sustainable public procurement, cooperatives, sustainable development, collective welfare, social responsibility

JEL: H57, O44, P13

Introducere

Într-o perioadă marcată de provocări socio-economice complexe și o conștientizare tot mai vastă a importanței dezvoltării durabile, achizițiile publice transcend rolul său tradițional și devin un instrument strategic important, cu influență directă asupra dezvoltării economice și sociale la nivel național. Astfel achizițiile publice durabile reprezintă o paradigmă esențială, orientată spre optimizarea beneficiilor de mediu, economice și sociale pe termen lung.

Articolul examinează rolul achizițiilor publice durabile în susținerea și dezvoltarea cooperativelor. Aceste structuri economice se bazează pe principii democratice, solidaritate și responsabilitate comună și ocupă un rol important în realizarea dezvoltării durabile, generând bunăstarea colectivă prin coeziunea socială.

Atât cooperativele cât și achizițiile publice durabile au același punct comun și anume principiile echității sociale și economice, protecției mediului și implicării comunității. În timp ce achizițiile publice durabile stabilesc un context favorabil pentru promovarea valorilor sociale și de mediu, cooperativele oferă un model de afaceri ce reflectă aceste principii și poate contribui la dezvoltarea durabilă și echitabilă a societății.

Gradul de investigare a problemei la momentul actual

La nivel global, interesul pentru achizițiile publice durabile a crescut semnificativ în ultimul deceniu, în special în contextual angajamentelor asumate în conformitate cu Agenda 2030.

Cercetările actuale evidențiază potențialul achizițiilor publice durabile nu doar în promovarea unei economii circulare, dar și în atingerea unor obiective sociale, precum reducerea ratei șomajului, promovarea incluziunii și egalității.

Concomitent, economia socială, în mod particular cooperativele, au început să fie menționate tot mai des în cadrul cercetărilor privind dezvoltarea durabilă. Cooperativele sunt definite ca forme de organizare economice, orientate spre binele comunității și cu o capacitate mare de a răspunde nevoilor comunității locale și de a reinvesti valoarea obținută în beneficiul membrilor și al colectivității.

Cu toate acestea, cercetările existente la momentul actual, tratează parțial și fragmentar intersecția dintre achizițiile publice durabile și sectorul cooperative.

În Republica Moldova, această problemă rămâne insuficient exporată în literatură academică. Cu toate acestea, strategiile naționale recente fac referire la economia socială și achizițiile publice durabile, există totuși o nișă mai puțin explorată care vizează relația dintre aceste două domenii. De asemenea se remarcă o lipsă de instrumente de sprijin, atât pentru autoritățile contractante, cât și pentru cooperativele interesate să participe în cadrul procedurilor de achiziții publice.

Astfel, subiectul cercetării este unul actual și de mare relevanță. Articolul dat își propune să contribuie la dezvoltarea cunoașterii fundamentelor teoretice în domeniul, prin analiza punctelor de convergență dintre principiile achizițiilor publice durabile și cele ale cooperativelor, precum și promovarea acestui parteneriat în dezvoltarea bunăstării colective.

Metode și materiale

Prezenta cercetare explorează rolul achizițiilor publice durabile în dezvoltarea cooperativelor și a bunăstării colective, adoptând o abordare metodologică mixtă, care combină

analiza cantitativă cu cea calitativă. Obiectivul principal a fost identificarea mecanismelor prin care integrarea criteriilor de sustenabilitate în procesul de achiziții publice poate stimula creșterea și reziliența economică a cooperativelor, contribuind concomitent la Obiectivele Dezvoltării Durabile.

În cadrul cercetării a fost realizată o revizuire sistematică a literaturii de specialitate relevantă, care include analiza articolelor științifice din domeniul achizițiilor publice, economiei sociale, dezvoltării durabile și rapoarte ale instituțiilor internaționale și naționale.

Această etapă a contribuit la identificarea cadrului conceptual și al relațiilor dintre achizițiile publice durabile, principiile cooperatiste și obiectivele de dezvoltare comunitară.

Datele colectate au fost analizate utilizând o abordare tematică și comparativă. Cercetările tematice au identificat conceptele cheie și relațiile între achizițiile publice durabile, cooperative și bunăstarea socială. Analiza comparativă a fost aplicată pentru a identifica asemănările și diferențele în abordările adoptate și rezultatul obținut. Această comparație a permis formularea concluziilor și identificarea factorilor critici de succes.

Rezultate obținute și discuții

Potrivit proiecțiilor Departamentului pentru Afaceri Economice și Sociale al Națiunilor Unite (UN DESA), populația globală va atinge un vârf de 10,4 miliarde în anul 2080, după o creștere estimată la 8,5 miliarde până în 2030 și 9,7 miliarde până în 2050 [8]. Această creștere demografică va genera o cerere globală în continuă expansiune. Totuși impactele negative ale acestei cereri sunt deja evidente în numeroase țări în curs de dezvoltare. Ca urmare, introducerea reglementărilor care impun criterii de durabilitate, eficiență și transparență în cadrul procesului de achiziții, este o măsură stringentă, pentru a diminua efectele adverse asupra dezvoltării globale.

Literatura de specialitate reflectă un interes major față de modul în care sustenabilitatea afacerilor și conduita responsabilă, pot servi drept cadru de management, pentru a stimula avantajul competitiv și dezvoltarea organizațională. Unul dintre pionerii acestei abordări este conceptul „Triplul rezultat” al lui John Elkington (1994) [1; p.17]. Acesta a fost printre primele modele care a integrat principiile de mediu, sociale și de guvernare în practicile de management, bazându-se pe trei piloni fundamentali: oamenii, planeta și profitul. Conform viziunii lui John Elkington, întreprinderile care se concentrează exclusive pe rezultatul financiar, riscă să ignore consecințele sociale și de mediu, subestimând astfel costul real al achizițiilor.

Într-o abordare alternativă, Porter și Kramer (2011) propun integrarea extremităților sociale și de mediu, printr-un concept numit „ecosistem de valoare comună”. Această abordare promovează competitivitatea prin modelele de afaceri care includ soluționarea problemelor locale, ca element central al strategiei corporative. Conform autorilor, întreprinderile și comunitățile pot genera valoare comună atunci când strategiile manageriale și structura operațională sunt concepute în concordanță cu prioritățile societății [4].

Aceste perspective manageriale pot constitui un reper esențial pentru cooperative, susținându-le în procesul de dezvoltare și implementare a sistemului de achiziții durabile. Prin alinierea obiectivelor economice, cu necesitățile societății și cu imperativele de mediu, cooperativele pot contribui la promovarea unui model de dezvoltare durabilă și incluzivă.

O definiție larg acceptată a achizițiilor publice durabile, a fost dezvoltată în anii 2000, de către un grup de lucru al ONU, sub egida Procesului Marrakech pentru Consum și Producție Durabile, stipulează că „achizițiile publice durabile reprezintă un proces prin care organizațiile își

satisfac necesarul de bunuri, lucrări și servicii.” Scopul este de a obține cea mai bună valoare pentru bani pe termen lung, generând în același timp beneficii pentru organizație, societate și economie, și minimizând efectul negative asupra mediului [2; p. 6].

Programul Națiunilor Unite pentru Mediu, definește achizițiile publice durabile ca modalitatea prin care organizațiile procură bunuri, servicii și lucrări, asigurându-se că obțin cea mai bună valoare pe termen lung, în timp ce contribuie de dezvoltarea durabilă. Acest proces aduce beneficii societății și mediului, indiferent de moment sau locație [3; p. 1].

Conform International Cooperative Alliance, cooperativele sunt definite ca „o asociație autonomă de persoane unite în mod voluntar pentru a-și satisface nevoile și aspirațiile economice, sociale și culturale comune, prin intermediul unei întreprinderi deținute în comun și administrate democratic” [5].

Cooperativele reprezintă o component esențială a economiei mondiale, având un impact semnificativ asupra ocupării forței de muncă. În baza datelor actuale, aproape 10% din populația globală, își asigură traiul direct sau indirect, prin intermediul acestora.

Acestea pot fi considerate întreprinderi durabile, deoarece sunt bazate pe principii de echitate, democrație, solidaritate, egalitate și responsabilitate și prin promovarea achizițiilor publice durabile se poate alinia direct cu ODD. Deoarece achizițiile publice reprezintă cea mai mare piață la nivel internațional, având o valoare de circa 13 trilioane de dolari anual, în medie 10-20% din PIB-ul multor țări și sunt un pilon puternic pentru atingerea ODD-urilor”. Țintele ODD care reflectă legătura directă a acestora este 12.7 „Promovarea unor practici de achiziții publice sustenabile, în conformitate cu politicile și prioritățile naționale” și 16.6 „Dezvoltarea unor instituții eficiente, responsabile și transparente la toate nivelurile”.

Tabelul 1. Contribuția cooperativelor și achizițiilor publice durabile la cele trei dimensiuni ale Dezvoltării Durabile

Dimensiunea economică	Dimensiunea socială	Dimensiunea de mediu
ODD 8 „Muncă decentă și creștere economică”, APd pot contribui la crearea locurilor de muncă ergonomice și salarii juste, în special prin susținerea cooperativelor. La rândul său cooperativele sunt angajatori importanți la nivel global, oferind peste 280 milioane de locuri de muncă stabile.	ODD 1 „Fără sărăcie”, ODD2 „Zero foamă” prin susținerea producătorilor locali și a cooperativelor APd poate contribui la reducerea sărăciei și la securitatea alimentară;	ODD6 „Apă curată și igienă” achiziționarea de echipamente și servicii care utilizează eficient apa și reduc poluarea.
ODD 9 „Industrie, inovație și infrastructură”, prin cerințele de inovare și sustenabilitate în infrastructură, APd pot stimula investițiile în tehnologii durabile, sprijinul pentru industrii verzi și tehnologii emergente.	ODD 3 „Sănătate și stare de bine”, acțiune directă prin achiziționarea și oferirea medicamentelor, servicii de sănătate sau echipamente medicale conform standardelor etice și de mediu.	ODD 7 „Energie accesibilă și curată” achiziția energiei din surse regenerabile, promovarea eficienței energetice, reducerea consumului de energie, încurajarea inovației în domeniul energiei.

ODD 17 „Parteneriate pentru obiective” , consolidarea capacității instituționale, alinierea politicilor publice, cooperarea și transferul de practici eficiente.	ODD 4 „Educație de calitate” Asigurarea transportului școlar gratuit și ecologic, construirea și dotarea sălilor cu rechizite sustenabile.	ODD 11 „Orașe și comunități durabile” promovarea transportului public durabil, construcții verzi și spații publice durabile.
	ODD 5 „Egalitate de gen” acces echilibrat la oportunitățile economice, promovarea participării femeilor în afaceri, cerințe privind echitatea de gen la locul de muncă.	ODD 12 „Consum și producție responsabile” stimularea cererii pentru produse și servicii durabile, promovarea economiei circulare și educarea consumatorilor privind impactul deciziilor lor.
	ODD 10 „Inegalități reduse” condiționalități sociale în contracte, susținerea grupurilor vulnerabile, oportunități egale.	ODD 13 „Acțiune asupra climei” reducerea emisiilor de gaze cu efect de seră, prin selectarea serviciilor și produselor cu amprenta de carbon scăzută, monitorizarea emisiilor CO ₂ .
	ODD 16 „Pace, justiție și instituții puternice” APd transparente și responsabile contribuie la o bună guvernare, la reducerea corupției și birocrăției.	ODD 14 „Viața sub apă”, ODD 15 „Viața pe pământ” achiziționarea bunurilor, lucrărilor sau serviciilor care nu afectează biodiversitatea.

Sursa: Elaborat de autori în baza sursei [7]

În baza tabelului de mai sus deducem ca achizițiile publice durabile nu sunt doar un simplu proces, prin integrarea criteriilor de mediu, economici și sociali, ele devin un instrument transversal prin intermediul cărora cooperativele pot contribui semnificativ la realizarea ODD prevăzute în Agenda 2030 [3], transformând resursele publice în investiții strategice pentru dezvoltarea durabilă.

International Labour Organization (ILO) a notat că cooperativele au un rol esențial în generarea locurilor de muncă, valorificarea resurselor disponibile, atragerea investițiilor și susținerea economiei, încurajând totodată implicarea activă al oamenilor în progresul economic și social [6].

Consolidarea acestui parteneriat strategic între achizițiile publice durabile și cooperative poate fi valorificat, pentru a încuraja autoritățile publice să prioritizeze cooperativele în achizițiile lor, prin aplicarea măsurilor speciale precum: lotizarea contractelor, clauze sociale, sau rezervarea procedurilor pentru actori ai economiei sociale, în conformitate cu Directiva 2014/24/UE. Acest fapt va permite o transformare reală a sistemului economic, devenind mai echilibrat, sustenabil și centrat pe oameni.

În urma cercetărilor realizate se remarcă o convergență evidentă între cele două paradigme:

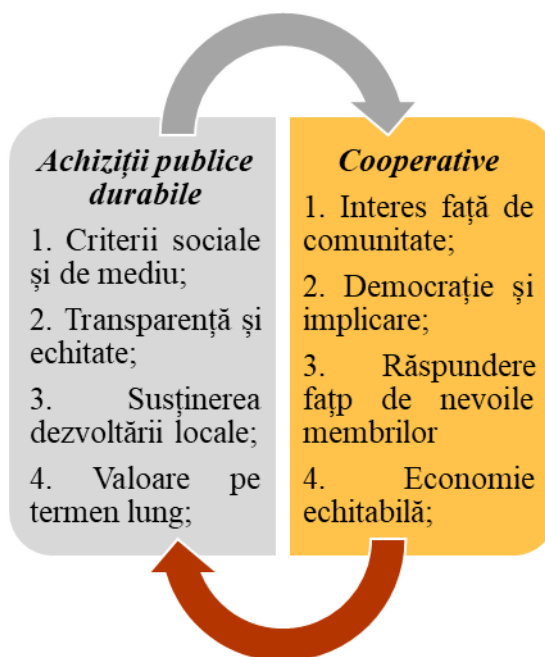


Figura 1. Convergența achizițiilor publice durabile- cooperativele

Sursa: Elaborat de autori în baza literaturii studiate

Pentru a integra cooperativele în lanțul valori al achizițiilor publice, sunt necesare următoarele etape:

- Adaptarea cadrului legal de achiziții pentru a permite includerea criteriilor sociale și de mediu, în conformitate cu cadrul european;
- Promovarea măsurilor de rezervare a contractelor pentru cooperative, în special cele din domeniul serviciilor sociale, educație, agricultură și reciclare;
- Profesionalizarea funcționarilor publici și a membrilor cooperativelor, pentru a înțelege și a utiliza oportunitățile oferite de achizițiile durabile;
- Crearea unor platforme digitale, de dialog, între autoritățile publice și sectorul cooperativ, pentru identificarea nevoilor și adaptarea procedurilor necesare.

Importanța achizițiilor publice durabile în dezvoltarea cooperativelor și a bunăstării colective, poate fi argumentată prin mai multe perspective (Fig. 2).

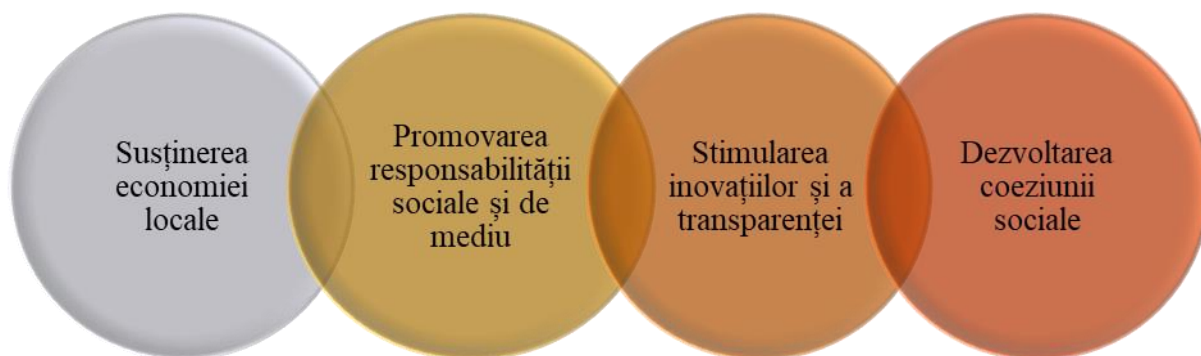


Figura 2. Rolul achizițiilor publice durabile în dezvoltarea cooperativelor

Sursa: Elaborat de autori în baza literaturii studiate

Un prim argument în susținerea acestei idei este determinat de *susținerea economiei locale*. Achizițiile publice durabile încurajează autoritățile contractante să ia în considerație impactul social și de mediu al bunurilor și serviciilor aprovizionate. Prin susținerea achizițiilor publice durabile, se deschid noi oportunități pentru cooperative, astfel acestea pot oferi produse inovatoare, adaptate nevoilor societății, stimulând astfel creșterea economică și crearea locurilor de muncă.

La rândul său cooperativele, în special cele din domeniul agricol, energiei regenerabile și cele din sfera socială, sunt după natura sa orientate spre durabilitate și pot deveni furnizori în cadrul sistemului de achiziții publice durabile.

Din alt punct de vedere achizițiile publice durabile pot contribui la *promovarea responsabilității sociale și de mediu*, prin crearea locurilor de muncă durabile și reducerea șomajului, inclusiv angajarea persoanelor din grupuri vulnerabile și susținerea egalității. Prin integrarea criteriilor sociale se conturează o viziune integratoare a dezvoltării economice, în care statul, economia socială și societatea, colaborează pentru realizarea obiectivelor comune, durabile și echitabile.

Stimularea inovațiilor și a transparenței, prin dezvoltarea tehnologiilor noi care abordează provocările sociale și de mediu, cooperativele devin parteneri valoroși ai acestui proces. Datorită proximității lor cu comunitatea, cooperativele au capacitatea de a crea soluții personalizate, care întrunesc nevoile speciale, astfel obțin eficiență și transparență, comparativ cu abordările generice.

Prin stimularea colaborării la nivel național și internațional, cooperativele pot forma parteneriate pentru inovație și schimb de bune practici. De asemenea prin promovarea parteneriatelor public-cooperatiste, se contribuie la crearea proiectelor comune la nivel național. Domeniile vizate sunt: digitalizarea serviciilor, infrastructura locală, agricultura durabilă, reciclare și energie regenerabilă.

Dezvoltarea coeziunii sociale, este în legătură directă cu activitatea economică a cooperativei. Atunci când cooperativele prosperă, întreaga societate beneficiază, deoarece profiturile sunt adesea investite local, formând un ciclu integru de dezvoltare. În acest sens achizițiile publice durabile pot condiționa procurarea de bunuri, servicii și lucrări durabile pentru a satisface nevoile comunității, de la furnizori locali, inclusiv cooperativele.

Includerea criteriilor de mediu în caietul de sarcini, precum utilizarea de materiale regenerabile, reducerea emisiilor de CO₂, ambalaje ecologice etc. statul stimulează tranziția cooperativei către modele prietenoase mediului. Astfel achizițiile publice durabile contribuie la realizarea ODD privind combaterea schimbărilor climatice.

Deși beneficiile sunt evidente, în cadrul cercetării s-au identificat și bariere semnificative care limitează participarea deplină a cooperativei la procesele de achiziții publice.

Printre acestea putem menționa:

- Capacitatea administrativă limitată, cooperativele pot confrunta dificultăți în respectarea și înțelegerea cerințelor complexe ale documentației;
- Lipsa expertizei autorităților contractante în definirea justă a criteriilor de durabilitate;
- Gradul redus de informare a cooperativei cu privire la oportunitățile sistemului de achiziții publice;
- Bariere financiare semnificative pentru cooperative;
- Dimensiunea contractelor, uneori contractele publice sunt de o amploare prea mare pentru capacitatea de producție a cooperativei;
- Birocrația excesivă și lipsa unor instrumente de sprijin pentru entitățile mici.

Provocările menționate, sugerează faptul, că pentru a majora potențialul achizițiilor publice durabile, în susținerea cooperativelor, este necesar de creat mecanisme de susținere. Astfel, pentru a optimiza rolul achizițiilor publice durabile în dezvoltarea cooperativelor și bunăstării sociale, în baza rezultatelor anterioare, se pot formula mai multe recomandări.

Printre acestea putem enumera: simplificarea procesului, schimb de experiență și instruire, prin promovarea parteneriatului, elaborarea de ghiduri și instrumente practice, fragmentarea contractelor pe loturi mai mici, pentru a crește accesibilitatea cooperativelor, suport tehnic pentru elaborarea ofertelor și programe de pre-finanțare sau garanții. O altă recomandare importantă este monitorizarea rezultatului prin stabilirea unor indicatori clari de măsurare a impactului achizițiilor publice durabile asupra dezvoltării cooperativelor și a bunăstării colective, asigurând o îmbunătățire continuă a politicilor.

Concluzii

În concluzie, achizițiile publice durabile și cooperative înregistrează o viziune comună asupra dezvoltării: una bazată pe responsabilitate, egalitate și durabilitate. Achizițiile publice durabile nu se limitează doar la un proces administrativ, dar constituie un instrument de politică publică cu valoare semnificativă. Odată cu orientarea resurselor publice către cooperative, statul poate facilita dezvoltarea durabilă, promovând coeziunea socială și protejarea mediului ambiant. Într-o societate orientată spre câștiguri rapide, promovarea modelelor bazate pe transparență, responsabilitate și echitate devine crucială pentru dezvoltarea unei economii sustenabile. Astfel achizițiile publice durabile devin un pilon de democratizare economică, care fixează bunăstarea colectivă în detrimentul intereselor personale.

Existența unui management eficient și a unor structuri funcționale reprezintă factori critici pentru asigurarea sustenabilității și a succesului pe termen lung a unei cooperative, influențând direct capacitatea acesteia de a integra un sistem de achiziții durabile.

Dezvoltarea cunoștințelor și consolidarea gradului de conștientizare a managerilor, angajaților și membrilor cooperativelor în ceea ce privește importanța criteriilor de durabilitate în procesul de achiziții, reprezintă un element esențial în promovarea ODD.

În contextul actual, marcat de necesitatea armonizării progresului economic cu responsabilitatea socială și de mediu, achizițiile publice durabile devin un vector prin care dezvoltarea economică poate fi orientată către satisfacerea intereselor colective ale societății. Astfel diseminarea informațiilor privind cerințele de sustenabilitate socială și de mediu joacă un rol important, contribuind la creșterea nivelului de conștientizare și implicare în rândul membrilor cooperativelor. Acest fapt poate stimula interesul părților implicate de a se alinia noilor standarde și așteptări ale societății, răspunzând astfel cerințelor tot mai stringente ale piețelor și politicilor publice orientate spre dezvoltare durabilă.

Referințe

1. John Elkington, *Cannibals with Forks: The Triple Bottom Line of 21st Century Business*, New Society Publishers, 1998, ISBN: 0865713928, p.17.
2. Swiss Confederation Federal Office for the Environment (2011), 'Marrakech Task Force on Sustainable Public Procurement Led by Switzerland: Activity Report May 2011', p. 6
3. United Nations Environment Programme (2017), *2017 Global Review of Sustainable Public Procurement*, p. 1

4. Michael Porter and Mark Kramer, Harvard Business Review, Business and society, Article “The ecosystem of Shared Value” 2011
5. International Cooperative Alliance, What is a cooperative? available: <https://ica.coop/en/cooperatives/what-is-a-cooperative>
6. The International Labour Organization (ILO), Cooperatives, available: <https://www.ilo.org/topics/cooperatives>
7. United Nations Moldova, Sustainable Development Goals in Moldova, available: <https://moldova.un.org/ro/sdgs>
8. United Nations Department of Economic and Social Affairs (UN DESA), Population Division, 2022, available: <https://www.un.org/en/desa>

S3

**DIVERSITY, COMPETITIVENESS, AND RESILIENCE: CHALLENGES AND
OPPORTUNITIES FOR COOPERATIVES**

**DIVERSITATE, COMPETITIVITATE ȘI REZILIENȚĂ: PROVOCĂRI ȘI OPORTUNITĂȚI
PENTRU COOPERATIVE**

COMPETITIVENESS OF TRADE ENTERPRISES IN THE CONDITIONS OF EXISTENTIAL CHALLENGES: DIRECTIONS FOR IMPROVEMENT

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Abstract

Modern approaches to strengthening the competitiveness of trade enterprises under conditions of economic instability are examined. The main problems complicating the implementation of competitive strategies in trade enterprises are identified. Tools for enhancing competitiveness amid existential challenges are proposed.

Cash flow management strategies are analyzed, including forecasting financial transactions and automating cost control. The impact of disruptions in logistics chains on trade activities is assessed, and the effectiveness of cooperation with domestic manufacturers and the use of multimodal transportation is substantiated.

The role of business digitalization is explored, particularly the implementation of ERP and CRM systems, RFID technologies, and Big Data analytics to improve resource management efficiency and personalize customer service.

The importance of expanding partnerships, entering new markets, developing export strategies, and utilizing modern marketing tools to ensure the financial stability of enterprises is emphasized. The need for a comprehensive approach to business adaptation, including financial, technological, logistical, and marketing aspects, to overcome crisis challenges and achieve sustainable development is highlighted.

Keywords: *business digitalization, logistics strategies, competitiveness, access to international markets*

JEL: G31, G32, M21

Introduction

In today's volatile environment, businesses face numerous challenges caused by economic instability, global market changes, and rapid technological progress. These challenges force businesses to constantly adapt their business models to remain competitive and ensure financial stability. The lack of a clear strategy can lead to significant risks, such as reduced management efficiency, increased costs, and loss of financial stability. This affects the competitive advantages of the business.

Results obtained and discussions

The competitiveness of an enterprise can be considered as the ability to adapt to market changes, maintain a strong position and satisfy customer needs, despite internal and external challenges. This concept has two important components [1]: impact on the development of the enterprise - the ability to expand the resource base, improve production processes, improve the quality of products and services; dependence on external factors - market conditions, state policy, the level of effective demand, inflation, etc.

The formation of an effective organizational and economic mechanism for ensuring the competitiveness of trade enterprises in Ukraine faces a number of serious problems caused by both internal and external factors. In modern conditions, enterprises are forced to adapt their strategies to an unstable economic environment, high competition and systemic challenges that affect their viability and development.

According to scientists, modern factors affecting the activities of trade enterprises require the development and implementation of effective organizational and economic tools that will allow enterprises to adapt to challenges and maintain competitive positions in the market. An important task is to create a strategy that will take into account not only current limitations, but also long-term opportunities for the development and strengthening of the competitiveness of Ukrainian trade business [2].

In the conditions of an unstable economic environment and structural changes in the global and national economy, trade enterprises, according to scientists, are forced to adapt their business models, using a wide range of tools to strengthen competitiveness. From effective management of financial resources to digital transformation and optimization of logistics processes - an integrated approach becomes the basis for the resilience of enterprises to the challenges of the modern market [3].

In today's conditions of macroeconomic instability, enterprises need to carefully control their financial flows, minimizing risks and ensuring a sufficient level of liquidity. To do this, it is necessary to apply complex financial instruments and strategies that will allow maintaining financial stability and competitive advantages.

The destruction of logistics chains significantly complicates the activities of trading enterprises, which requires the development of new strategies in the field of supply. Therefore, the main tool for optimizing competitiveness here is cooperation with Ukrainian manufacturers, which allows minimizing risks associated with imports and reducing logistics costs, as well as the use of multimodal logistics solutions - a combination of different types of transport (road, rail, water) for optimal balancing of cost and speed of delivery [3].

Business digitization is a key factor in strengthening competitiveness, as modern technologies allow optimizing processes, reducing costs and improving customer experience [4]. The implementation of ERP (Enterprise Resource Planning) systems helps to manage finances, supplies and inventories in an integrated manner, which reduces the risks of product shortages and improves cost control. The use of CRM (Customer Relationship Management) systems contributes to the personalization of interaction with customers, allows you to forecast demand and increases their loyalty through an individual approach. Automation of inventory accounting thanks to RFID technologies significantly simplifies inventory, minimizes losses and allows you to avoid situations of shortage or excess of products. The use of Big Data and analytics allows enterprises to better understand market trends, quickly respond to changes in consumer preferences and build more accurate demand forecasts. In periods of economic instability, the importance of effective marketing and the development of multi-channel sales increases. Omnichannel marketing, which combines physical stores, online platforms, mobile applications and social networks, creates a single customer experience and expands sales opportunities. Personalized loyalty programs allow you to retain regular customers thanks to individual offers, discounts and bonus programs. Flexible pricing and dynamic discounts help businesses quickly adapt to changes in consumer purchasing power, maintaining a stable level of sales even in times of crisis. Active use of social networks and content marketing plays an important role in attracting customers, as consumers are increasingly focused on information campaigns, video advertising and blogger recommendations.

Expanding partnerships and entering new markets are important strategic directions that allow enterprises to adapt to changes in the external environment, minimize risks associated with internal economic instability, and find new opportunities for development [3]. Cooperation with international companies opens up access to foreign investments, technological innovations, and modern management practices, which increases the overall level of competitiveness of enterprises. Integration into global supply chains and the use of advanced business methods allow companies not only to improve the efficiency of

their own processes, but also to gain a foothold in international markets, which ensures financial stability in the long term.

Expanding sales markets through exports is a key tool for diversifying risks and finding new sources of income. The use of modern online platforms and international e-commerce platforms allows enterprises to go global without significant capital investments in opening physical representative offices abroad. Digital technologies allow you to optimize sales processes, simplify logistics operations and provide flexibility in working with international clients. In addition, active participation in international exhibitions, business forums and cooperation programs helps to establish business contacts, form long-term partnerships and exchange experience with leading companies in the industry.

Conclusions

The main problems that complicate the implementation of competitive strategies of trading enterprises are the limited resource base, liquidity problems, currency fluctuations, destruction of logistics chains, insufficient state support, reduced purchasing power of the population, shortage of qualified personnel, energy instability, competition from foreign companies and macroeconomic instability. To increase competitiveness, enterprises need to implement effective financial instruments, such as factoring, leasing, grant financing and international support programs.

References

1. Bilyavsky, V. M., Sheputa, M. M. Competitiveness of the enterprise as a factor of increasing its investment attractiveness. *Innovative economy*, 2017. P.11-12.
2. Shapovalova, I.V. Competitive advantages of the enterprise: retrospective analysis of the interpretation of terms. *Economy and society*. 2017. No. 10. P. 427–432.
3. Kutsyk, P., Lupak, R., Kachan, O. Specificity of mechanisms of state policy of development of internal trade. Regional aspects of development of productive forces of Ukraine, [S. l.], n. 28, p. 4-13, dec. 2023. DOI: <https://doi.org/10.35774/rarpsu2023.28.004> Available: <http://rarpsu.wunu.edu.ua/index.php/rarpsu/article/view/469> 0.95
4. Kutsyk, P. O., Kovtun, O. I. Application of artificial intelligence technologies in the system of substantiation of strategic business management decisions. *Entrepreneurship and trade*. No. 42, 2024, P.94-109. <https://doi.org/10.32782/2522-1256-2024-42-13>
5. The Case for Trade and Competitiveness. URL: https://www3.weforum.org/GAC_Competitiveness_2105.pdf. (access date: 28.04.2025)

COOPERATIVE AGRICULTURE IN MOLDOVA: ECONOMIC AND FINANCIAL PERFORMANCE IN A CONTEXT OF TRANSITION*

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*This article is the result of collaborative work between the two authors. However, it is possible to attribute the different paragraphs in relation to the prevailing tasks that were carried out. *Guido Migliaccio* designed and set up the work, outlining its methodological aspects. He also took care of the bibliographical analysis, setting the topic in the international scientific panorama. The paragraphs' "Introduction", "Literature Review", "Conclusions" are therefore attributable to him. *Mirko Mozzillo*, on the other hand, provided his fundamental contribution to the search for sector and financial statement data and the subsequent quantitative processing, drawing up the initial considerations derived from the information obtained. The paragraphs "The Sector", "Methodological Research", "Results obtained and discussions" are therefore his.

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The contribution of agricultural cooperatives to sustainable development in Moldova is the subject of growing interest, especially considering the post-Soviet transition process and the need to strengthen resilience. This study analyses the economic and financial performance of 69 Moldovan cooperative enterprises operating in crop, animal production, hunting, and related services from 2020 to 2023. The investigation uses advanced statistical analysis based on profitability ratios (ROE) and leverage, using clustering techniques, ANOVA and post-ANOVA tests. The results show heterogeneous trajectories among the groups of enterprises, with signs of growth and economic vulnerability. The critical analysis is complemented with theoretical references emphasising the role of transformational leadership, integrated supply chains and local social capital. The paper proposes reflections on the structural and cultural challenges that limit the effectiveness of cooperatives in Moldova, suggesting the need for more targeted public policies and future multidisciplinary investigations.

Keywords: Moldova, agricultural cooperative, rural development, ROE, leverage, cluster analysis

JEL: Q13, Q12, O18, P27, L31

1. Introduction

Cooperative enterprises in agriculture have become increasingly relevant in the economic transition processes of post-Soviet countries, including the Republic of Moldova. In a context characterised by profound historical and institutional discontinuities, cooperatives can be considered privileged tools for promoting sustainable development, economic inclusion and social cohesion in rural areas. However, the potential of cooperatives in Moldova is confronted with structural and cultural obstacles.

The Moldovan experience is part of the broader debate on the legacy of forced collectivisation, which has generated mistrust towards agricultural cooperation. As Hejkrlik et al. [5] noted, transformational leadership is crucial in consolidating cooperatives: leaders capable of generating trust and cohesion are crucial in building resilient and participatory organisations. In parallel, Lamont [10] already stressed the urgency of an integrated cooperative model along the entire agricultural supply chain - from production to marketing - to overcome the fragmentation of the production system.

Recent empirical studies, such as that of Sauer et al. [12], show that cooperatives, especially marketing cooperatives, can positively affect sales prices for agricultural producers by improving their bargaining power. This is particularly relevant in a context like the Moldovan one, which small farms characterise. Furthermore, Korniyenko et al. [8] draw attention to the importance of the legal and financial reforms that accompanied the emergence of the land market in the region: cooperative banks and credit unions are essential to ensure access to credit and support investments.

In addition to the economic and institutional dimensions, an anthropological perspective also emerges that reinterprets agricultural cooperation from a cultural perspective. According to Siniscalchi and Harper [13], local food systems express community, symbolic, and identity values that cooperatives can enhance, contributing to economic development, social cohesion, and territorial resilience.

This study analyses the economic-financial performance of agricultural cooperatives in Moldova over 2020-2023, focusing on the crop, animal production, hunting and related services

sector through advanced statistical tools applied to balance sheet data. The objective is to verify the economic effectiveness of cooperative forms as a lever for sustainable rural development in the context of an economy undergoing profound transformation.

2. Literature review

One of the most recent studies by Hejkrlik et al. [5] explores the impact of transformational leadership in creating and consolidating agricultural cooperatives in post-Soviet countries, including Moldova. Based on a mixed quantitative and qualitative approach, the investigation reveals that trust in leaders and their interpersonal skills is crucial for group cohesion and organisational sustainability. However, the analysis highlights the persistence of cultural challenges, such as mistrust towards cooperative forms inherited from the period of collectivisation and a lack of understanding of cooperative principles among members.

On the structural level, Lamont [10] already identified in the early years of the Moldovan reforms a mismatch between agricultural liberalisation policies and the capacity of the market to efficiently absorb and organise production. He proposed an integrated cooperative model involving all stages of the supply chain - from credit to transport - emphasising how building a network of true cooperatives could catalyse an inclusive modernisation of Moldovan agriculture. Although the contribution is dated, many of the issues diagnosed remain relevant today.

Sauer et al. [12] offer a complementary perspective, investigating the dairy sector in Moldova, Armenia, and Ukraine. The study shows that participation in marketing cooperatives, although with modest impacts, can improve the sale price at the farmgate, provided that stable and trusting relationships exist between the actors in the supply chain. Consolidation and competition in product withdrawal appear to be key elements, confirming that cooperatives can stabilise farm incomes.

In contrast, Korniyenko et al. [8] point out how agrarian reforms in the region (including Moldova) proceeded in parallel with the construction of cooperative financial institutions - agricultural banks, credit unions - essential to support access to capital. Their study highlights the centrality of cooperative forms not only in production but also in systemic support to the entire agro-industrial sector.

Finally, Siniscalchi and Harper [13] offer an anthropological look at the value of food and food networks in Moldova, placing agricultural practices and cooperatives in a more cultural dimension. Agriculture is an economic activity and a space of symbolic resistance and identity construction, which can strengthen social cohesion in rural areas.

However, there is a lack of quantitative studies based on balance sheet results. This research aims to fill this gap by answering the following research questions:

RQ1: What are the economic-structural characteristics of Moldovan cooperatives, divided into homogeneous groups?

RQ2: What has been the temporal evolution of their main economic and financial ratios?

3. Research methodology

Annual financial statements are a tool for obtaining valuable information to analyse the economic performance of any company. Their informative power increases if they are subjected to

complex analyses, calculating ratios and flows, expressive of certain corporate situations. This study processes information obtainable from the Orbis Europe complete platform managed by Moody's. The survey is related to the period 2020-2023, and considers the trend of the following income ratios:

- ROE (Return on Equity);
- Leverage ratio.

The data were first subjected to a cluster analysis process to divide them into three large groups: Cluster 1, Cluster 2, and Cluster 3.

The subdivision of the groups was done using cluster analysis. This is a widely used statistical technique to identify homogeneous groups within a dataset, based on common characteristics of observed variables. In this study, the k-means clustering methodology is applied to subdivide the dataset of cooperative enterprises, focusing on each company's annual turnover. Turnover is a crucial variable in the clustering analysis of enterprises, as it reflects the enterprise's economic performance. By clustering companies based on turnover, it is possible to identify companies with similar economic characteristics. For Cluster 1, 36 companies were identified, for Cluster 2, 23 companies, and for Cluster 3, 10 companies.

Figure 1 shows the distribution of agricultural cooperatives in a simulated two-dimensional space, with the dots coloured according to the cluster they belong to (1, 2 or 3). A certain separation between the clusters can be observed, suggesting that cooperatives differ from each other, mainly in their level of turnover. Cluster 3 appears more concentrated, indicating cooperatives with higher and similar turnovers, while clusters 1 and 2 are more dispersed, showing greater heterogeneity.

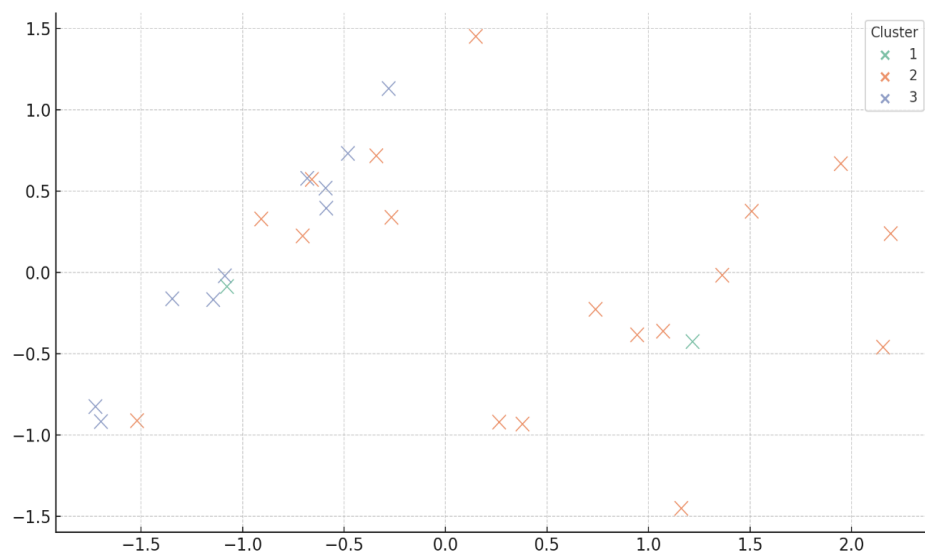


Figure 1. Cluster discovery

Source: Our elaboration

Furthermore, turnover can indicate future growth, which helps predict economic trends and make strategic decisions. The k-means methodology was chosen because it justifies its ability to obtain transparent and easily interpretable groupings by minimising intra-cluster variance [11]. This approach is instrumental in economics and business, as it allows companies to be segmented by size, risk, and growth potential, facilitating the formulation of targeted financial strategies [4]. This

methodological approach fits into a broader context of data mining applied to business science, where data segmentation allows for strategic insights crucial for economic planning [6].

Subsequently, they were also subjected to the following descriptive statistics for a more detailed analysis: mean, median, standard deviation, sample variance, skewness, minimum, maximum, and count of the actual available data. The sample data were cleared of outliers because they were either too high or too low

The ANOVA test, instead, was used to compare the means of the three groups under analysis. ANOVA is a mathematical method that is based on two hypotheses [7]:

- The null hypothesis (H₀) relates data from different geographical areas with very similar means, so as not to obtain significant differences.
- The alternative hypothesis, instead, is that at least one of the geographical areas presents values with significant differences, without, however, identifying it.

Where statistically significant differences emerge, it is possible to determine them with the Tukey-Kramer test, also called post-ANOVA [14; 9].

The financial statements are of Moldovan cooperative enterprises in the agricultural sector, considering the cultivation of pome and stone fruit, which are the driving force of the Moldovan agricultural sector.

4. The sector

The European agricultural market is a substantial sector that encompasses the production of various products, including crops and livestock products. In recent years, a significant increase in demand for agricultural products, including crops and livestock, has led to growth in the agricultural market. There are currently around 9.1 million agricultural enterprises in Europe [1].

4.1. Performance of the European agricultural sector

The European Union's agricultural sector contributed 1.3% of GDP in 2023, with a gross value added of € 223.9 billion [3]. Millions of small-scale farms account for the EU's agricultural production. In 2023, the agricultural sector contributed € 218.1 billion to the EU's GDP.

In terms of gross value added, every euro spent on producing goods and services produces € 0.71 in added value.

This value added in 2023 was lower than the relative peak of € 0.78 in 2017 and all subsequent years except 2022.

The total value of all the European agriculture sector's products in 2023 was € 537.1 billion. Crops, livestock, agricultural services, and a few non-agricultural products and services that are impossible to quantify individually are all included in this value. In 2023, crops accounted for 51.0% of the overall sector production (€ 273.6 billion), with vegetables, horticultural plants, and grains being the most valuable crops. Animals and animal products accounted for nearly two-fifths (39.9%) of the total output (€ 214.3 billion), with milk and pigs accounting for most of these.

The remaining 9.2% came from inseparable non-agricultural activities (€ 23.8 billion) and agricultural services (€ 25.4 billion). Data for the agricultural sector are shown in Figure 2.

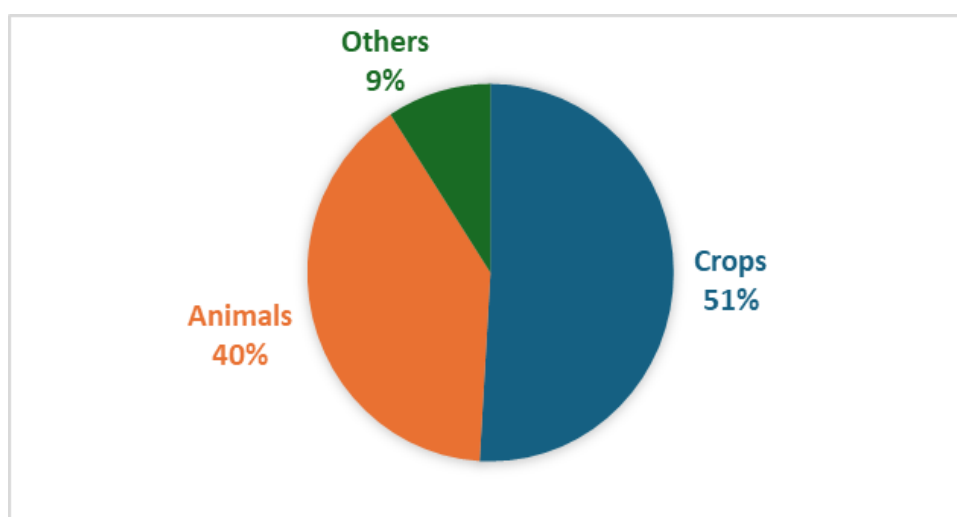


Figure 2. Agricultural products by macro-categories

Source: Our elaboration [2]

The pie chart shows a percentage distribution in which the category Crops (51%) holds a significant predominance, followed by Animals (40%), while Others (9%) represents a minority portion. This asymmetric distribution highlights a predominant focus on crop-related activities, implying a lower relevance of the elements included in the residual category, Others.

Going into detail and analysing the two large macro categories, in the Crops category, vegetables and plants are predominant (13.2%), followed by cereals (10.7%) and fruit (6.70%). Figure 3 highlights the production of the Crops category.

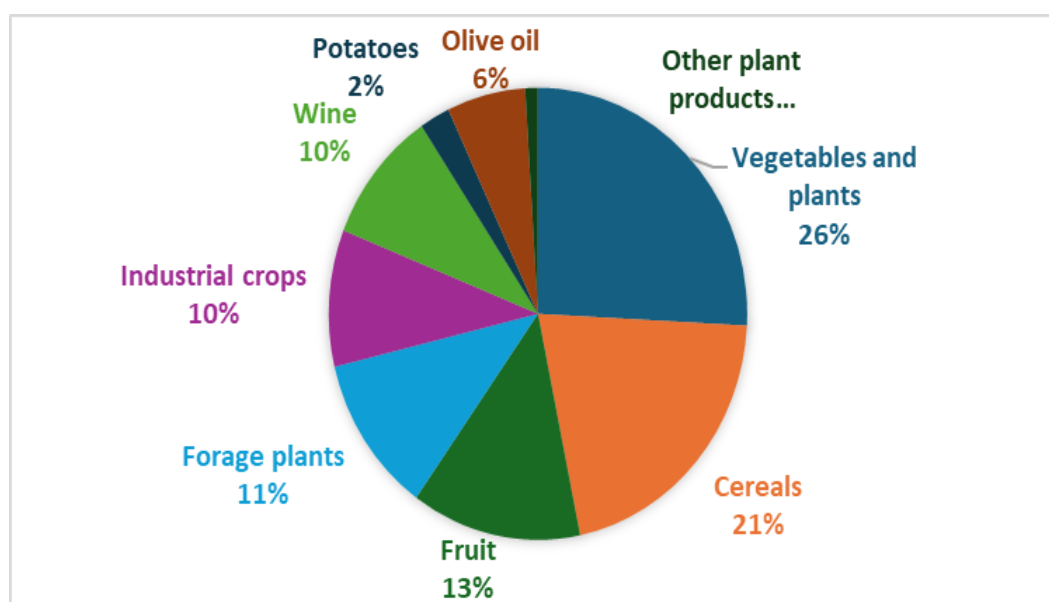


Figure 3. Products of the macro-category Crops

Source: Our elaboration [2]

As for the Animals category, the predominant product is milk (14%), followed by pigs (9%) and cattle (6.8%). Figure 4 highlights in detail the outputs produced by the category.

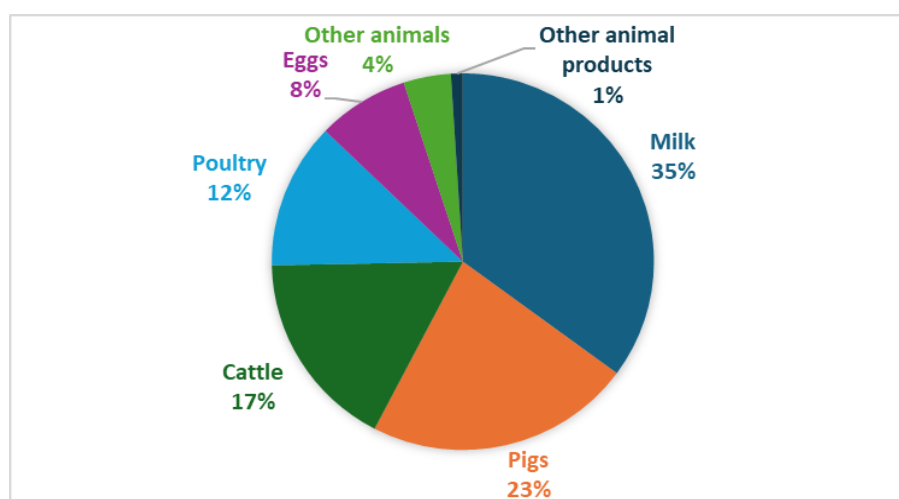


Figure 4. Products of the macro-category Animals

Source: Our elaboration [2]

4.2. Volume of agricultural production by European nation

In the EU, agricultural production amounted to € 537.1 billion in 2023, a decrease of 1.5% compared to 2022 [2]. The upward trend that started in 2010 was interrupted by this slight decrease compared to the production peak 2022. This change in nominal value results from a decrease in production volume (-2.3%) and a slight increase in the nominal price of agricultural goods and services (+0.8%). The evolution of nominal prices, nominal values, and volume in the European agricultural sector is highlighted in Figure 5.

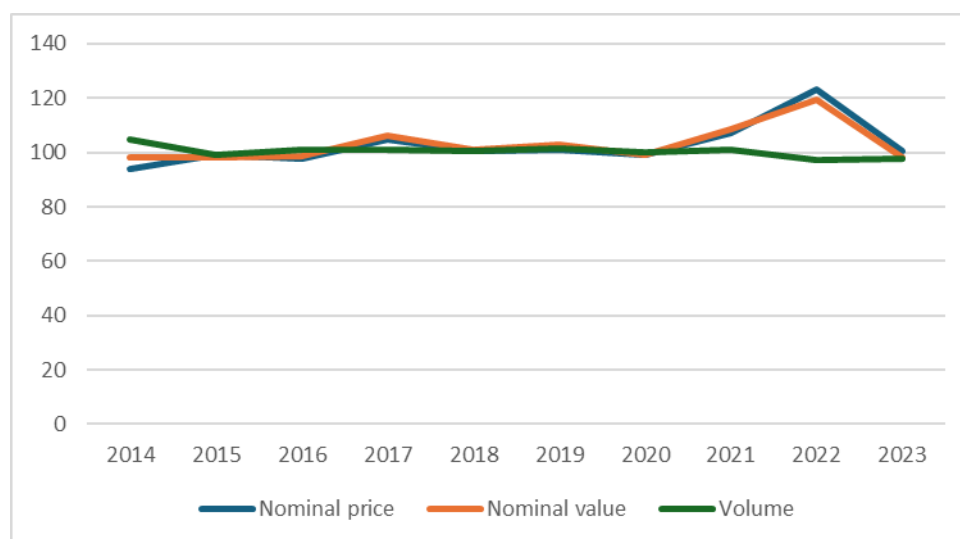


Figure 5. Evolution of the European agricultural sector in terms of price and volume

Source: Our elaboration [2]

The figure shows the European agricultural sector's evolution (2014-2023). The three observed variables show a relative stability over the period, with a convergence of values around the index 100. However, 2022 is characterised by a significant peak in the nominal price and nominal value, indicating a possible anomaly or a substantial change in the agricultural market. The subsequent return to pre-2022 values in 2023 suggests a transitory nature of this peak, while the total volume of the sector shows a lower overall volatility.

Within the EU, ten countries recorded above-average agricultural production volumes in 2023, although the volume was slightly lower than in the previous year. The highest growth rates were observed in Hungary (+11%), Slovakia (+5%), and Croatia (+3%). The remaining countries recorded decreases; the most significant were in Greece (-22%), Denmark (-21%), and Spain (-17%). Figure 6 shows the development of production volumes only in 2023.

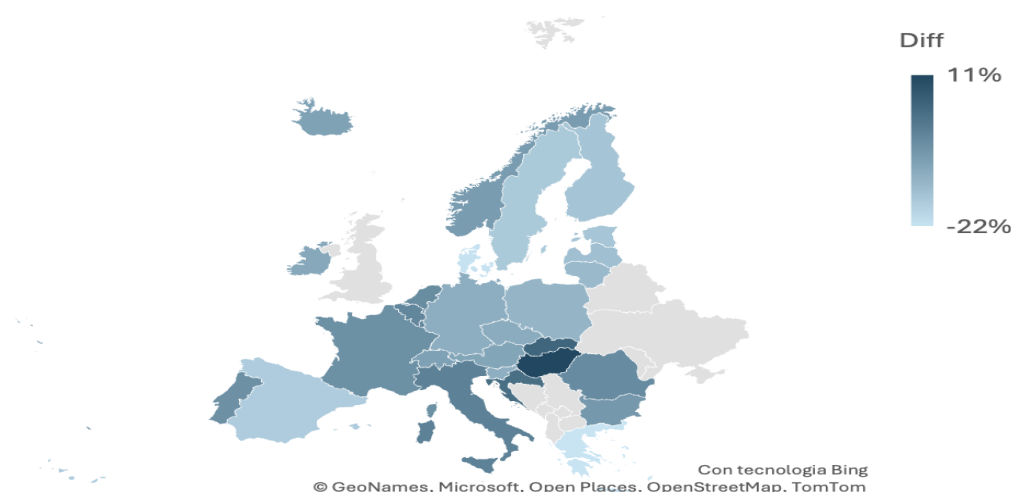


Figure 6. Volume of agricultural production by nation

Source: Our elaboration [2]

5. Results obtained and discussions

5.1. Analysis of the legal situation and size

The agricultural sector in Moldova is a significant component of the national economy and represents approximately 20% of the national GDP. With fertile soils (chernozem) and a favourable climate, Moldova has a strong agricultural vocation, especially in producing fruit, cereals, oilseeds, and vegetables. Therefore, the pome and stone fruit cultivation sector represents a fundamental asset of the Moldovan agricultural economy. The NACE Rev. 2 identifies the macro sector with the number 01: *Crop and animal production, hunting and related services*. This study refers to a sample of 69 cooperative companies in the Republic of Moldova operating from 2020 to 2023, with at least one data useful for the analysis in the four years. The companies under analysis refer to various sub-sectors specified in Table 1.

Table 1. Sub-sectors of NACE Rev. 2 - Code 01

NACE Rev. 2 Code	Sector
0111	Cultivation of cereals (excluding rice), legumes and oilseeds
0113	Cultivation of vegetables and melons, roots and tubers
0121	Cultivation of grapes
0123	Cultivation of citrus fruits
0124	Cultivation of pome and stone fruits
0125	Cultivation of fruit trees, berries and shells
0141	Dairy cattle breeding
0149	Other animal breeding

0161	Support activities for crop production
0163	Post-harvest activities
0164	Processing of seeds for sowing

Source: Our elaboration

The sample is the result of screening 6,017 companies initially identified, deleting from the analysis those not cooperatives. The companies analysed are all currently active. Table 2 reports the prevalent legal forms.

Table 2. Legal Form

	Moldova	Value %
Cooperatives – CP	56	81.16
Consumer cooperatives	13	18.84
<i>Total</i>	<i>69</i>	<i>100.00</i>

Source: Our elaboration

The predominant form appears to be Cooperative - CP, i.e., production. Table 3 shows the number of employees over the decade.

Table 3. Number employees

Year	2020	2021	2022	2023
Employees	235	239	258	285

Source: Our elaboration

The data, illustrated graphically in Figure 7, show an increasing trend in employment in the sector.

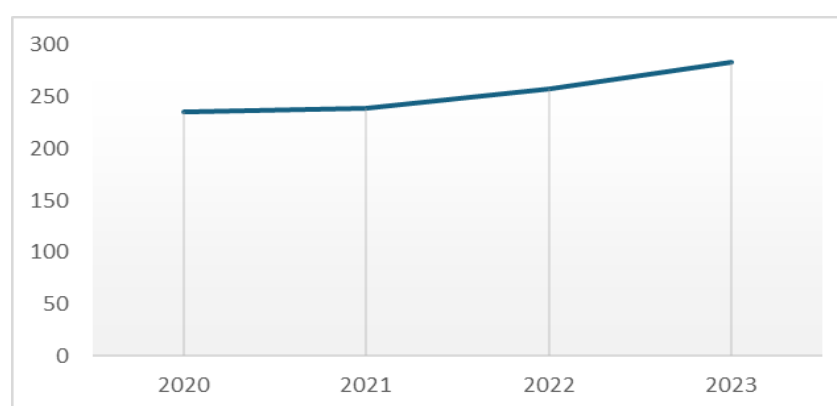


Figure 7. Employees trend

Source: Our elaboration

Table 4 shows the investments made in the sector.

Table 4. Total assets

Year	2020	2021	2022	2023
Total assets	30.862.46	38.382.23	38.614.23	41.127.66

Source: Our elaboration

The total assets grew considerably and steadily. The figures are confirmed by Figure 8.

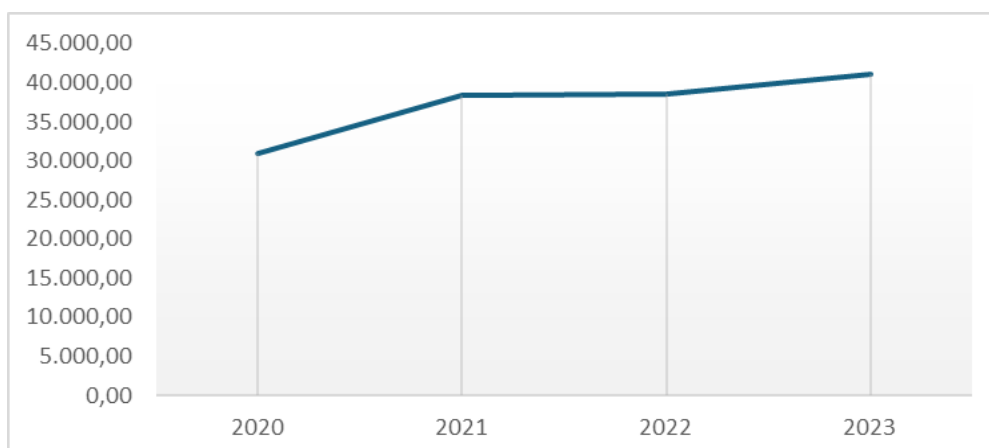


Figure 8. Total assets trend

Source: Our elaboration

Table 5, on the other hand, analyses turnover.

Table 5. Turnover analysis

Year	2020	2021	2022	2023
Turnover	13.368	16.445	15.022	16.336

Source: Our elaboration

After a slight decline in 2022, turnover increases again in 2023, returning to 2021 levels. The figures are illustrated graphically in Figure 9.

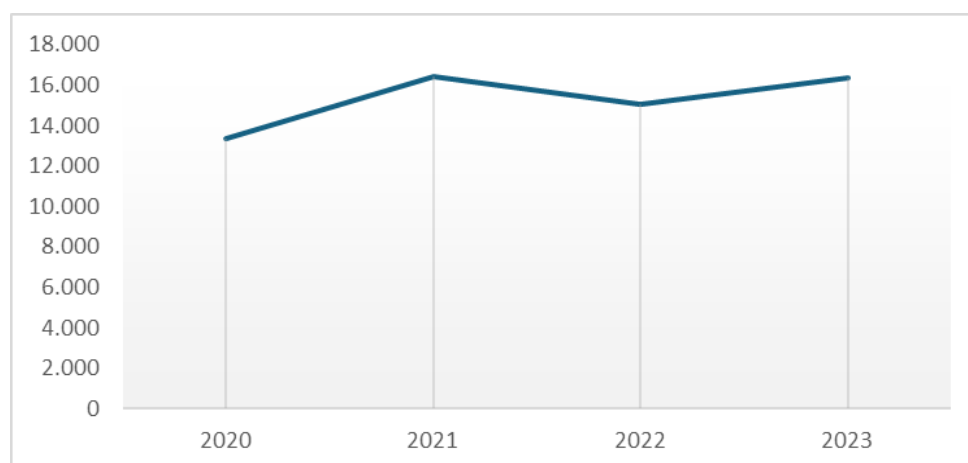


Figure 9. Turnover elaboration

Source: Our elaboration

5.2 Analysis of the development of the leading profitability ratios

5.2.1 ROE

Return on equity (ROE) is an economic ratio that measures the profitability of equity capital. The formula calculates it: $\text{net profit/equity} \times 100$.

The ratio summarises the company's overall profitability and therefore evaluates the performance of the top management. Table 6 presents the descriptive statistics.

Table 6. Descriptive statistics - ROE

Roe - Cluster 1	2020	2021	2022	2023
Average	5,68623077	8,2788	6,48092308	8,24081818
Standard error	11,7588707	15,9437302	9,29171437	6,42155228
Median	0,859	1,542	1,595	1,154
Standard deviation	42,3972111	61,7498015	33,5017526	21,2978795
Sample variance	1797,52351	3813,03798	1122,36743	453,59967
Kurtosis	0,61136426	0,6989319	5,51761653	5,7940759
Asymmetry	0,84193367	0,68599697	1,69898562	2,33007951
Interval	148,575	235,422	148,64	73,794
Minimum	-48,575	-83,455	-48,64	-8,07
Maximum	100	151,967	100	65,724
Sum	73,921	124,182	84,252	90,649
Count	13	15	13	11

Roe - Cluster 2	2020	2021	2022	2023
Average	8,81414286	7,453875	9,23109091	8,26927273
Standard error	12,6746074	6,04252949	2,9105942	4,58392518
Median	15,365	9,022	9,427	3,796
Standard deviation	33,5338592	17,0908543	9,65334888	15,2031599
Sample variance	1124,51971	292,097301	93,1871447	231,13607
Kurtosis	-0,3389307	-1,212185	-1,0087447	3,93272278
Asymmetry	-0,4845097	0,05321281	0,47756722	1,87080676
Interval	98,197	46,8	29,26	54,323
Minimum	-44,372	-15,551	-3,383	-7,416
Maximum	53,825	31,249	25,877	46,907
Sum	61,699	59,631	101,542	90,962
Count	7	8	11	11

Roe - Cluster 3	2020	2021	2022	2023
Average	5,47571429	9,102	7,92266667	6,502125
Standard error	7,24310035	10,9677398	8,66309711	7,47417751
Median	3,762	5,5495	7,108	7,4815
Standard deviation	19,1634423	31,0214526	25,9892913	21,1401664
Sample variance	367,237519	962,330522	675,443263	446,906636
Kurtosis	0,75324598	1,79798047	2,46837285	-0,3035172
Asymmetry	-0,4374805	-0,8290855	-0,9052496	-0,3222853
Interval	60,421	104,02	94,983	64,188
Minimum	-27,241	-52,219	-47,282	-28,327
Maximum	33,18	51,801	47,701	35,861
Sum	38,33	72,816	71,304	52,017
Count	7	8	9	8

Source: Our elaboration

The analysis of the ROE of the three clusters highlights heterogeneous performance trajectories, although converging towards a decrease in the period considered.

Cluster 1 has a positive trend in ROE from 5.69 in 2020 to 8.24 in 2023, but shows high variability among companies, especially in 2021. The performance distribution is skewed, with extreme outliers and a sharper shape than normal. The median is much lower than the mean, showing that some companies are performing much better than average.

Cluster 2 shows an average ROE between 7.45-9.23. It differs from the other clusters by a lower dispersion, with generally smaller standard deviations, particularly in 2022. This indicates that performance is more homogeneous among the companies in the cluster. In the first three years, there was skewness, but in 2023, there was marked positive skewness, accompanied by high kurtosis, indicating a concentration of data around the mean, and extremely positive values. The cluster dynamics are less unstable and rather stable in general.

Finally, Cluster 3 had irregular ROE changes, peaking in 2022 before declining in 2023. There was variability in the middle years, with high kurtosis early on and mostly negative skewness. This indicates some companies performed poorly, despite others being profitable. To graphically represent the trend of the average ratios, we identify the best interpolation equation that maximises R^2 (Table 7).

Table 7. Interpolation equation - ROE

Cluster	Equation	R^2
Cluster 1	$y = 1,3246x^3 - 10,143x^2 + 23,748x - 9,2442$	$R^2 = 1$
Cluster 2	$y = -0,9793x^3 + 7,4445x^2 - 16,839x + 19,188$	$R^2 = 1$
Cluster 3	$y = 0,7621x^3 - 6,9766x^2 + 19,221x - 7,5313$	$R^2 = 1$

Source: Our elaboration

The graphs in Figure 10 illustrate the trend of ROE in the four years under analysis, comparing the broken line and the corresponding interpolating curve due to the polynomial equation.



Figure 10. ROE comparison (2020-2023): Broken and interpolated curve

Source: Our elaboration

The analysis shows a sector with clear fluctuations. The graph shows the evolution of the three clusters (Cluster 1, Cluster 2, Cluster 3) from 2020 to 2023. Cluster 1 initially presents an exceptionally high level of ROE in 2020, which undergoes a sharp decline the following year, then remains at more stable values but still higher than the other groups. Cluster 2, however, shows a more unstable dynamic, with a peak in 2021 followed by a sharp collapse in 2022 and a subsequent recovery. Cluster 3 shows a more linear trend, characterised by a gradual decrease in ROE until the minimum in 2022, and a slight recovery in 2023. Analysis of variance excludes statistically significant differences (Table 8).

Table 8. Anova Test - ROE

SUMMARY

Groups	Count	Sum	Average	Variance
Cluster 1	4	28,6859538	7,17148846	1,68357557
Cluster 2	4	33,7691088	8,44227719	0,58904316
Cluster 3	4	28,9998393	7,24995982	2,52873694

VARIANCE ANALYSIS

Origin of the variation	SQ	dof	MQ	F	Significance value	F crit
Between groups	4,05690995	2	2,02845497	1,2674264	0,32736861	4,25649473
In groups	14,404067	9	1,60045189			
Total	18,4609769	11				

Source: Our elaboration

Comparing F with the critical F shows that the hypothesis H₀ is accepted, since the value of F is smaller. The subsequent post-Anova test is only aimed at confirming this conclusion.

5.2.2 Leverage ratio

The financial leverage ratio, or gearing, is an indicator that measures the amount of debt that a company or entity uses to finance its activities compared to its equity. It is calculated by dividing the total liabilities (debts) by a company's equity capital (net worth).

Table 9 provides the main descriptive statistics for Clusters 1, 2, and 3.

Table 9. Descriptive statistics - Leverage

Leverage - Cluster 1	2020	2021	2022	2023
Average	169,01875	126,8645	171,0375	234,6575
Standard error	69,3442951	8,5515	33,7495	16,9635
Median	177,47	126,8645	171,0375	234,6575
Standard deviation	138,68859	12,0936473	47,7290006	23,9900118
Sample variance	19234,5251	146,256305	2278,0575	575,520665
Kurtosis	-2,3115365	#DIV/0!	#DIV/0!	#DIV/0!
Asymmetry	-0,2512137	#DIV/0!	#DIV/0!	#DIV/0!
Interval	311,553	17,103	67,499	33,927

Minimum	4,791	118,313	137,288	217,694
Maximum	316,344	135,416	204,787	251,621
Sum	676,075	253,729	342,075	469,315
Count	4	2	2	2

Leverage - Cluster 2	2020	2021	2022	2023
Average	177,2355	187,206667	149,078	145,232857
Standard error	127,6385	49,4374511	49,5654531	46,609608
Median	177,2355	225,7415	147,4615	95,891
Standard deviation	180,508098	121,096529	121,410069	123,317431
Sample variance	32583,1734	14664,3694	14740,4048	15207,1889
Kurtosis	#DIV/0!	-1,4812584	-1,4413182	-2,2243374
Asymmetry	#DIV/0!	-0,4815366	0,29777372	0,26952034
Interval	255,277	303,503	301,273	280,933
Minimum	49,597	30,604	22,163	13,887
Maximum	304,874	334,107	323,436	294,82
Sum	354,471	1123,24	894,468	1016,63
Count	2	6	6	7

Leverage - Cluster 3	2020	2021	2022	2023
Average	106,570333	92,40525	73,6026	52,7068
Standard error	28,6390564	45,6850479	20,5661277	9,45675662
Median	123,777	82,656	65,86	56,079
Standard deviation	70,1510749	91,3700957	45,9872597	21,1459506
Sample variance	4921,17331	8348,4944	2114,82805	447,151229
Kurtosis	-0,918442	-2,9861988	-1,6633053	1,58508763
Asymmetry	-0,5252965	0,37441904	-0,0683239	-1,2929024
Interval	187,681	198,275	112,078	51,456
Minimum	4,122	3,017	14,496	18,598
Maximum	191,803	201,292	126,574	70,054
Sum	639,422	369,621	368,013	263,534
Count	6	4	5	5

Source: Our elaboration

The temporal analysis of the leverage of the three clusters in 2020-2023 reveals heterogeneous dynamics.

In Cluster 1, leverage grew from 169 in 2020 to over 234 in 2023, showing substantial variability. Data scarcity limits reliability, with significant kurtosis and skewness present. Distances between extremes remain high, indicating some extreme cases. The group generally shows high debt and increased leverage.

Leverage in Cluster 2 is stable but has decreased from 2020 to 2023. There is high variability among companies, with significant dispersion and extreme values affecting the median. The group has an unstable financial profile but maintains average debt.

Finally, Cluster 3 shows a clear trend of reduced leverage, decreasing from an average of 106 in 2020 to 52 in 2023. The companies are working to lower their leverage. Although there is

high variability, it has decreased over time. In 2023, there was a positive change in concentration, indicating a shift toward being more concentrated than average. Overall, the median and mean are close, suggesting a more symmetrical distribution than other clusters. The best-fitting equations that maximise R^2 are given in Table 10.

Table 10. Interpolation equation - Leverage

Cluster	Equation	R^2
Cluster 1	$y = 0,4241x^3 - 4,8632x^2 - 2,544x + 113,55$	$R^2 = 1$
Cluster 2	$y = -11,147x^3 + 110,04x^2 - 294,26x + 364,38$	$R^2 = 1$
Cluster 3	$y = 13,731x^3 - 106,43x^2 + 233,16x + 36,781$	$R^2 = 1$

Source: Our elaboration

Figure 11 illustrates and compares the ROE trend over the decade.

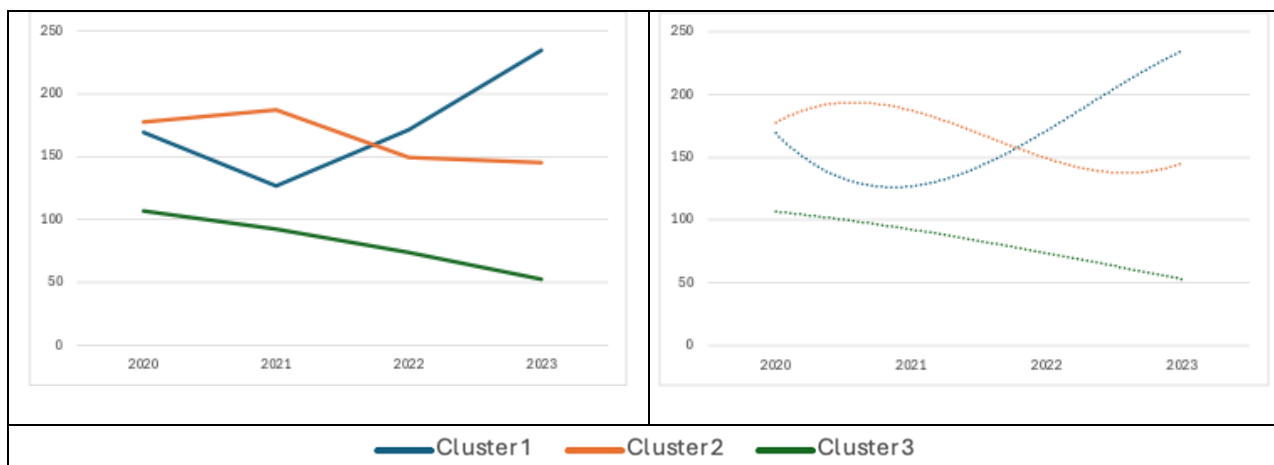


Figure 11. Leverage comparison (2020-2023): Broken and interpolated curve

Source: Our elaboration

The graph shows the development of three distinct variables between 2020 and 2023.

Cluster 1 showed a high trend in 2020. It dropped in 2021 before reversing the trend and increased significantly until 2023, when it reached its highest value.

Cluster 2 starts at a level close to Cluster 1 in 2020 and shows a slight increase in 2021. However, there is a decline beginning in 2022, which will continue in 2023, but the values remain relatively stable compared to previous years.

Cluster 3 shows a steady downward trend. It starts with an intermediate value in 2020 and slowly decreases yearly before reaching a minimum in 2023. The variance analysis is in Table 11.

Table 11. Anova Test - Leverage

SUMMARY

Groups	Count	Sum	Average	Variance
Cluster 1	4	701,57825	175,394563	1975,63257
Cluster 2	4	658,753024	164,688256	428,901596
Cluster 3	4	325,284983	81,3212458	546,245191

VARIANCE ANALYSIS

Origin of the variation	SQ	dof	MQ	F	Significance value	F crit
Between groups	21219,2964	2	10609,6482	10,786623	0,00407431	4,25649473
In groups	8852,33807	9	983,593118			
Total	30071,6344	11				

Source: Our elaboration

In this case, comparing the value of F and F critical shows that the hypothesis H_0 is rejected: F is greater than F critical, and therefore, there are statistically significant differences.

5.2.3 Tukey-Kramer test

The ANOVA tests of the three ratios communicate the absence of statistically significant differences between the three Nations. The post-ANOVA test, therefore, appears superfluous, even if it is helpful to confirm the conclusions outlined above (Table 12).

Table 12. Tukey-Kramer test

	ROE	Leva
Average Cluster 1	7,17	175,3945625
N. Group Cluster 1	4	4
Average Cluster 2	8,44	164,688256
N. Group Cluster 2	4	4
Average Cluster 3	7,25	81,32124583
N. Group Cluster 3	4	4
MQ	1,600451888	983,5931184
Q Statistic	3,948	3,948
Comparison Cluster 1 - Cluster 2		
Absolute difference	-1,27	10,71
Standard error	0,632544838	15,68114408
Critical value	2,497287021	61,90915682
Mean of groups	Not Different	Not Different
Comparison Cluster 2 - Cluster 3		
Absolute difference	-0,08	94,07
Standard error	0,632544838	15,68114408
Critical value	2,497287021	61,90915682
Mean of groups	Not Different	Different
Comparison Cluster 1 - Cluster 3		
Absolute difference	1,19	83,37
Standard error	0,632544838	15,68114408
Critical value	2,497287021	61,90915682
Mean of groups	Not Different	Different

Source: Our elaboration

The post-ANOVA shows a statistically significant difference in the leverage ratio between Cluster 2 and Cluster 3.

Conclusions

The results show that a Moldovan agricultural cooperative system is expanding but is still vulnerable. The empirical analysis of the economic and financial data of cooperatives active in fruit growing highlights a progressive growth in employment, assets and turnover, confirming the sector's strategic importance for the national economy.

The analysis of the three groups' profitability (ROE) and leverage provides information on Moldovan agricultural cooperatives from 2020 to 2023. Cluster 1 shows a growth in ROE, suggesting improving management. Cluster 2 presents instability, with alternating periods of growth and decline, linked to variable financial management. Finally, Cluster 3 highlights decreased profitability and leverage, indicating possible defensive strategies or lower competitiveness.

Overall, the substantial heterogeneity of the Moldovan cooperative system is confirmed, both in terms of management and finance. The comparison between the evolution of ROE and Leverage highlights how the best-performing companies in economic terms are sometimes also the most financially exposed. This finding reinforces the need for targeted public interventions to support virtuous paths, contain risk levels, and promote greater structural homogeneity among cooperatives.

In particular, the divergent dynamics among clusters suggest a different exposure to market risks and a non-uniform financial management. This result reinforces the thesis of Hejkrlik et al. [5] on the importance of transformational leadership for the stability of agricultural cooperatives in post-Soviet contexts. At the same time, the statistically significant differences in financial leverage among clusters highlight the need to consolidate access to credit and financial services, as highlighted by Korniyenko et al. [8], to avoid over-indebtedness and strengthen financial sustainability. The empirical results confirm the intuitions of Lamont [10], who proposed a model of integrated cooperation along the entire supply chain thirty years ago. The lack of effective coordination between production, processing and marketing still represents an obstacle to fully exploiting the cooperative potential. Furthermore, as demonstrated by the dynamics of ROE, profitability is strongly influenced by external factors that are not always controllable by individual companies. This confirms the observations of Sauer et al. [12] on the need to build stable supply chain relationships and strengthen horizontal cooperation.

On the other hand, the cultural and social element, sometimes overlooked, emerges strongly from the approach of Siniscalchi and Harper [13], according to which agricultural cooperation is also a vehicle of territorial identity and cultural resistance. Moldovan cooperatives could therefore strengthen their social and community function, promoting inclusive and sustainable farming models, both economically and symbolically.

The study's main limitation is its exclusively quantitative nature, which does not allow an in-depth understanding of the relational and cultural factors that influence the performance of cooperatives. Furthermore, although recent, the observation period (2020-2023) is influenced by extraordinary phenomena such as the pandemic and regional geopolitical instability. Future developments should adopt a mixed approach, integrating qualitative methods (interviews, participant observation) with balance sheet data analysis, to better understand the mechanisms of

resilience, trust and participation in cooperatives. It will also be crucial to investigate the impact of European policies and international networks on the strengthening of Moldovan cooperatives and consider a likely future integration of Moldova into the European Economic Area.

References

1. EUROPEAN COMMISSION. EU Agricultural Outlook 2023–2025. Available: https://agriculture.ec.europa.eu/data-and-analysis/market-analysis/agricultural-outlook/eu-agricultural-outlook-2023-2025_en (visited 14.05.2025).
2. EUROSTAT. Agriculture output slightly down by 1.5% in 2023; 13 November 2024 Available: <https://ec.europa.eu/eurostat/web/products-eurostat-news/w/ddn-20241113-2#:~:text=In%202023%2C%20agricultural%20output%20in> (visited 19.05.2025).
3. EUROSTAT. Performance of the agricultural sector. 12 May 2025 Available: https://ec.europa.eu/eurostat/statistics-explained/index.php?title=Performance_of_the_agricultural_sector&oldid=637887 (visited 20.05.2025).
4. EVERITT, B., LANDAU, S., LEESE, M., STAHL, D. Cluster analysis (5th ed.). New Jersey: Wiley, 2011.
5. HEJKRLIK, J., CHALOUPKOVA, P., SOKOLSKA, T. The role of transformational leadership and leaders' skills for new agricultural cooperatives in post-soviet countries. *Annals of Public and Cooperative Economics* [online]. 2023, vol. 94, no. 1, pp. 109–129. <https://doi.org/10.1111/apce.12353> (visited 18.05.2025).
6. JAIN, A. K. Data clustering: 50 years beyond K-means. *Pattern Recognition Letters* [online]. 2010. <https://doi.org/10.1016/j.patrec.2009.09.011> (visited 20.05.2025).
7. JOHNSON, R. A., WICHERN, D. W., et al. Applied multivariate statistical analysis. London: Pearson Prentice Hall, 2007.
8. KORNIYENKO, G., BAKAI, Y., PILKOV, K. M., NOVOSAD, I. Peculiarities of legal reform of land relations in the conditions of land market formation in the countries of Central and Eastern Europe and development of their financial and credit institutions. *Journal of Legal, Ethical and Regulatory Issues*. 2021, vol. 24, pp. 1–9.
9. KRAMER, C.Y. Extension of multiple range tests to group means with unequal numbers of replications. *Biometrics*. 1956, vol. 12, pp. 309–310. <https://doi.org/10.2307/3001469> (visited 20.05.2025).
10. LAMONT, J.T.J. Agrarian reform in the Republic of Moldova (CIS): The potential role of agrifood cooperatives. *Oxford Agrarian Studies*. 1993, vol. 21, no. 1, pp. 59–81. <https://doi.org/10.1080/13600819308424060> (visited 16.05.2025).
11. MACQUEEN, J. Some Methods for Classification and Analysis of Multivariate Observations. In: *Proceedings of the Fifth Berkeley Symposium on Mathematical Statistics and Probability*, vol. 1. University of California, 1967.
12. SAUER, J., GORTON, M., WHITE, J. Marketing, cooperatives and price heterogeneity: Evidence from the CIS dairy sector. *Agricultural Economics* [online]. 2012, vol. 43, no. 2, pp. 165–177. <https://doi.org/10.1111/j.1574-0862.2011.00574.x> (visited 15.05.2025).
13. SINISCALCHI, V., HARPER, K. Food values in Europe. London: Bloomsbury Publishing Plc., 2019.
14. TUKEY, J. Where should multiple comparisons go next? In: HOPPE, F. M. (Ed.), *Multiple comparisons, selection, and applications in biometry*. New York: Dekker, 1993, pp. 187–207.

NEW MARKETING OPPORTUNITIES BASED ON ARTIFICIAL INTELLIGENCE

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Abstract

Marketing is one of the most essential and fundamental sciences that helps to form a competitive advantage. Changes in the external and internal environment of a business organization require quick reactions, adaptation, and a certain flexibility. In the context of the extremely rapid digitalization we live in, this issue is becoming increasingly important.

We can safely say that at the moment, the "king" of the virtual space is Artificial Intelligence; therefore, businesses must know it, understand it, and know how to communicate with it. How to use it more successfully than their competitors. Undoubtedly, if a business organization does not have its own presence online, it will not be as

recognizable as its managers would like. And if the greatest known "business weapon" at the moment is marketing science, there is no way not to seek symbiosis, collaboration, or joint work between the most avant-garde technological achievements and it.

Keywords: marketing, digital marketing, artificial intelligence, new business opportunities

JEL: M31, O33, C55, L86

1. Introduction

In the context of accelerated digitalization, technological advancement is occurring at an unprecedented pace, necessitating the immediate adaptation of businesses to the ongoing transformations. Online visibility is no longer merely a tool for expanding market share and attracting new customers; rather, it has become a fundamental component of the strategic vision and managerial policies of any organization committed to sustainable growth and long-term development.

E-commerce, encompassing all online transactions related to the exchange of goods, services, or information¹, continues to demonstrate a consistent trend of increasing popularity. Changes in the macroenvironment exert a lasting influence on consumer profiles, with an increasing proportion of consumers exhibiting a preference for easily accessible digital information, primarily accessed via mobile smart devices.

These developments necessitate the systematic study of and timely adaptation to evolving consumer attitudes and emerging market trends, as essential prerequisites for maintaining competitiveness and achieving sustainable organizational development within the dynamic digital environment.

2. Trends and development

Bulgaria is no exception to global trends, although according to data published by Eurostat and cited by Nova.bg, the country has historically maintained one of the lowest shares of online commerce among all EU member states.² In 2015, the total annual turnover generated in the virtual marketplace amounted to approximately €342 million; by 2019, it had grown to €900 million, reaching €1.95 billion in 2023 and €2.4 billion in 2024.³ These figures clearly indicate that a shift in consumer demand has taken place.

It is important to acknowledge the impact of the COVID-19 pandemic, which served as a significant catalyst for the development of business activities in the digital environment. Nevertheless, the positive trend has proven insufficient to lift Bulgaria from the lower ranks of retail digitalization. In 2024, 57% of internet users in Bulgaria engaged in online shopping, positioning the country last among EU member states.⁴ According to Eurostat data, this figure is considerably

¹ Koycheva, D. What is e-commerce? публ. на <https://advanceacademy.bg/> - available on 24.04.2025

² <https://nova.bg/news/view/2025/02/20/488154-> available on 24.04.2025

³ Data from the Bulgarian E-Commerce Association, published in the e-commerce sector study "Passport of the E-Commerce Industry" for 2024 on <https://beabg.com/e-commerce-passport-2022/> - available on 24.04.2025

⁴ <https://forbesbulgaria.com/2025/02/21/balgariya-ostava-na-danoto-v-evropa-po-onlajn-pazaruvane/>, the article is based on data from EUROSTAT - available on 24.04.2025

below the EU average of 76% and significantly lags behind leading countries such as Ireland, the Netherlands, Denmark, and Sweden, where online shopping penetration exceeds 90%.

The low level of consumer activity in Bulgaria can be attributed to a combination of cultural and socio-economic factors, shaped by conservatism, distrust in online payment systems (exacerbated by frequent incidents of fraud and insufficiently flexible responses from banking institutions), low levels of digital literacy, and high logistics costs—where the price of delivery often constitutes a significant portion of the total purchase value.

Another major challenge is the low level of domestic business activity in the virtual marketplace and the intense competition from multinational platforms such as Amazon, AliExpress, eBay, and TEMU. Local retailers struggle to compete with the pricing, product variety, and marketing capabilities of these global giants.

Despite its delayed , the change is undeniable.



Figure 1. Volume of Online Commerce in Bulgaria (in billion euros)⁵

One of the most significant factors contributing to the notable increase in online activity is the emergence of so-called "new consumers from Generation Z"—the so-called "digital generation." This term, coined by William Strauss and Neil Howe in their book *Generations*, refers to individuals born between 1996 and 2010 who have never known a world without the internet and smartphones. They are characterized by a high degree of adaptability to the dynamic and rapid changes occurring in political, economic, and cultural spheres, which in turn fosters greater maturity for their age, pragmatism, and resilience.⁶

Although this specific demographic group currently possesses limited purchasing power, it represents the consumers of tomorrow, and businesses must adjust their strategies accordingly, rethinking traditional marketing approaches to meet the needs and expectations of this emerging cohort.

Supporting these assertions are the findings of a survey entitled "The Pulse of Online Consumption in Bulgaria," which reveal that currently more than 81% (approximately 4.7 million people) of the country's population uses the internet, over 3.3 million individuals access it daily, and about 70% have made at least one online purchase. In contrast, approximately 96% of Generation Z members use the internet as their primary source of information, with a similar proportion consistently engaging in online shopping.

⁵ The data are from a European report on e-commerce.

⁶ Generational Profiles. Profile of Generation Z. <https://activeageing.bia-bg.com/bg/analyses/generations/profileZ/>

An analysis of data collected from a marketing survey further highlights the main factors influencing online purchasing decisions, as well as the most popular product categories.⁷ :

Table 1. Factors and top categories in online sales⁸

Top 5 factors influencing purchase		Top 5 categories	
The price of product	75%	Clothing, shoes and accessories	72%
Thrust in the shop	51%	Cosmetics, body and products	35%
Promotions	45%	Books, textbooks and games	27%
The price of delivery	37%	Household goods	25%
Possibility of return	33%	Consumer electronics	24%

The data clearly indicate that, in order to evolve at the pace of modern times, businesses must urgently reorganize and embrace digitalization not as an opportunity, but as an absolute necessity. Naturally, digital marketing, or marketing influenced by its interaction with artificial intelligence, is one of the most cutting-edge possibilities. What does it entail?

Digital marketing is the use of websites, apps, mobile devices, social media, search engines, and other digital means to promote and sell products and services. Digital marketing involves many of the same principles as traditional marketing and is often considered an additional way for companies to approach consumers and understand their behavior. Companies frequently combine traditional and digital marketing techniques in their strategies.⁹ In the digital realm, artificial intelligence provides powerful solutions to overcome the challenges faced by traditional marketing. But what exactly is artificial intelligence?

There are many definitions of artificial intelligence (AI), some of which are conflicting and, in many cases, even confusing. The author has made an attempt to select some of these definitions that are relevant to marketing science. One such definition is provided by Russell and Norvig, who defined the AI like “machines (computers) that simulate cognitive and affective functions of human mind.”¹⁰ . Another one is given by Copeland¹¹, who explains it the ability of a digital computer or computer-controlled robot to perform tasks commonly associated with intelligent beings. We can summarize that this is the capability of computational systems to perform tasks typically associated with human intelligence, such as learning, reasoning, problem-solving, perception and decision-making. In conclusion we may say that “AI” in the context of marketing is the ability of machines and algorithms to process large volumes of data, recognize patterns, and make predictive decisions. This technology is used to automate tasks such as customer segmentation, content recommendation, and dynamic pricing, enhancing the efficiency and effectiveness of marketing efforts.”

⁷ The data are from a report published following a market research study commissioned by Enterprise magazine, conducted by the research agency "Market Links" among 1,030 participants, with data published on www.superhosting.bg and adapted from Eurostat.

⁸ The basis is taken from all online shoppers in the last 6 months, according to the aforementioned study.

⁹ <https://www.investopedia.com/terms/d/digital-marketing.asp> - available on 25.04.2025

¹⁰ Russell, Stuart J., and Peter Norvig. Artificial intelligence: a modern approach. pearson, 2016.

¹¹ <https://www.britannica.com/technology/artificial-intelligence>

3. AI in marketing

AI in marketing refers to the use of advanced algorithms, machine learning, and natural language processing to understand, analyze, and predict consumer behavior. By analyzing vast amounts of customer data, AI tools enable companies to develop personalized marketing campaigns, improve customer service, and optimize the customer journey.

Where is artificial intelligence used in digital marketing?

Artificial intelligence (AI) plays a crucial role in enhancing the efficiency and effectiveness of digital marketing strategies. Its applications are wide-ranging and transformative, helping businesses to personalize their efforts, automate processes, and make data-driven decisions. Below are some of the key areas where AI is used in digital marketing:

Customer Personalization: AI helps businesses deliver personalized experiences to consumers by analyzing their behaviors, preferences, and past interactions. This allows companies to create targeted advertising campaigns and tailor product recommendations to individual customers. For instance, AI algorithms in e-commerce platforms suggest products based on a user's browsing and purchase history.

Chatbots and Virtual Assistants: AI-powered chatbots and virtual assistants are used for real-time customer interaction on websites and social media. These systems can answer queries, assist with product selection, and even complete transactions, enhancing customer satisfaction while reducing the need for human intervention.

Predictive Analytics: AI is used to predict consumer behavior by analyzing large datasets and identifying patterns. This enables marketers to forecast future trends, customer preferences, and purchasing behaviors. Predictive analytics are particularly useful in demand forecasting and optimizing inventory management.

Content Creation and Optimization: AI tools assist in the creation of content, including automated writing for blogs, emails, and social media posts. Additionally, AI can optimize content for search engines (SEO) by identifying high-performing keywords and suggesting improvements to enhance online visibility.

Programmatic Advertising: AI is heavily involved in programmatic advertising, which automates the buying and placement of digital ads in real-time. By using AI algorithms, businesses can target ads more effectively, optimizing placement based on consumer behavior, location, time of day, and other variables.

Sentiment Analysis: AI algorithms analyze consumer sentiment by processing data from social media, reviews, and customer feedback. This helps businesses understand how their brand, products, or services are perceived by customers, enabling them to adjust their marketing strategies accordingly.

Dynamic Pricing: AI systems enable dynamic pricing strategies, where prices are automatically adjusted in real-time based on demand, competitor pricing, and consumer behavior. This is particularly useful in industries like travel, retail, and hospitality, where pricing can fluctuate based on various factors.

Email Marketing Automation: AI is used to automate email campaigns, segment customer lists, and personalize content to increase open rates and engagement. AI can also optimize the timing of emails, sending messages at times when they are most likely to be read by recipients.

Voice Search Optimization: With the rise of voice-activated devices, AI plays a role in optimizing content for voice search. Marketers use AI to adapt SEO strategies, ensuring that content is discoverable through voice queries, which often differ from text-based searches.

Ad Targeting and Retargeting: AI helps businesses identify and target the right audience for their ads. Through machine learning algorithms, marketers can improve targeting by analyzing vast amounts of data, such as browsing behavior, demographics, and online activity. AI also supports retargeting by displaying ads to individuals who have previously interacted with a brand, increasing the likelihood of conversion.

4. Conclusion

The rapid advancement of digital technologies, driven by artificial intelligence, is reshaping the landscape of business and marketing. To stay competitive in this dynamic environment, businesses must embrace digitalization and integrate AI into their marketing strategies. AI offers powerful tools to personalize customer experiences, automate processes, and optimize decision-making, ultimately improving efficiency and effectiveness. As consumer behavior continues to evolve, particularly with the rise of Generation Z, companies must adapt quickly, leveraging AI to enhance their marketing efforts and maintain a strong online presence. Embracing AI is no longer an option but a necessity for businesses seeking sustainable growth and long-term success in the digital age.

* The presented report reflects the author's vision of the posed problems. Parts of the study is a product of the collaboration between the author and The Artificial Intelligence.

References

1. Kotler, P., Kartajaya, H., & Setiawan, I. (2017). *Marketing 4.0: Moving from Traditional to Digital*. Wiley.
2. McKinsey & Company (2021). *The Future of Digital Marketing: Key Trends and Insights*. McKinsey Insights.
3. Hollensen, S. (2020). Digital Marketing: A Global Perspective. *Journal of Digital & Social Media Marketing*, 8(3), 124-139
4. Russell, Stuart J., and Peter Norvig. *Artificial intelligence: a modern approach*. pearson, 2016.
5. <https://advanceacademy.bg>
6. www.britannica.com/technology/artificial-intelligence
7. www.investopedia.com/terms/d/digital-marketing.asp
8. <https://forbesbulgaria.com>
9. Generational Profiles. Profile of Generation Z. <https://activeageing.bia-bg.com/bg/analyses/generations/profileZ/>

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CONSIDERATIONS REGARDING WINE TOURISM AND TOURISTS

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Abstract

The area of increased interest of the research in question refers to the identification of the main concepts related to wine tourism. The concept of wine tourism and tourists has been formed and modified over time. The presented study is based on legislative and normative acts, as well as the views of foreign and local researchers.

The purpose of the study of this article is to identify the main approaches related to wine tourism and wine tourists.

The present study was carried out based on the following scientific research methods: analysis, synthesis, comparison, grouping, systematization, etc.

The main results recorded and the author's contribution consist in defining, analyzing and formulating his own notions regarding wine tourism.

Keywords: definition, wine tourism, wine tourists

JEL: Z39

Introduction

The concepts of wine tourism have been formed along with its evolution, and the defining aspects have varied depending on the professional opinions of tourism specialists.

It is worth mentioning that the definition of wine tourism has been analyzed and formulated in national and international legislative and normative acts, dictionaries, as well as in the works of various researchers. From the very beginning, it is welcome to reveal the fact that wine tourism is explained with different terms in the researched bibliographic sources. Thus, this type of tourism can be called: oenology tourism, wine tourism, grape tourism. The term oeno comes from the Greek language and translates as – wine, and the science that deals with the study and processes of creating, caring for and preserving wine, as well as other derivatives made from grapes, is called oenology. Wine tourism means visiting wineries and studying the technological processes of winemaking. Through grape tourism, the tourist has the opportunity to see all the stages of winemaking, starting with grape picking and ending with studying the technological processes, bottling and storing the wine.

Results obtained and discussions

Analyzing the definitions regarding the definition of wine tourism, we find that the approaches to its content can be conventionally classified into two large groups of approaches (Figure 1):

- based on the product and purpose of the tourist offer;
- based on the role of wine tourism in promoting the tourist attractions of the Republic of Moldova.

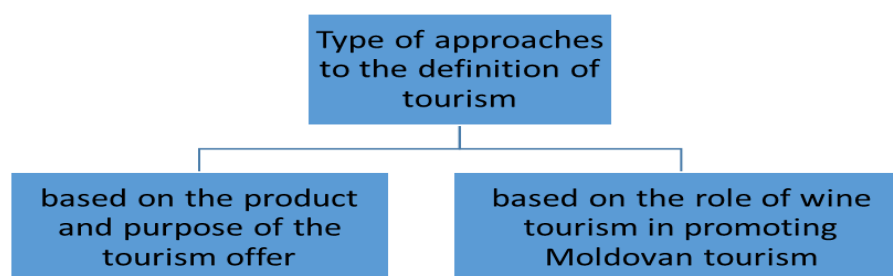


Figure 1. Types of approaches to the definition of wine tourism

Source: developed by the author

The first group of approaches, based on the product offered and the purpose of the tourist offer, in our opinion, is the most widespread conception regarding the definition of wine tourism. This vision, in fact, reveals the totality of goods and services offered within this type of tourism. The approach based on the product offered by wine enterprises has been identified in national legislative acts, encyclopedias, on web pages and in the specialized literature of researchers: Hall C., Sharples L., Cambourne B., Macionis N., Miron Viorel, Guțui Veaceslav, Bogan Elena, Simon, Soare I, Tamara, Platon, Nicolae, Sparks, B. A., Roberts, L., Deery, M., Davies, J., & Brown, L. [1, 2, 4, 5, 8, 9, 10, 11, 12, 13, 14] etc.

In table 1 we will reveal the identified definitions of wine tourism according to the first approach.

Table 1. First group of approaches: defining wine tourism according to the product offered and the purpose of the tourist offer

Source of definition	Content of the definition of wine tourism
Law on the organization and development of tourism activity in the Republic of Moldova	Form of tourism practiced by tourists to visit wine regions, vineyards and wineries in order to combine the pleasure of tasting wine products with knowledge of the local lifestyle, rural environment and cultural activities.
National Vine and Wine Office	It involves visiting wineries and restoring the cultural connection between the consumer and the final product, through contact with grapes, wine and the spaces where they are produced. At the same time, this type of tourism allows the purchase of wine products.
The Moldavian scholar Platon Nicolae	1) A motivational form of tourism practiced by tourists to visit wineries and wine regions, in order to combine the pleasure of tasting wine products with the opportunity to get to know the country, the lifestyle of the natives, culinary and gastronomic traditions; 2) A form of tourism that allows tourists to learn about the entire technological process of winemaking, and in villages where the winemaking tradition is preserved, tourists can get involved in the winemaking process.
Wikipedia encyclopedia	Form of tourism practiced by tourists to visit wine regions, wine farms and wine enterprises in order to combine the pleasure of tasting wine products with knowledge of the local lifestyle, rural

	environment and cultural activities.
	A motivation to place the country's wine tourism product at its fair value in the international tourist circuit.
	It refers to tourism whose purpose is or includes the tasting, consumption or purchase of wine, often at or near the source. Where other types of tourism are often passive in nature, wine tourism may consist of visits to wineries, wine tasting, vineyard walks or even actively participating in the harvest.
Australian Winemakers Association	It involves visits to wineries and wine regions to experience the unique qualities of the lifestyle associated with the enjoyment of wine and cultural activities, gastronomy and landscapes.
Australian Sustainable Tourism Research Centre	It consists of wine tasting and destination experience. At the same time, it is mentioned that tourists are motivated to visit these businesses to explore the surroundings of the destination, to interact socially with the local environment and for personal development.
Moldovan researchers Miron Viorel, Guțui Veaceslav and others	Tourism, which constantly captures the interest of visitors to different agricultural areas of the world that produce wines, has the necessary facilities for wine and grape tastings or for treatments.
Romanian researchers Bogan Elena, Simon Tamara	Tourism that relies on the presence of wine products, associated with wine production and storage units, such as wineries. It offers tasting spaces and in some cases even accommodation, which are created in special spaces, such as old and renovated boyar mansions.
Romanian researcher Soare Ionica	Wine tourism or grape tourism emerged on the foundation of the connection between wine culture, vines and man, with long-standing traditions, continuously giving generations the pleasure of observing and noting its significance.
Dutch researchers Michael Hall and Niki Macionis	Visits to vineyards, wineries, wine festivals and wine shows for wine tasting and exploring the attributes of a wine-producing region are the main motivating factors for visitors.
Austrian scientist Steven Van Ausdle	A tourism product suitable for rural areas. Wine production can help rural regions restructure their economies by creating jobs both in wine production and in hospitality associated with traditional meals. The availability of wine routes plays a central role in attracting visitors to rural areas in many underdeveloped regions.

Source: developed by the author based on [1, 2, 4, 5, 6, 8, 9, 10, 11, 12, 13, 14]

The second approach to the definition of wine tourism emphasizes its role in promoting the tourist attractions of the Republic of Moldova. This approach assumes that visiting a wine tourism object can be combined with various interesting activities and exploring the surroundings.

In our view, tourist demand in recent times requires a more varied offer of tourist objects visited in a single tour. Combining visiting wine enterprises with the inclusion of various cultural and artistic objects in the tourist route conditions an even greater attraction for tourists.

In table 2 we will reveal the identified definitions of wine tourism depending on the role of wine tourism in promoting the tourist attractions of the Republic of Moldova.

Table 2. The second group of approaches: defining wine tourism in terms of its role as a tourism promoter

Source of definition	Content of the definition of wine tourism
National Tourism Program Wine Road in Moldova	The wine tourism industry contributes to attracting as many consumers as possible to wine tourism production, additionally promoting all existing tourist facilities in Moldova.
Platon Nicolae	Tourism that contributes to attracting the largest possible number of consumers of wine tourism production, additionally promoting all existing tourist attractions in Moldova.
	The business card of the Republic of Moldova, because the tourist packages proposed for sale to foreign tourists necessarily include a winery or winery.
Brown G., Getz D	Tourism that is part of niche tourism based on the desire to visit wine-producing regions or in which tourists are determined to visit wine-producing regions, especially wineries and wineries, while traveling for other reasons. Niche tourism refers to destinations that come to satisfy the varied needs of the tourist.
Tomescu Veronica	Tourism that is found in agritourism and gastronomic tourism, and can also be included in the category of eco and sustainable tourism.

Source: developed by the author based on sources [2, 3, 13, 14]

The aforementioned approaches to the definition of wine tourism and its role for the Republic of Moldova allowed us to formulate the following definition: wine tourism represents rural and sustainable economic activities, in order to be able to study the exceptional architecture of beautifully decorated wineries and halls, wine cellars, underground cities, cellars and cultural events related to the promotion of wine products (festivals, national wine days, etc.), which involve tasting wine products and traditional gastronomic dishes, personal development regarding the culture of wine production and consumption, the possibility of purchasing wine products, visiting tourist attractions in the locality, participating in walks and hikes in the area, etc.

The conceptual research of wine tourism prompted us to discover other definitions, such as: wineries, cellars, wineries, wine cellars, underground cities. The aforementioned definitions can be viewed in Figure 2.

The conceptual research of wine tourism has prompted us to discover other definitions, such as: wine cellars, wineries, wine collection, cellars and underground cities of wines. The aforementioned definitions can be viewed in Figure 2.

The definition of the winery indicates that it is located in a rustic setting. Hence the question: what is a rustic setting? Setting is an environment, and rustic is a place:

- country, as in the country, imitating certain aspects of country life;
- rural;
- with a rough, unfinished surface.

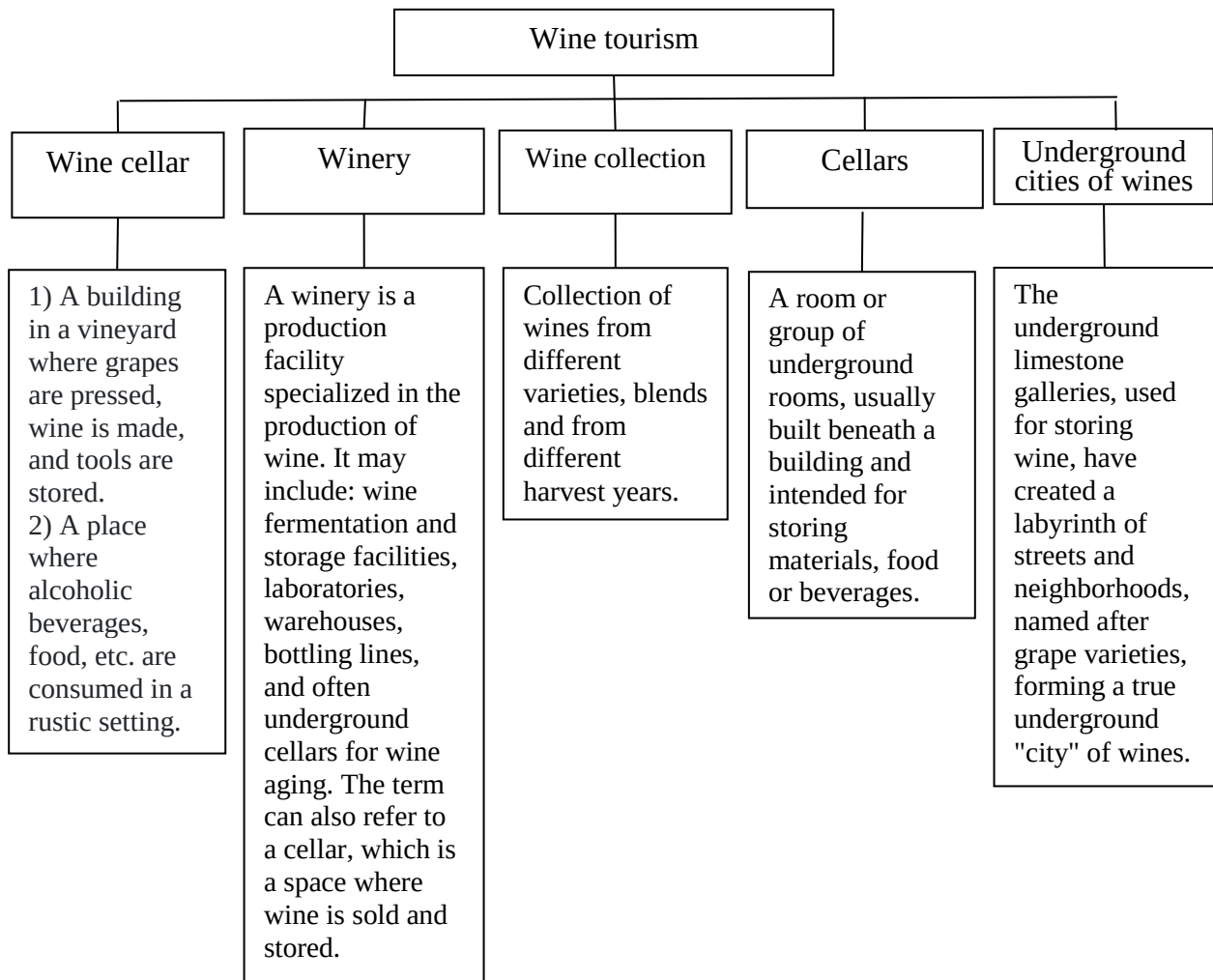


Figure 2. Definitions of some terms related to wine tourism

Source: [6, 7, 15]

Wine tourism is practiced by different visitors. Our research identified 4 types of wine tourists: adventurers, explorers, experts, and classics (Figure 3).

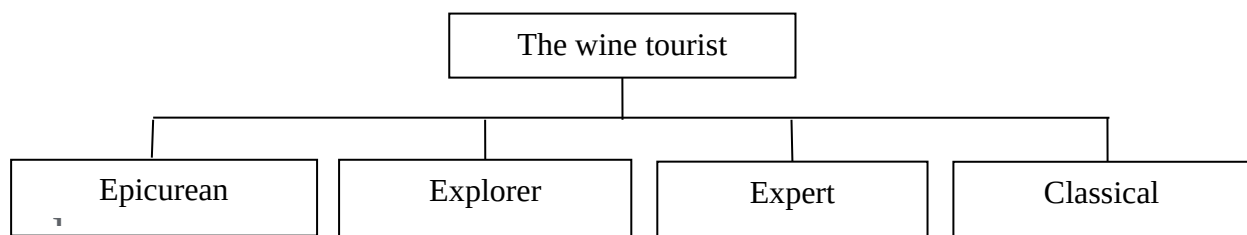


Figure 3. Type of wine tourists

Source: [16, p. 67]

Each type has a specific behavior related to the wine offer and communication with the producer, it remains the task of the interested institutions to review their attitude and tourist offer, and adapt it to the type or types desired by the consumer.

Table 3. We will examine the characteristics of the 4 types of wine tourists

Type of tourists/ consumer behavior	Perception about wine	Profile	Type of communication with the manufacturer	The type of communication, intended to attract the tourist
Epicureans	– Pleasure of the senses; – Well-being.	– High proportion of foreign tourists; – High purchasing power; – Large wine consumers; – Target group with high potential.	Friendly	– the winemaking area; – the strength of the wine; – the characteristics of the region.
<i>Explorers</i>	– Alchemy; – Mystery (Saxon stories, histories).	– Visits the gym frequently; – Drinks wine regularly	Cordially	– viticulture; – wine strength; – gastronomy.
<i>Experts</i>	– Science (production processes); – Technical skills; – Expertise.	– High proportion of visitors; – Accustomed to stays in wine regions, – Purchasing power in the region	Pedagogy	– the subject can enrich knowledge about the art of wine consumption.
<i>Classics</i>	– patrimony; – Values - for sure.	– Large proportion of tourists can consume wine in small quantities; – Little accustomed to high-profile stays; – Purchasing power in the country.	Social	The region's heritage: – natural; – cultural; – arhitectural.

Source: Prepared by the author based on [16]

Wine tourists are focused on different types of activities besides visiting wineries. Whether it is visiting tourist attractions, going for a bike ride, boat ride, hot air balloon ride, participating in festivals near vineyards or wineries, etc.

So, wine tourists, in our opinion, are people who travel from their place of residence to spend their free time in order to visit picturesque places and attractive leisure spaces, to recreate and gain new experiences in the art of producing, preserving, enjoying traditional local dishes and tasting wine in the atmosphere and special conditions created by winemakers.

Conclusion

So, wine tourism and wine tourists have their own specific characteristics.

We believe that the definitions, discussions, classifications and views of the author addressed in this study will be a theoretical support for the field of professional training in the field of wine tourism.

REFERENCES

1. Despre ONVV. Disponibil: <https://wineofmoldova.com/ro/despre-onvv/>.
2. Platon, Nicolae. Organizarea și gestionarea afacerilor în domeniul turismului rural, Agenția Turismului a Republicii Moldova, ASEM. – Chișinău: S.n., 2015 (Tipografia Elan Poligraf. ISBN 978-9975-66-433-2. - 216 p.
3. Hotărârii Guvernului Republicii Moldova Nr. 554 din 24.05.2004. Programul Național Drumul Vinului în Moldova. Disponibil: <http://lex.justice.md/index.php?action=view&view=doc&lang=1&id=302972>.
4. Legea nr. 352 din 24.11.2006 cu privire la organizarea și desfășurarea activității turistice în Republica Moldova. În: Monitorul Oficial al Republicii Moldova nr. 14-17 din 02.02.2007
5. Viorica Gutan, Gheorghe Adrian Zugravu. Conceptual approaches concerning wine tourism. In: Journal of Research on Trade, Management and Economic Development, 2023, vol. 10, nr. 1(19), pp. 22-37. ISSN 2345-1424. DOI: 10.59642/JRTMED.1.2023.02. Available: <http://jrtmed.uccm.md/index.php/en/arhive?layout=edit&id=85>.
6. Dicționarul Wikipedia. Disponibil: <ro.wikipedia.org/wiki/>.
7. Dicționarul explicativ Dex on-line.
8. Hall M., Shaples L., Cambourne B., Macionis N. (2004), Wine Tourism Around the World Development, Management and Markets, Editura Elsevier, Oxford.
9. Miron Viorel, Guțui Veaceslav și alții. Turismul în ariile naturale din Republica Moldova: ghidul investitorului local. – Chișinău: Continental Grup, 2005, ISBN 9975-9901-1-, - 134 p.
10. Bogan Elena, Simon Tamara. Turimul rural. Editura Universitară, București, 2019.
11. Soare Ionica. Turism-tipologii și destinații, Editura Transversal, Târgoviște.
12. Sparks, B. A., Roberts, L., Deery, M., Davies, J., & Brown, L. (2005). Good living tourism: Lifestyle aspects of food and wine tourism. Technical Report, CRC for Sustainable Tourism, Brisbane, Australia.
13. Brown, G., Getz, D., Critical success factors for wine tourism regions: a demand analysis. Tourism management. 2006., p. 146-158.
14. Tomescu Veronica. Turismului vitivinicol: tendințe actuale pe plan mondial și local. Disponibil: <https://www.slideshare.net/VeronicaTomescu1/turismului-vitivinicol-tendine-actuale-pe-plan-mondial-i-local>.
15. Ghigul enoturistic al Republicii Moldova. Disponibil: <https://wineofmoldova.com/ro/ghid-oenuturistic-2022/>.
16. Jamie V. Wine Tourism Development: A Wine Route Or Not? : a Wine Tourism Development. Chile: Lambert Academic Publishing, 2011. 172 p.

THEORIES AND MODELS OF HIERARCHICAL FINANCING OF A COMMERCIAL COMPANY

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Abstract

The hierarchical financing theories agree with establishing a ranking among financing methods, such as prioritizing self-financing, placing debt in a secondary position, and choosing capital increase as a last resort. These theories and models are not focused on the issue of optimal financial structure. We may ask, on the one hand, whether a company, by ranking financing methods for an investment, makes an optimal financial decision, meaning it chooses the best combination of financing means. On the other hand, we can also question whether applying the hierarchy principle would not lead to defining the optimal financial structure differently while still aiming for the same objective (the best debt ratio). We conclude that these theories differ from models based on the "compromise principle".

Keywords: theory, financing, models, structure, optimum

JEL: G10, G14, G20, G31

Introducere

În cazul economiilor de piață este cunoscută teoria finanțării ierarhice (*pecking order theory*)¹. Această teorie vine ca un răspuns firesc la *noua abordare privind conceptul de organizație a unei societăți în economia de piață*. Pentru a preciza contextul în care au apărut teoriile de finanțare ierarhică, precum și problemele pe care acestea le ridică, este necesar să amintim în mod firesc succint principalele **concepte privind finanțarea ierarhică**.

Teoriile de finanțare ierarhică convin în stabilirea unui clasament între modalitățile de finanțare de exemplu, privilegierea autofinanțării, punerea pe un rang secund a îndatorării și alegerea în ultimă instanță a creșterii de capital.

Contrar modelelor precedente, aceste teorii nu sunt centrate pe problema structurii financiare optimale. Putem să ne întrebăm pe de o parte dacă o societate comercială stabilind un clasament între modalitățile de finanțare pentru realizarea unei investiții ia o decizie financiară optimă, adică alege cea mai bună combinație de mijloace de finanțare și pe de altă parte ne putem întreba dacă aplicarea principiului ierarhiei nu ar conduce la definirea structurii financiare optimale în mod diferit, dar vizând același obiectiv (cea mai bună rată de îndatorare).

În consecință teoriile de compromis și cele de finanțare ierarhică ar aborda în mod diferit politica de finanțare a unei societăți comerciale. În plus considerăm că problematica între teoriile compromisului și teoriile finanțării ierarhice se bazează pe alte fundamente:

În primul rând articolele teoretice preconizând o ierarhie între modalitățile de finanțare sunt de factură recentă și par secundare în raport cu principiul compromisului. Anterior, examinarea deciziilor financiare nu lasă să se presupună eventualitatea unui clasament între diversele modalități de finanțare. Cu toate acestea, principiul ierarhiei îi lipsește însă o justificare teoretică.

În al doilea rând cele două categorii de modele conduc în general la soluții contradictorii. În plus până acum nu a fost realizat nici un test cu adevărat decisiv pentru a permite aprecierea pertinentei teoriilor de finanțare.

Aceste câteva remarci ridică însă mai multe întrebări:

- *Teoriile de finanțare ierarhică aduc o explicație cu adevărat nouă pentru structura de finanțare a organizațiilor, societăților comerciale?*
- *Divergențele pe care le constatăm între cele două categorii de modele sunt oare minore sau indică o ruptură în raționamentul financiar?*
- *Sunt oare pertinente explicațiile aduse de către teoriile de finanțare ierarhică?*

Pentru a răspunde la aceste întrebări detaliem în prealabil interpretările posibile pentru principiul clasamentului între modalitățile de finanțare și arătăm cum această sinteză permite eliminarea unora din situațiile următoare:

1. Principiul ierarhiei este o *formă a compromisului* în măsura în care într-o situație particulară, o modalitate de finanțare nu ar prezenta decât profituri sau costuri. De exemplu presupunând că într-un context dat, îndatorarea nu prezintă decât profituri, iar creșterea de capital prezintă doar costuri, aplicarea principiului compensării între

¹ Introdusă de Myers (1984) urmărește doar stabilirea unui clasament al modalităților de finanțare, explicând astfel de ce firmele profitabile apelează într-o măsură mai scăzută la împrumuturi. Teoria susține astfel că managerii companiilor vor prefera finanțarea internă în detrimentul celei externe, și finanțarea prin împrumuturi în detrimentul emisiunilor de acțiuni.

profiturile și costurile modalităților de finanțare ar conduce la privilegierea împrumutului și la stabilirea unui clasament între aceste două moduri de finanțare externă.

2. Aplicarea principiului ierarhiei este un alt mijloc de decizie supra modalității de finanțare decât compromisul și permite în aceeași măsură atingerea unui optim pentru situații particulare.
3. Principiul ierarhiei este o decizie asupra modalității de finanțare, diferită de compromis.

Tabelul 1. Sinteza teoriei ierarhizării surselor de finanțare

Teoria	Consecințe în practică	Avantaje	Dezavantaje
Teoria ierarhizării surselor de finanțare (1984)	- explică de ce societățile mari și cu performanțe ridicate tind să aibă un grad de îndatorare mai scăzut - contrazice teoriile echilibrului și teoria sincronizării cu piața - ignoră complet avantajele fiscale și influența acestora asupra structurii capitalului	- explică de ce structura capitalului este insensibilă la modificările legislative în domeniul fiscal și a cotelor de impozitare - explică legătura dintre asimetria de informații din piața de capital și deciziile managementului - explică de ce managementul preferă sursele interne de finanțare: investitorii ar achiziționa acțiunile emise de societate doar la preț redus din cauza asimetriei de informații, devenind neprofitabile sursele externe	- ignoră conflictele dintre management și acționariat - ignoră avantajele fiscale, oportunitățile de operațiuni pe piața de capital cu propriile acțiuni

Sursa: Date prelucrate de autor

Rezumând aplicarea principiului ierarhiei conduce la fel ca în cazul modelelor lui Modigliani și Miller, la concluzia că nu există un grad de îndatorare optim (Modigliani, Miller, 1958).

Scurtă prezentare a principalelor modele a teoriei finanțării ierarhice

O primă prezentare a acestor teorii constă în separarea lor în funcție de obiectivele exprimate de manager.

1. Managerul decide sporirea bogăției câtorva membri ai societății comerciale în mod prioritar (de exemplu acționarii existenți), obiectiv pe care l-am întâlnit de altfel în modelul lui Myers și Majluf respectiv a lui Narayana. Managerul maximizează bogăția aflată sub controlul său și în mod indirect îmbogățește anumiți parteneri ai societății (modelul lui Myers 1990).
2. Managerul decide scăderea costurilor contractelor în vederea maximizării valorii societății comerciale: modelele lui Shapiro (1987), Fama (1990), Williamson (1988).

În general primele modele contrar celorlalte integrează câteva restricții în realizarea obiectivului de urmat.

2.1. Modele după care managerii acționează pentru interesul anumitor membri ai societății comerciale

În modelul lui Myers și Majluf ipotezele comportamentale sunt (Myers, Majluf 1984):

- *Pentru manageri: a acționa în interesul acționarilor existenți*
- *Pentru acționarii existenți: ei sunt inactivi și nu modifică prin portofoliul lor funcționarea deciziilor luate de manageri*
- *Pentru noii acționari (presupunând că au anticipații raționale): ei nu sunt informați în ce privește speranța matematică a valorii titlurilor vechilor acționari. În comparație cu noii acționari, managerii cunosc acest lucru.*

Managerul, având obiectiv de a spori bogăția acționarilor existenți poate fi constrâns să renunțe la a realiza o investiție rentabilă dacă situația de moment este favorabilă ceea ce ar atrage după sine o scădere a valorii societății comerciale.

Datorită informației de care dispun noii investitori (având anticipații raționale) calculează valoarea medie a titlurilor vechilor acționari. Ei deduc faptul că emisiunea pentru sporirea capitalului este un semn a stării defavorabile a unei societăți comerciale. În consecință aceasta va atrage o scădere a valorii societății și în definitiv o reducere a valorii titlurilor acționarilor existenți. În ciuda acestei scăderi vechii acționari pot să se îmbogățească întrucât valoarea titlurilor lor va fi superioară celei ce rezultă dintr-o situație în care investiția nu a fost întreprinsă.

Interpretarea lui Harris și Raviv presupune un echilibru revelator obținut. Un echilibru nerevelator (toate societățile investesc) nu este posibil dacă rentabilitatea proiectului este foarte ridicată (Harris, Raviv, 1990).

După Myers sau Majluf, realizarea unei creșteri de capital este un semnal al unei stări defavorabile sau a unei societăți comerciale neperformante. Narayanan (1988) este de acord cu aceeași ierarhie între finanțări ca și modelul precedent pentru o societate având proiecte rentabile. Narayanan demonstrează că atât piața creditului cât și a capitalului nu pot să evalueze societățile, la justa lor valoare. Deci o societate comercială nerentabilă poate fi finanțată datorită unor disfuncționalități de pe aceste două piețe. El demonstrează că o societate rentabilă pentru a sublinia adevărata sa valoare are interesul să finanțeze investiția prin îndatorare, decât prin creștere de capital. Alegerea între finanțările unei societăți performante este explicată și prin mecanismul selecției adverse. Nu întotdeauna pe piața capitalului și a îndatorării se cunoaște valoarea societăților la care se canalizează fonduri, evaluându-le la o valoare mijlocie. În consecință, având proiecte mai bune exclud posibilitatea de a finanța societățile cotate la o valoare mijlocie, pentru că aceasta valoare este mult mai puțin interesantă pentru piața capitalului.

Ipotezele comportamentale a modelului lui Narayana sunt (Narayanan, 1988):

- *Pentru manager - creșterea bogăției acționarilor existenți. Managerul și vechii acționari sunt mai bine informați de rentabilitatea oportunităților de investiții decât noii acționari*
- *Pentru noii investitori - aceștia nu cunosc calitatea oportunităților investițiilor și le apreciază la o valoare mijlocie ținând cont de modul de finanțare ales pentru a le întreprinde. Creșterea de capital este un semn al unei stări defavorabile societății..*

În concluzie acest comportament conduce la diminuarea valorii mijlocii a societăților, finanțate de pe piața capitalului.

2.2. Obiectivul managerului este de a minimiza costurile anumitor contracte

Dacă obiectivul managerului este de a minimiza costurile contractelor finanțărilor investițiilor specifice, ipotezele comportamentale sunt:

- Pentru manageri: de a maximiza valoarea societății
- Pentru ceilalți parteneri ai societății (prestatori, dar mai ales clienți): de a minimiza riscul de a cumpăra sau de a finanța investiții specifice. Aceștia din urmă au anticipații raționale.

Pentru a-și realiza obiectivul managerul alege finanțarea acestor proiecte prin creștere de capital (decât prin îndatorare), pentru a minimiza costurile contractelor particulare a acestor investiții (contracte implicite sau explicite). În consecință aceasta va permite creșterea valorii societății.

Constatăm ca aceeași ierarhie între finanțări este deci preconizată: creștere de capital și apoi îndatorare.

- a) Dacă obiectivul managerului este minimizarea costurilor contractelor implicite (calitatea bunului vândut).

Stiglitz rezumă caracteristicile comune ale contractelor implicite în următoarea manieră (Stiglitz, 1974):

- În primul rând ele nu pot fi redactate la un cost rezonabil ceea ce implică faptul că societatea dacă nu – și respectă în totalitate angajamentele asumate nu este pusă în fața unor costuri suplimentare legate de procedura de faliment.
- În al doilea rând ele sunt inseparabile de un contract explicit (contractul de muncă, de vânzare, de fabricație).
- În sfârșit ele au totuși o valoare pentru că nerespectarea lor antrenează o diminuare a valorii societății.

O societate comercială respectă o ierarhie între finanțări având raționamentul următor:

Dorind vânzarea la un preț ridicat a unui contract implicit (prin care se angajează să-l onoreze ulterior), ea trebuie să aducă garanții contractanților. De aceea ea va trebui să fie finanțată cu prioritate prin creștere de capital în momentul în care contractul implicit va fi executat.

- b) Minimizarea costurilor contractelor explicite

Teoriile următoare sunt centrate pe contractele explicite a căror caracteristici pot fi identificate la un anumit cost (contrar unui contract implicit). Totuși aceste contracte explicite pot fi și incomplete. Knight introduce noțiunea de incertitudine ce se diferențiază de risc prin faptul că nu pot fi reduse la probabilități obiective și nu pot fi integrate în calculul de probabilități. Diferența arătată de Knight (1993) între risc și incertitudine permite distingerea contractelor complete de cele incomplete. Riscul se caracterizează prin faptul că dă posibilitatea în mod relativ de a specifica etapele unei stări viitoare și de a determina distribuțiile de probabilități. În acest cadru contractele pot fi complete. Din contra imposibilitatea de a exprima etapele unei stări viitoare, care se va putea produce după semnarea contractului este trăsătura distinctă a conceptului de incertitudine. În acest caz contractele sunt incomplete.

În continuare sunt prezentate o serie de studii și lucrări în care autorii lor arată cum se selecționează contractele finanțărilor în scopul reducerii costurilor. În schimb aceste obiective i-

obligat pe teoreticieni să distingă activitatea societății de natura activelor sale. Ca și în modelele precedente autorii stabilesc aceeași ierarhie între finanțări.

Fama și Jensen arată cum minimizarea costurilor ansamblului contractelor societății (contracte cu clienții, salariații, furnizorii) determină în mod indirect structura financiară. Costurile fixe au o pondere însemnată în costurile totale, iar supraviețuirea societății depinde de capacitatea sa de a le reduce (Fama, Jensen, 1985).

Societatea va trebui să fie mai puțin îndatorată dacă activele sale au o valoare scăzută de vânzare și dacă veniturile sale sunt incerte. Preponderența fondurilor proprii constituie oarecum o garanție pentru parteneri de a întreține relații contractuale durabile atât timp cât riscul falimentului este redus. Dacă activitatea societății o obligă să investească în active având o valoare de (re)vânzare ridicată, aceste investiții joacă rol important ca și fondurile proprii, fiind o garanție de plată pentru parteneri.

Fama consideră că structura financiară va fi mai puțin îndatorată când valoarea de vânzare a activelor este scăzută. În acest caz societatea poate obține o structură financiară în care să privilegieze finanțarea prin fonduri proprii (clasament între finanțări) sau prin examinarea avantajelor costurilor marginale ale diferitelor surse de finanțare (compromis între finanțările în care îndatorarea ar prezenta costuri mai mari decât avantaje). Fama nu face referință nici la conceptul clasamentului între finanțări și nici la cel al rației optime de îndatorare și în acest caz, ambele interpretări par a fi luate în considerare.

Mai multe curente teoretice s-au dezvoltat pentru a defini un concept distinct opus celui de *pieță* și anume cel de *organizație*. Printre aceste curente teoretice cel mai important este *teoria costurilor tranzacționare* introdusă de Coase (1937) și dezvoltată strălucit de Williamson, care aduce argumentul de specificitate a investițiilor. Totuși abordarea sa este diferită de cea a lui Fama în măsura în care el nu studiază structura financiară, care va permite diminuarea costurilor ansamblului contractelor între societate și partenerii săi. În reflexia lui Williamson nici contractele societăților cu salariați, clienți, furnizori, nici impactul structurii financiare asupra costurilor nu sunt abordate în mod direct (Williamson, 1988). Williamson presupune ca părțile semnatare ale contractului au o raționalitate limitată. Când contractele sunt incomplete, contractanții își pot modifica comportamentul lor chiar după semnarea contractului. Într-adevăr contractanții caută să profite de faptul că toate eventualitățile posibile și sancțiunile corespondente nu pot fi prevăzute în mod integral în contract. Poziția de negociere ocupată de fiecare dintre părțile contractante poate deci varia atât înainte cât și după semnarea contractului. Williamson rezumă această idee prin termenul de transformări fundamentale. Williamson dă soluția cum pot fi reduse aceste costuri. Aplicând această teorie contractelor finanțării el menționează că îndatorarea și creșterea de capital nu sunt considerate singurele surse de finanțare însă le acordă o contribuție mai mare sau mai mică, la realizarea acestor argumente ex-post.

Atunci când investițiile sunt specifice ele sunt obiectul contractelor incomplete între societate și aducătorii de capital, iar transformarea fundamentală constituie un pericol major. În acest caz societatea are o probabilitate ridicată de a nu respecta angajamentele sale. Un activ va fi specific dacă el nu va putea fi utilizat decât pentru societatea în cauză.

În măsura în care investițiile specifice sunt obiectul contractelor incomplete între societate și aducătorii de capital finanțarea adaptată pentru societăți trebuie să aibă capacitatea să realizeze aceste ajustări la venituri mai scăzute.

În acest sens considerăm că majorarea de capital (cu o difuziune de titluri care nu este prea importantă) este mai bine adaptată decât îndatorarea pentru finanțarea investițiilor specifice pentru următoarele motive:

- *Acționarii au interesul constant de a supraveghea politica de investiții a managerului. Acesta pentru că acționarii au un statut de creanțieri reziduali asupra beneficiilor societății în caz de lichidare a activelor, iar fondurile sunt aduse pe întreaga durată a vieții societății.*
- *Managerii sunt aleși de către acționarii care au puterea de a-i înlocui sau de a decide asupra remunerației lor, au acces la documentele contabile și pot să ceară audit aprofundat asupra unor aspecte particulare*
- *Creșterea de capital conduce la o structură mai suplă decât îndatorarea. De exemplu dacă o investiție specifică este reprezentată de un proiect de cercetare-dezvoltare, acționarii tolerează mai mult decât împrumutătorii faptul că el nu degajă, rentabilitatea scontată.*

Hyafil califică această structură de gestiune drept flexibilă “...în caz de dificultate adunarea acționarilor hotărăște dacă societatea trebuie să fie lichidată sau dacă se vor pune în aplicare măsuri de redresare financiară. În schimb îndatorarea nu permite realizarea în aceiași măsură a adaptărilor ex-post” (Hyafil, 1993).

Dacă investiția este specifică, împrumutătorii vor să profite în mod particular de una din aceste slabiciuni ajustând în acest fel prețul tranzacției.

Dacă activele posedă caracteristici contrare (nu sunt specifice), îndatorarea este mai apropiată de probabilitatea de realizare a ajustărilor ex-post, atât timp cât aceste investiții vor degaja venituri. Fiind o formulă de finanțare mai simplă îndatorarea va fi mai puțin costisitoare și deci mai bine adaptată.

Concluzii

Minimizarea costurilor contractelor particulare a acestor investiții permite creșterea valorii societății. În acest caz ne putem întreba dacă reducerea costurilor contractelor particulare reduce posibilitatea finanțării investițiilor prin creștere de capital și dacă aceasta este contrară intereselor acționarilor? Intr-adevăr dacă această politică de finanțare este împotriva intereselor acționarilor, putem deduce că aceste modele ignoră constrângerea pe care aceștia o au în legătură cu obiectivul de maximizare a valorii globale a societății comerciale.

Astfel teoriile fondate pe acest raționament nu au ca obiectiv explicarea în mod global a structurii financiare, ci constau în a da sfaturi pentru a lua o decizie financiară în situații precizate. Aceste teorii diferă deci de modelele bazate pe principiul compromisului.

Teoriile compromisului și finanțării ierarhice conduc la idea că deciziile de investiții și de finanțare nu sunt separabile, însă demersul pentru a ajunge la această reflectivă este diferit.

Aplicarea principiului ierarhiei pune în mod direct problema costului mediu ponderat al capitalului? Două răspunsuri sunt posibile:

O teorie a finanțării ierarhice în care aplicarea unui clasament între finanțări nu este preconizată decât pentru investiții precise, ca modelul lui Narayanan, va putea să nu pună problema conceptului de cost mediu ponderat al capitalului. Pentru alte proiecte aceasta însemnând de exemplu investiții a căror rentabilitate este aleatoare nu există indicații asupra demersului financiar de urmat.

După aplicarea principiului ierarhiei între finanțări, problema costului mediu ponderat al capitalului nu va fi abordată în mod real, în măsura în care, utilizarea principiului compromisului va fi preponderant, iar rata îndatorării optime va trece pe un plan secund. Ca regulă generală, prețul de acceptare sau respingere a unui proiect va fi costul mediu ponderat al capitalului. În schimb teoriile finanțării ierarhice, preconizând în mod constant o ordine între finanțări, pun în discuție acest aspect. Acesta este cazul teoriilor în care un clasament între finanțări este preconizat dacă investiția prevăzută prezintă o anumită caracteristică.

Conceptual costului mediu ponderat al capitalului nu este adaptat atât timp cât factorii săi de ponderare nu au nici un sens, caz în care nu va exista o rație optima a îndatorării.

În concluzie prezentarea principalelor teorii ale finanțării ierarhice a permis să se arate o mare diversitate ipotezelor raționamentului participanților la gestiune financiară a societății. Integrarea unor activități trebuie să țină cont pe lângă avantajele diminuării costurilor de tranzacționare și de o serie de restricții impuse de politicile antimonopoliste și de caracterul tot mai dinamic și deschis al economiei mondiale.

Bibliografie

1. BULTEL, E. Les theories du financement hierarchique, These de doctorat, Dijon, 1994, p. 16
2. doi:10.2307/1883069. JSTOR 1883069.
3. FAMA E., JENSEN M.C. Organisational forms and investment decisions, The Journal of finance economics nr. 14/1985
4. HARRIS, M., RAVIV, A, Capital structure and the information role of debt, The Journal of finance nr. 2/1990
5. HYAFIL, A, Structure financière : des théories distinctes, des choix qui convergent, Revue Française de Gestion, November-December 1995, nr. 106, pp 55-64
6. HYAFIL, A.M. Décisions stratégiques et valeur de la firme, Revue Française de Gestion, January-February 1991, nr. 82, pp 45-57,
7. MODIGLIANI, F., MILLER, M.H. Corporate Income Taxes and the Cost of Capital: A Correction. The American Economic Review, vol. 53, no. 3, Summer 1963, pp. 433-443
8. MODIGLIANI, F., MILLER, M.H. The Cost of Capital, Corporation Finance and the Theory of Investment. The American Economic Review, vol. 48, no. 3, Summer 1958, pp. 261-297.
9. MYERS, S.C. The capital structure Puzzle, Journal of finance nr.39/1984, p.575-592
10. NARAYANAN, M.P. Managerial incentives for short term results, Journal of finance, 1988
11. STIGLITZ, J. Alternative theories of wage determination and unemployment in LDC's: the labor turnover model. The Quarterly Journal of Economics. 88 (2). Oxford Journals: 194-227, 1974.
12. STIGLITZ, J. Readings in the modern theory of economic growth. Cambridge, Massachusetts: The M.I.T. Press, 1969, ISBN 9780262190558.
13. WILLIAMSON, S. Liquidity banking and bank failures, International economic review, vol 25/1988.

IDENTIFICATION OF VECTORS OF INTERNATIONAL EXPERIENCE IN IMPLEMENTING STATE INVESTMENT POLICY MECHANISMS IN UKRAINE

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Abstract

The state's investment policy is one of the most ambiguous: on the one hand, its provisions seem simple and clear - create a good investment environment based on a favourable investment climate, and you will achieve increased investment activity, scaling up of investments, growth in the number of implemented investment projects, and so on.

However, on the other hand, investment processes are influenced by numerous direct and indirect factors and conditions, including institutional, legal, economic, social, socio-psychological, informational, environmental, and other factors.

The study of international experience in implementing mechanisms of state investment policy is always relevant and provides grounds for both further development of the theoretical and methodological foundations of regulation in the investment sphere, and the formation of effective applied recommendations for formulating and implementing policies to improve the investment climate and develop the investment environment. The goal is to stimulate domestic and foreign investment activity, increase investment volumes, and improve their structural characteristics.

The purpose of this study is to identify vectors of international experience in implementing mechanisms of state investment policy in Ukraine. Conclusions are drawn regarding the possibilities of applying international experience in this area within the current economic situation.

Keywords: investment, investment policy, investment climate, investment environment, investment projects

JEL: E62; G31

Introduction

The state's investment policy is one of the most ambiguous: on the one hand, its provisions seem simple and understandable – create a good investment environment based on a favourable investment climate, and you will see an increase in investment activity, scaling of investments, growth in the number of investment projects implemented, etc. However, on the other hand, investment processes are influenced by numerous direct and indirect factors and conditions, including institutional, legal, economic, social, socio-psychological, informational, and environmental factors, and taking all of them into account within a single programme of regulatory measures is quite complicated, which makes investment policy (and especially its component implemented at the regional level) very systematic and complex, consisting of a number of direct (such as laws on investment activity, investment and innovation activity, etc.) and indirect regulations.

Results obtained and discussions

A perfect investment policy requires consideration of a wide range of institutional and economic principles, but without clear levels and optimal proportions. For example, an overly 'liberal' investment environment can destabilise the domestic market, lead to increased competition and pressure on local businesses, and exacerbate issues of import dependency and the economy's dependence on foreign capital, weakening the economic system's resilience to hybrid challenges and threats [1, p. 12].

Conversely, overregulation of the investment environment intensifies factors that discourage investment activity, discourages potential investors from investing in capital-intensive projects in the domestic market, and ultimately leads to a decrease in investment volumes and even capital outflows, the shadowing of financial investments and the use of offshore instruments for such purposes.

These circumstances confirm that investment policy is quite complex, but it is necessary to model it, and there is global experience in this area, the study of which allows us to understand how investors react to certain regulatory measures taken by the state, what the trends are in terms of investment volumes depending on certain conditions that have formed in the capital market, the

current state and development trends of national and regional socio-economic systems.

That is why studying international experience in implementing state investment policy mechanisms (both in general and taking into account regional specifics) is always relevant and provides grounds for further development of theoretical and methodological foundations for regulation in the investment sphere, and the formation of effective practical recommendations in terms of shaping and implementing policies to improve the investment climate and develop the investment environment in order to stimulate domestic and foreign investment activity, increase investment volumes and improve their structural characteristics.

In the author's opinion, the generalisation of global experience in the field of state investment policy should be carried out along two vectors:

- (1) general approaches and practices for activating and streamlining investment activity, particularly in conditions of economic crisis, insufficient investment attractiveness and instability;
- (2) specific tools used in conditions of war and post-war reconstruction of the national economy.

This method will enable the identification and development of mechanisms for implementing effective management decisions that will preserve and restore investment activity in wartime conditions, as well as increase and rationalise it during the post-war reconstruction phase, which is of great importance for the regions of Ukraine today.

With regard to the first direction, it should be noted that the use of the term 'investment', as well as the role of investment as an element in the system of commodity-money and economic relations, has a long history and has been used practically since the very beginning of barter transactions and the first trade relations. The Code of Hammurabi (circa 1700 BC) is well known for initiating the first attempts to form the institutional foundations of investment and investment activity. In essence, since that time, investment has evolved into an established term and concept that does not require any in-depth clarification or development. It is clear that various aspects of investment, their consideration from different perspectives, in different spheres of public life and sectors of the economy, the principles and applied provisions for the formation and implementation of investment policy at both the state and business levels are constantly in the spotlight and at the centre of a large number of scientific studies and discourses.

However, in general, it should be acknowledged that the basic principles here are well established, and it was probably this fact that led to the institutional provisions of international investment policy being institutionalised only in 2012 at the United Nations Conference on Trade and Development [2]. In particular, it was recognised that investment policy has a high level of synergy, a much broader purpose than just attracting capital and achieving the goals of its expanded reproduction; it is, in essence, an effective tool for regulating structural changes and institutional reforms in the real sector of the national economy, particularly in industry; investment is a good form of cooperation, collaboration, the creation of motivational cluster structures, etc. Moreover, it was recognised that the regulation of the investment environment is also relevant to the socially responsible behaviour of economic agents, the improvement of the institutional environment, the equalisation of spatial development, and, consequently, the balancing of a whole range of parameters for the sustainable development of territories and society as a whole.

The aforementioned document also defined the basic principles of national policy in the field of investment regulation. It was stated that, on the one hand, the state is interested in increasing the volume of investments, in particular foreign direct investments, and creates all the

necessary conditions for this. However, on the other hand, it is responsible for the protection and security of investments. Thus, it is possible to draw a rather important conclusion that the state must assume the function of ensuring the economic security of investments and the investment process. At first glance, this seems like an obligation that entails additional costs. But in fact, this is not the case, and the creation of an investment and economically secure environment for investment is a dominant condition for the quality of the investment environment and business climate. This rule has become an axiom of state investment policy and is strictly adhered to in countries that are currently world leaders in terms of the quality of their investment environment.

As noted by T. Zatonatska, the basic principles of effective investment policy include: using investment as a factor in sectoral and structural change, thereby strengthening the competitiveness of national and regional economic systems; using investment as a key resource for implementing regional development strategies and programmes; maximising the socio-economic effects of investment and reducing the potential destructive effects of capital attraction; taking into account and ensuring the social, economic and other responsibilities of investors; institutionalising investment policy and its results [3, p. 7].

Undoubtedly, these are important aspects that must be properly taken into account when formulating and implementing regional investment policy. For example, increasing investment volumes is undoubtedly a positive and ambitious goal, but it is important to understand whether the authorities will be able to guarantee the economic security of investments and ensure the necessary structural characteristics of investments. This mainly concerns their focus on innovative goals (and ultimately strengthening the competitiveness of economic agents, industries and the economy as a whole), sustainable development, smart infrastructure, greening, social inclusion, the legal economy, its productive sectors, reinvestment and business capitalisation, etc.

Moreover, what initially seemed to be insufficient attention to investment policy later developed into what was perhaps the most important instrument for ensuring economic protectionism. Thus, the 2011 World Economic Report stated that countries have the right to use (if it does not contradict international norms) investments to protect the domestic market from a number of external systemic threats, which may include: hybrid influences, increased monopolisation of the national economy and its regional sectors, the use of the financial system for private purposes, in particular through the monopolisation of financial services, various types of dependence of strategic enterprises on external investors, the weakening of a number of areas important for the country's security (such as agriculture and food security, culture and science and human potential, physical education and sport, and demographic stability of territories) the transformation of regional economies into raw material appendages, the 'theft' of intellectual and human resources, etc. [4, p. 110]. On the other hand, there are interesting questions about how the state can influence the volume and structure of investments.

Another option is public-private partnership, a tool that allows the state to quickly and efficiently redistribute investment resources between territories, types of economic activity, industries and sectors of the economy, providing businesses with access to certain assets belonging to the state/society (provided that investments are made with a view to modernisation and improvement). certain assets belonging to the state/society. As noted in [5, p.103-111], the use of this instrument improves opportunities for investment support in sectors such as energy, gas distribution and water supply, transport and communications, agriculture and agribusiness, and the extractive industry. In addition, smart public-private partnerships become an economic means of

replacing direct investment protectionism with the stimulation of domestic investment, which at the same time ensures the equalisation of spatial and territorial development imbalances.

It is also important to note the close dependence of local economic development on active state support for investment in research and development, creation and implementation of innovations. This is particularly evident in Germany, where there is a whole range of budget financing and financial and resource support programmes for local venture capital and innovation-active small businesses.

An effective investment policy is a balance between, on the one hand, the creation of a healthy and transparent competitive environment without systemic flaws such as corruption, monopolisation, administrative pressure, etc. and, on the other hand, state control (supervision, monitoring) over strategic enterprises and sectors of the economy, zones/territories of priority development [6, p. 84].

Conclusions

International experience suggests that possible means of investment protectionism include regulating business conditions, increasing fiscalisation, and differentiating a country's monetary policy conditions from generally accepted international standards. However, these practices were considered unsuccessful and were named among the factors that led to the spread of crisis phenomena in EU countries such as Greece, Portugal, Spain, and others. Therefore, simplifying the conditions for commercial economic activity, which stimulates investment, is considered much more promising. In economically developed countries, this is achieved through business deregulation, simplification of licensing and approval requirements for new construction, connection to energy networks, commissioning of facilities, etc.

Therefore, based on an analysis of global experience in the formation and implementation of investment policy, including at the regional and local levels, the main criteria for the quality and effectiveness of regulation in this area are the volume and specific characteristics of investments (in relation to GRP, agricultural and industrial production, total capitalisation, tangible assets, tax revenues, etc.), as well as the rationality of their structure, financing and use. At the same time, two conditions should be considered fundamental: transparency of the competitive environment and state control over strategic enterprises, types of economic activity and sectors.

References

1. Boiko R. (2024). Possibilities for implementing global experience in the implementation of state investment policy mechanisms at the regional level. *Black Sea Economic Studies. Scientific journal*. Vol. 88. Pp. 12–18.
2. World Investment Report 2012: Towards a New Generation of Investment Policies. UNCTAD. 2012. 239 p.
3. Zatonatska, T. (2014). World experience in the formation of state investment policy and mechanisms for its implementation. *Herald of T. Shevchenko Kyiv National University*. Iss. 8 (161). pp. 6–10.
4. World Investment Report 2011: Non-Equity Modes of International Production and Development. UNCTAD. 2011. 251 p.
5. Turiyanska, M. M. (2004). Investment climate: approaches to modeling. *Scientific works of DonNTU*. Vol. 76. pp. 103–111
6. Boiko R. (2025). International experience in assessing the effectiveness of state investment policy implementation. Innovative strategies and challenges of modern marketing in the context of global technological changes and digitalisation of economic processes: materials of the international scientific and practical conference, Lviv, 10 March 2025. – Lviv: LTEU. pp. 83–84.

INTERNET MARKETING IN THE CONDITIONS OF DIGITALIZATION: THEORETICAL FUNDAMENTALS AND DEVELOPMENT TRENDS IN MOLDOVA

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Abstract

Digital technologies and their rapid development have a significant impact on all spheres of modern society. The impact of digitalization on economic relations, in particular on the development of e-commerce, has become particularly noticeable. In recent decades, electronic commerce (e-commerce) has firmly taken an important place in the structure of trade relations, gradually replacing traditional sales channels. Internet sales have ceased to be just an alternative to offline stores and have become the main tool of interaction between companies and customers.

In the new reality, it is no longer enough for a business to be simply represented on the Internet. Modern conditions require active and competent use of digital technologies to achieve commercial goals and strengthen market positions. Online sales have become a priority not only for large companies and global brands, but also for small and medium-sized businesses that seek to remain competitive in the digital environment. A key tool in increasing the effectiveness of online sales is digital marketing (internet marketing), which encompasses a wide range of tools and methods for promoting products and services online. Despite the obvious advantages, digital marketing involves a number of difficulties. Many companies, especially in the small and medium-sized business segment, face problems with the selection and proper use of digital tools due to the lack of qualified specialists, limited budgets and insufficient information on digital marketing. Digital marketing (Internet marketing), which encompasses a wide range of tools and methods for promoting products and services online, is a key tool for increasing the effectiveness of online sales. Despite the obvious advantages, digital marketing involves a number of challenges. Many companies, especially in the segment of small and medium-sized businesses, face problems with the selection and proper use of digital tools due to the lack of qualified specialists, limited budgets and lack of awareness of modern trends and approaches. This leads to the fact that a significant proportion of businesses continue to use outdated and ineffective methods of promotion, ignoring the opportunities that the digital environment offers. This study provides a comprehensive examination of digital marketing and identifies the most effective tools and strategies for increasing online sales.

Keywords: digital technologies, e-commerce, digital marketing, digital environment, online sales

JEL: M31, L81, F18

Introduction

Digital technologies and their rapid development significantly influence all spheres of modern society. The impact of digitalization on economic relations, particularly on the development of e-commerce, has become especially noticeable. [1] In recent decades, e-commerce has strongly placed an important position in the structure of trade relations, gradually replacing traditional distribution channels. Online sales have become the main tool for interaction between companies and customers, no longer just an alternative to offline stores.

In the new business reality, it is no longer enough for a business to simply be present online. Modern conditions require active and competent use of digital technologies to achieve commercial goals and strengthen market positions. Online sales have become a priority not only for large companies and global brands but also for small and medium-sized businesses, which strive to remain competitive in the digital environment. [4]

Digital marketing (internet marketing), encompassing a wide range of tools and methods for promoting products and services online, is a key instrument in increasing the effectiveness of online sales.

Despite obvious advantages, digital marketing is associated with a number of complexities. Many companies, especially in the small and medium-sized business segment, face problems in choosing and correctly using digital tools due to a lack of qualified specialists, limited budgets, and insufficient awareness of modern trends and approaches. [18] This leads to a significant part of businesses continuing to use outdated and ineffective promotion methods, ignoring the opportunities provided by the digital environment.

In this regard, there is an urgent need for a comprehensive study and systematization of knowledge about digital marketing, as well as for identifying the most effective tools and strategies for increasing online sales. It is important not only to describe existing approaches but also to analyze them in detail using specific examples of successful companies, determine the conditions for their maximum effectiveness, and formulate practical recommendations for businesses. [19]

Results obtained and discussions

The Evolution of Online Sales and Consumer Behavior in the Digital Environment

The development of internet technologies and their integration into daily life have fundamentally changed the process of consuming goods and services, leading to a significant transformation of traditional trade models. Online sales, initially considered merely an additional sales channel, have gradually become the dominant form of trade in many economic sectors of the economy. [8]

One of the key features of online sales is the changed consumer behavior. In the digital environment, buyers gained the ability to quickly compare prices and product characteristics, read reviews from other users, choose the most advantageous offers, and make purchases at any convenient time. This has increased consumer expectations regarding service quality, delivery speed, and the availability of information about goods and services. [21]

Another important trend has been the change in the purchase decision-making process. In traditional retail, the buyer, in most cases, made a decision under the influence of a limited amount of information and advertising seen directly in the store or in traditional media. In the digital environment, the decision-making process has become more complex and multi-stage. The concept of a "sales funnel" emerged, describing the stages a consumer goes through before making a purchase: from the first contact with the brand to the final purchase decision. Now, companies are forced to consider and track customer behavior at each stage of this funnel, adjusting marketing efforts to increase sales effectiveness. [12]

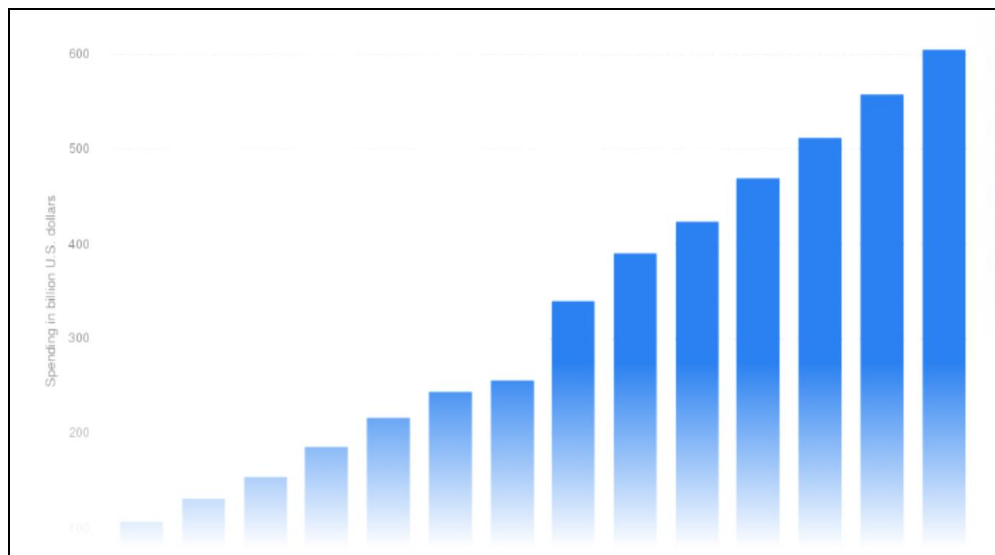


Figure 1. Digital advertising expenditure worldwide 2014-2027, billion U.S. dollars

Source: Statista [12]

Generational affiliation also significantly influences consumer behavior. For example, representatives of generations Y and Z, who grew up in the digital environment, show greater involvement in online purchases, preferring mobile applications and social media platforms for making purchasing decisions. In contrast, older generations (X and baby boomers) are more likely to use traditional websites and are more careful about the security of their personal data online. [8]

A crucial component of consumer behavior has also become the growing influence of recommendations, reviews, and user-generated content (UGC). Consumers more often trust the opinions of other buyers than advertising, and this encourages companies to actively work with feedback, stimulate customers to leave reviews, and recommend products to other users. [6]

Thus, the evolution of online sales and changing consumer behavior require companies to constantly study new trends and adapt their strategies. Companies capable of promptly responding to changes, considering the preferences of various audience segments, achieve significant success and strengthen their market positions.

A significant milestone in the development of e-commerce was the spread of the internet in the late 1990s – early 2000s, when the first online stores, such as Amazon and eBay, were able to offer consumers a new level of convenience and speed of purchases. [8]

Over the next two decades, online sales underwent significant changes, gradually covering almost all product categories and demographic groups of buyers. The COVID-19 pandemic provided a particularly powerful impetus for the growth of e-commerce, forcing millions of people to switch to online shopping due to restrictions on physical store visits. According to an eMarketer report, during the pandemic, the growth rates of online sales accelerated several times, and the share of e-commerce in global retail reached record levels. [14]

The modern stage of economic development is inextricably linked with intensive digital transformation, which affects almost all aspects of doing business. Marketing as a discipline and applied field found itself at the epicenter of these changes, due to the specificity of its customer focus and the need for constant adaptation to new models of consumer behavior.

Digital technologies not only modify existing marketing tools but also form fundamentally new strategies for interacting with the market, based on data analysis, process automation, and communication personalization.

History and Evolution of Internet Marketing in the Digital Age

Internet marketing, as an independent discipline, began to form at the turn of the 1990s – a period of active spread of personal computers and the emergence of commercial internet. The first steps in this direction were electronic mailings (email), banner advertising, and simple websites designed to represent companies and their products online. Already in 1994, the first banner appeared on the HotWired website, which marked the beginning of the era of internet advertising. From this moment, marketing in the digital space began to develop rapidly, adapting to new technological capabilities and consumer behavior.

The late 1990s – early 2000s were marked by a rapid increase in the number of internet users and the launch of search engines such as Yahoo, AltaVista, and, later, Google. It was during this period that the active development of search engine optimization (SEO) began, as well as contextual advertising. Google AdWords (now Google Ads), launched in 2000, was a breakthrough in promotion methods – advertisers gained the ability to pay only per click (PPC model), which made internet advertising accessible and measurable. [6]

With the development of social networks in the mid-2000s, internet marketing gained a new growth vector. The emergence of Facebook (2004), YouTube (2005), Twitter (2006) opened up wide opportunities for targeted promotion, creating viral content, and building communities around a brand. During the same period, the importance of content marketing increased: companies began to actively publish articles, blogs, videos, and other valuable content aimed at engaging and retaining customers. It was then that the concept of "inbound marketing" actively began to form, the essence of which was not to impose advertising, but to attract the client through useful information.

The 2010s were marked by accelerated automation and personalization. Thanks to the development of analytical platforms, user behavior tracking technologies (cookies, pixels, device identifiers), CRM systems, and Big Data, companies began to build more targeted communications with clients. Retargeting tools, dynamic content, triggered mailings, and automated sales funnels appeared. Simultaneously, the role of mobile marketing increased, as a significant part of users switched to smartphones. According to a Statista report, already in 2019, more than 52% of global internet traffic came from mobile devices. [10]

The 2020s marked a new round of internet marketing development – at the intersection of technology, ethics, and creativity. On the one hand, marketers gained access to tools for artificial intelligence, machine learning, voice assistants, virtual and augmented reality. On the other hand, requirements for personal data protection, transparency of information collection, and honesty of advertising communications intensified. Users became more sensitive to excessive advertising and increasingly prefer brands with which they have a personalized and transparent dialogue. [4]

In modern reality, internet marketing is no longer a set of tools, but a holistic digital ecosystem, including SEO, PPC, SMM, email, content, analytical platforms, automation, neural networks, and creative approaches. It covers not only the client acquisition stage but also all phases of their life cycle: from the first session on the site to continuous interaction through loyalty and UGC (user-generated content).

Thus, the history of internet marketing represents an evolutionary path from experimental emails and first banners to a high-tech digital communication system based on data, technologies, and human values. Understanding this history is important for the correct choice of future strategies and for realizing how marketing transforms in response to changes in the digital environment.

The development of digital marketing at the turn of the 2020s is influenced by several factors simultaneously: increased competition in the online space, changes in user behavior, the development of mobile technologies, and stricter regulation in the field of personal data. As a result, digital marketing as an industry is undergoing profound transformations aimed at increasing the effectiveness, accuracy, and transparency of advertising communications.

One of the most significant trends in recent years is the growing influence of personalized content. According to McKinsey research, over 71 percent of consumers expect companies to provide individualized offers, and 76 percent are frustrated when this does not happen. [2] This means that marketing strategies built on universal messages are gradually losing their relevance. Instead, behavioral analysis technologies, predictive algorithms, and real-time content generation automation are coming to the forefront.

In parallel, there is active development of voice search and voice interfaces. The spread of intelligent assistants such as Google Assistant, Siri, and Amazon Alexa is changing the ways information is searched for and consumed. This requires companies to adapt SEO strategies to so-called "conversational queries" and optimize content taking into account new forms of user interaction. [5]

Mobile marketing plays a special role in the transformation of the digital environment. By 2023, the share of mobile traffic in the global internet exceeded 60 percent, and in some countries – more than 75 percent. [4] This led to a rethinking of website design, advertising formats, and user journey logic. The development of adaptive interfaces, mobile applications, geo-marketing, and push communications has become a prerequisite for companies striving to remain competitive in the digital environment.

Along with this, video content is rapidly developing as one of the most effective ways to transmit information. Short vertical video formats (Reels, Shorts, TikTok videos) have captured audience attention due to their visual richness and high level of engagement. According to HubSpot, in 2024, over 86 percent of marketers stated that video brings them a positive return on investment, and the average conversion rate when using video on landing pages increases by 34 percent. [17]

Another key trend is the integration of digital marketing with artificial intelligence systems. The use of neural networks allows predicting customer behavior, generating text and graphic elements of advertisements, and managing automatic bids in advertising auctions. Platforms like ChatGPT, Midjourney, and Google Gemini significantly accelerate the processes of creating advertising content, which provides an advantage in conditions of high competition and limited campaign deadlines. [18]

An important vector of change has also been the tightening of regulatory requirements in the field of personal data processing. GDPR laws in the European Union and similar acts in other countries have strengthened requirements for the transparency of collecting, storing, and using user information. This has led to a transition from cookie-oriented models to more sustainable identification formats, such as first-party data, as well as a growing interest in privacy-first strategies that ensure user trust in the brand. [7]

In the coming years, experts predict further automation of digital marketing processes, an increase in the importance of content marketing, and the emergence of new interaction formats at the intersection of offline and online spaces. In particular, an increase in the popularity of augmented and virtual reality, the development of meta-universes, and the emergence of more advanced platforms for working with digital avatars and personalized 3D experiences are expected.

Key Tools for Increasing Sales in the Online Environment

For successful business operations in the online environment, it is necessary to use various marketing tools that can significantly increase conversion and boost sales. Among the many existing methods, several key tools are actively used by most successful companies.

The first important tool is sales funnel optimization. The sales funnel is a model describing the path a customer takes from the first acquaintance with a product to the moment of purchase. Optimizing each stage of the funnel – from attracting attention to finalizing the order – significantly improves conversion and minimizes the loss of potential customers at each stage of the purchase process. [7] This is achieved by analyzing user behavior, simplifying registration and payment processes, and using various incentives to complete the purchase.

The next significant tool is lead generation – the process of attracting and collecting contact information of potential customers interested in purchasing a product or service. For effective lead generation, companies use contact capture forms on their websites, landing pages, interactive quizzes, as well as targeted advertising on social networks and contextual ads. The more targeted and high-quality the lead, the higher the probability of its conversion into a customer and, consequently, the higher the sales effectiveness of the company. [21]

Furthermore, one of the most important aspects of increasing sales is conversion management. Conversion is the ratio of the number of purchases made to the total number of visitors to a website or page. Conversion management involves systematically testing various elements of a website or advertising materials (headlines, texts, images, and call-to-action buttons), as well as using analytical tools to identify the most effective solutions. A popular method for such testing is A/B testing, which allows determining the most effective elements and improving conversion rates. [19]

Working with repeat purchases and customer retention is also of great importance for increasing sales. It has been proven that retaining existing customers is significantly cheaper for companies than attracting new ones. Email marketing tools, loyalty programs, personalized promotions, and retargeting campaigns are used to stimulate repeat purchases, reminding customers of the need to repurchase a product or service while offering favorable terms. [10]

Personalization of marketing communications is no less important. Modern technologies allow companies to collect and analyze data on user preferences and behavior, offering them the most relevant products and services. Personalization increases the likelihood of a purchase, as customers receive individually tailored offers that match their specific interests and needs. [5]

It is also worth noting the importance of evaluating the effectiveness of marketing activities. Metrics such as CTR (Click-Through Rate), CPA (Cost Per Action), ROI (Return on Investment), and LTV (Lifetime Value) play a key role in evaluating and adjusting marketing strategies. These indicators allow determining the most effective tools and promotion channels, efficiently allocating marketing budgets, and increasing the overall profitability of the business. [20]

In summary, the integrated use of the listed tools allows businesses to significantly increase the effectiveness of their online sales. Competent and consistent implementation of each of these tools ensures not only short-term results in the form of increased sales but also long-term competitive advantages through sustainable growth of the customer base and increased audience loyalty.

The Impact of Digital Technologies on the Transformation of Marketing Strategies

One of the key factors in marketing transformation is the development of analytical technologies and Big Data processing systems. Modern companies are able to collect and analyze millions of data points about user behavior: from purchase and viewing history to geolocation, activity time, and responses to specific advertising formats. Using such data allows building behavioral prediction models, personalizing offers, optimizing advertising budgets, and making management decisions based on evidence. According to a McKinsey & Company study, companies actively using analytics achieve a 126% increase in profit compared to those who use digital tools sparingly. [2]

Machine learning algorithms and elements of artificial intelligence (AI) play an important role in the transformation of marketing approaches. They are used for audience segmentation, predictive analytics, personalized content marketing, and automation of digital sales funnels. For example, AI-powered chatbots can process user requests in real-time, recommend products, place orders, and collect feedback. Such technologies increase response speed, reduce service costs, and increase customer satisfaction.

Automation of marketing processes also significantly impacts strategy transformation. New generation marketing platforms allow setting up multi-stage campaigns, launching A/B tests, managing email newsletters, analyzing behavioral scenarios, and adapting the website interface to a specific user. According to a HubSpot report, 76% of marketers using automated scenarios report an increase in ROI for their campaigns within the first months of implementation. [4]

Significant changes have also affected the classic 4P marketing model (Product, Price, Place, Promotion). In the digital environment, there is a shift in emphasis: the product becomes not only a commodity but also part of the digital experience; the price can vary depending on behavioral factors (dynamic pricing); distribution occurs through online platforms, marketplaces, and proprietary websites, and promotion shifts towards content, native advertising, influencers, and user-generated content. Thus, the very nature of the marketing mix is transforming – it becomes flexible, technological, and personalized.

Another aspect of transformation is the rethinking of the client's role in the marketing process. The user ceases to be merely a target audience and becomes an active participant in promotion: sharing reviews, creating content, interacting with the brand on social networks. This requires companies to engage in more open, two-way communication and build long-term relationships based on trust and shared value. As highlighted in an Evergage report, 88% of marketing professionals believe that personalized interaction significantly increases customer engagement and loyalty. [7]

Conclusions

Digital technologies are fundamentally changing not only the tools but also the philosophy of marketing. Modern strategies are formed based on big data analysis, algorithmic automation, interactive communications, and a focus on personalized customer experience. These changes require companies to constantly update their approaches, adapt to technological trends, and invest in digital competencies.

Digital marketing is a dynamically developing field, whose progress is driven not only by accelerating technological advancements but also by significant changes in consumer behavior, regulatory frameworks, and the global structure of communication practices. Companies capable of adapting to these changes and promptly implementing modern digital communication tools gain a sustainable competitive advantage and the opportunity to scale their operations into new markets.

In the long term, the ability to flexibly and technologically build communication with the client becomes a key factor in business sustainability in the digital economy.

References

1. Kotler, P., Armstrong, G. (2021). Principiile marketingului. Pearson Education.
2. DigitMe. (2024). Performance marketing report for Puma Moldova. Document intern, acces prin colaborare.
3. Chaffey, D., & Ellis-Chadwick, F. (2019). Digital Marketing (7th ed.). Pearson Education.
4. Ryan, D. (2020). Understanding Digital Marketing: Marketing Strategies for Engaging the Digital Generation. Kogan Page.
5. McKinsey & Company. (2021). The future of e-commerce after COVID-19. [online] Disponibil la: <https://www.mckinsey.com/business-functions/mckinsey-digital>
6. 3.Campaign Monitor. (2022). Email Marketing Benchmarks. [online] <https://www.campaignmonitor.com/resources/guides/email-marketing-benchmarks/>
7. HubSpot. (2023). State of Marketing Report. [online] <https://www.hubspot.com/state-of-marketing>
8. eMarketer. (2023). Retail E-Commerce Sales Worldwide. [online] <https://www.emarketer.com>
9. Evergage. (2021). Trends in Personalization. [online] <https://www.evergage.com/resources/ebooks/trends-in-personalization>
10. Influencer Marketing Hub. (2022). Influencer Marketing Benchmark Report. [online] <https://influencermarketinghub.com>
11. Coca-Cola. (2023). Holiday Campaign Results Report. [online] <https://www.coca-cola.com>
12. Statista. (2023). Digital Advertising Worldwide – Statistics and Forecasts. [online] <https://www.statista.com>
13. Statista (2023). Mobile Internet Usage Worldwide – Statistics and Forecasts. [online] <https://www.statista.com/topics/779/mobile-internet/>
14. Salesforce (2024). State of Marketing Report. [online] <https://www.salesforce.com/resources/research-reports/state-of-marketing/>
15. Google (2023). Think with Google: Retail Trends and Consumer Insights. [online] <https://www.thinkwithgoogle.com/>
16. Adobe (2023). Digital Trends Report. [online] <https://business.adobe.com/resources/reports.html>
17. Deloitte (2022). The Future of Retail: Redefining Omnichannel Experience. [online] <https://www2.deloitte.com/>
18. Econsultancy (2022). Email Marketing Best Practices Guide. [online] <https://econsultancy.com>
19. Gartner (2023). Magic Quadrant for Digital Commerce Platforms. [online] <https://www.gartner.com/>
20. Hootsuite & We Are Social (2024). Digital Global Overview Report. [online] <https://datareportal.com/reports/digital-2024-global-overview-report>
21. Nielsen (2023). Global Marketing Report: The Evolving Role of the Marketer. [online] <https://www.nielsen.com/>
22. Shopify (2023). Future of Commerce Report. [online] <https://www.shopify.com/research/future-of-commerce>
23. Oracle (2022). Personalization and the Customer Experience. [online] <https://www.oracle.com/cx/resources/>
24. PwC (2023). Customer Loyalty in the Digital Age. [online] <https://www.pwc.com/>
25. IBM (2023). Artificial Intelligence in Marketing: Practical Applications. [online] <https://www.ibm.com/watson/advantage-reports/>

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CONCEPTUAL APPROACHES TO BANK CYBERSECURITY

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Abstract

Cybersecurity in banking is a multidimensional notion that brings together strategies, technologies, practices and processes aimed at protecting banks; systems, data and digital networks. The purpose of the research was to present the essence and trends in the development of cybersecurity within banks. The study was conducted by examining reports from specialized companies and expert opinions published in open form on the Internet. The materials thus accumulated allowed the creation of a complex picture of the current development of cybersecurity in banking activities. The main reasons that require bank cybersecurity management are: customer data protection; maintaining customer trust and reputation; compliance with regulations; preventing financial loss; protecting critical infrastructure; ensuring business continuity. It is clear that over the past few years the threat landscape has expanded in complexity and scope. Currently, banks are facing cybersecurity problems that have already become traditional, such as ransomware, unencrypted data, cloud-based cyber-attacks, social engineering, phishing attacks, malware, attacks on third-party providers, supply chain attacks, endpoint security. At the same time, we can talk about new challenges in strengthening the cybersecurity of banks: the evolution of zero trust security; regulatory pressures and compliance-driven security; quantum computing threats to cryptography; AI-powered fraud detection and financial crime prevention. Experts visions for the continued strengthening of cybersecurity in banking are linked to the evolution of advanced technologies and the improvement of regulatory frameworks. To this end, banks will develop innovations related to artificial intelligence, blockchain and quantum computing.

Keywords: banking; cybersecurity; attack; threat; detection; prevention

JEL: G21

Introduction

Cybersecurity in the banking system is a complex concept that refers to the totality of practices, measures, technologies and strategies implemented by banking institutions to protect digital systems, networks, data, their own networks, as well as customer information from the diversity of cyber threats, attacks and unauthorized access. It provides for the implementation of advanced technologies, strict policies and continuous monitoring to protect against cyber threats. This protection largely extends to sensitive financial information, such as account details, personal data and transaction records, against unauthorized access, theft or attack. Cybersecurity is an important component of the banking security system. (Backbase, 2024), (The Business Research Company, 2025), (Future Processing, 2024), (Claire dela Luna, 2024)

By implementing advanced security technologies, monitoring systems for vulnerabilities, and educating both employees and customers, banks can stay ahead of cybercriminals and maintain the integrity of their operations.

Experts at Backbase (2024) state: “Cybersecurity is important for banks due to their role as custodians of not only money, but also sensitive personal and financial information. The high value of this data means banks are prime targets for cyberattacks, making it essential for them to protect themselves in various ways. Customer trust is another valuable commodity that banks can’t afford to lose. Even a single breach can damage a previously solid reputation and erode customer confidence, leading to loss of business. And financial loss is, of course, another major consideration.”

The timeliness of the study was dictated by the seriousness of the situation regarding the dynamics of global losses from cyberattacks on banks.

According to the International Monetary Fund (2024), the global financial sector has lost \$12 billion in the last 20 years due to over 20,000 cases of cyberattacks. This increase in the scale of cyberattacks is due to an increase in digitalization and geopolitical tensions.

Through a broader approach, data published by Embroker Team (2025) can be presented, according to which the global costs incurred by companies due to cybercrime amounted to 8 trillion dollars in 2023, and the prospect of this indicator increasing is 24 trillion dollars by 2027.

By implementing modern security technologies, monitoring systems for vulnerabilities, and educating both employees and customers, banks can create solid protection against cybercriminals and maintain the integrity of their business.

This article aims to present current approaches to cybersecurity within commercial banks.

MAIN CONTENT

1. Materials and Methods

The conducted study focused on the conceptual aspects of cybersecurity management within banking institutions. The information base of the research was created based on the examination of publications by experts in the field of banking cybersecurity and reports from specialized companies. The accumulated information allowed for the creation of a background image on the essence and dynamics of the global state of work in the field of banking cybersecurity. Then, a synthesis was created of current trends, future prospects, conclusions and recommendations for improving cybersecurity systems in banking institutions.

2. Results and Discussion

The cybersecurity system within banks is intended to ensure the fulfillment of the following functions (Claire dela Luna, 2024), (Darktrace):

- *Customer data protection.* Customer data, from social security numbers and addresses to sensitive financial details, is stored by banks and if compromised, can lead to identity theft, fraud and significant financial losses for individuals. In this area, cybersecurity plays a substantial role in defending this information against unauthorized access. Encryption, firewalls and secure access controls are some of the measures taken by banks to ensure that customer data remains protected.
- *Maintaining customer trust and reputation.* Cybersecurity has a significant impact on customer trust in the bank that serves them. To have a quality banking service, customers must have full confidence that their financial information is secure and that their transactions are carried out safely.

Security issues can reduce confidence in a bank's ability to protect sensitive personal and financial data. (Backbase, 2024) Studies by some specialized companies confirm this. For example, Centrify found that 65% of data breach victims lost trust in an organization as a result of the breach. IDC reported that 80% of consumers in developed countries are willing to leave a company if their information is compromised in a security breach. (Kenyon, 2021) According to the recent Accenture consumer banking survey, 58% of bank customers are concerned about the security of their personal

and financial data and the potential for being attacked by hackers when using their banks' personalized products. (Abend)

Robust cybersecurity measures are extremely important for maintaining bank customer trust, as well as ensuring that customers feel safe when conducting transactions and sharing sensitive information with their bank.

- *Compliance with regulations.* Banks are required to adhere to strict data protection standards, and cybersecurity compliance in the financial industry is heavily regulated. For example, legislation such as the General Data Protection Regulation in the European Union and the California Consumer Privacy Act in the US set strict guidelines on how banks must handle and protect customer data. Compliance with these regulations requires significant cybersecurity measures, including regular security audits, data encryption, and secure authentication processes. Failure to comply with the established regulations can result in significant fines and legal repercussions.

- *Preventing financial loss.* A successful cyberattack can lead to significant financial losses for banks. Criminals can steal money directly from bank accounts, manipulate transaction records, or use stolen credit card information to make fraudulent purchases. Also worth mentioning are the costs associated with system downtime or the high cost of repairing damaged systems. Furthermore, banks can be fined for violating regulations, incur legal fees, and pay compensation to compensate customers affected by cybercrime or identity theft due to a cyber breach. Implementing robust cybersecurity for financial services can minimize banks' financial risks associated with cybercrime by investing in advanced cybersecurity solutions.

- *Protecting critical infrastructure.* Banking infrastructure, including online banking platforms, ATMs, and payment processing systems, can become a target for cybercriminals. Attacks on these systems could lead to operational disruptions, affecting customer service.

- *Enhancing operational efficiency.* Effective cybersecurity practices not only protect banking institutions from cyberattacks, but also enhance their operational efficiency. When systems and data are secured, banks can ensure uninterrupted services and minimize downtime caused by cyber incidents.

- *Future-proofing against emerging threats.* As technology advances, so do the methods used by cybercriminals. Banks must stay one step ahead of these emerging threats by continuously updating their cybersecurity strategies. Strengthening cybersecurity efforts ensures that banks are prepared to deal with new and more sophisticated cyberattacks.

At the moment, we can talk about the formation of a global cybersecurity market in the banking sector, which, due to the impact of increasing cyber threats and the need for robust security measures, is showing rapid growth, which is presented differently through the evaluations of different specialized companies:

- In 2023, Allied Market Research valued the global banking cybersecurity market at \$74.3 billion in 2022 and forecasted growth to \$282 billion by 2032.

- According to Maximize Market Research (2024), the value of the banking cybersecurity market was \$273.24 billion in 2023 and its size is estimated to grow to \$623.17 billion in 2030. The main factor for this growth is considered to be the increasing adoption of new technologies, stimulated by digital transformations and large-scale migrations to the public cloud for multiple applications.

- Specialists from The Business Research Company (2025) estimate the size of the banking cybersecurity market at \$317.98 billion in 2024, with a forecast growth to \$359.88 billion in 2025

and \$585.32 billion in 2029. This growth is attributed to risk management, sophistication of cyber threats, digital transformation, mobile banking security and cloud security.

According to a PYMNTS Intelligence report, “Protecting Accelerated Disbursements From Fraud”, 71% of financial institutions are using artificial intelligence and machine learning to detect fraud, up from 66% in 2023. This is to detect anomalies and patterns those human analysts might not notice, enabling faster decisions. (PYMNTS, 2024)

The following features of the examined market are also noteworthy (Grant):

- It is forecasted that by 2025, 48% of banks will use blockchain technology for secure and transparent transactions;
- 75% of banks are preparing for quantum cybersecurity threats by 2030;
- By 2025, there will be a global shortage of qualified cybersecurity professionals of 3.4 million positions.

The increasing importance of banking cybersecurity is driven by many factors, including:

- *Increased cyber threats.* Banks are currently facing an increase in cyber threats, driven by the increasing number and sophistication of cybercrime and the widespread adoption of digital technologies.

Some experts say that artificial intelligence has changed the cyber threat landscape, as AI-powered cyberattacks use machine learning to rapidly scan security systems, identify and exploit vulnerabilities. Cybercriminals have become able to automate attack processes, making these attacks more sophisticated and more frequent. According to a 2023 survey by CFO.com, 85% of cybersecurity professionals believe that the increase in cyberattacks is due to the application of artificial intelligence. (Embroker, 2025)

- *Regulatory Compliance.* Regulatory bodies have set stricter cybersecurity standards, forcing banks to take more robust security measures.

• *Technological advancements.* The increasing application of emerging technologies such as artificial intelligence, blockchain, quantum computing and cloud computing is making cybersecurity systems more effective in protecting against emerging threats. Also worth noting is the implementation by banks of solutions such as multi-factor authentication, encryption and regular security audits.

• *Mobile banking growth.* With the increasing use of mobile devices, they are becoming even more vulnerable to cybersecurity threats. Mobile banking applications can be targeted by cyberattacks, infecting devices with malware or gaining access to customer accounts. Phishing is also practiced to convince users to download malicious applications or click on fraudulent links. Similarly, a person’s banking credentials are stolen or financial transactions are intercepted. Furthermore, mobile devices can be lost or stolen and used in an unauthorized manner by third parties to access a person’s sensitive information. (Jasińska, Dobosz, 2024)

The most common cyber threats to banks are (Backbase, 2024), (Future Processing, 2024), (Jasińska, Dobosz, 2024):

- *Phishing attacks* are a form of cybercrime in which attackers trick individuals into providing sensitive information, such as login credentials, credit card numbers, or other banking details. They often resort to impersonating trusted entities (such as the bank itself) using social engineering to trick victims into responding. Using fake login pages, fraudulent emails from the bank, or even fake text alerts (e.g., by cybercriminals), access to a bank's systems can be gained.

The most common phishing tactic is to create a sense of urgency or panic with the aim of getting users to act without thinking critically.

In 2023, 27.32% of total phishing attacks globally were linked to financial institutions, down from 36.3% in 2022. (Petrosyan, 2024)

Malware or malicious software is any program or file that is intentionally harmful to a computer, network, or server, and is used to disrupt operations or steal sensitive data. Malware attacks infect devices and networks for various criminal purposes.

Types of malwares include computer viruses, worms, Trojan horses, ransomware and spyware. These malicious programs steal, encrypt and delete sensitive data; alter or hijack core computing functions; and monitor end users' computer activity. (Yasar, Lutkevich, 2024)

- *Banking Trojan* is a type of malware designed to steal personal financial data, such as online banking credentials, credit card details, or account login information. Once infected, the Trojan can monitor online activity, capture keystrokes, display fake banking web pages, or redirect users to fraudulent sites. (Keepnet, 2024)

- *Ransomware attacks* are a type of malware-based cyberattack that targets a user's or organization's data and encrypts a victim's data or systems, making them inaccessible. Ransomware is one of the most widespread types of malwares.

In the banking sector, ransomware attacks disrupt financial operations and put confidential financial information at risk. Encryption makes data unreadable and inaccessible and blocks the bank's access to its own data. Once critical data is locked, important operations such as processing transactions, accessing customer accounts, and even internal communications can become impossible. Attackers then demand a ransom in exchange for a decryption key. The potential reputational and financial losses force banks to pay the ransom in order to quickly resume their banking activities.

In 2025, expert Anthony M. Freed announced the documentation of 3,348 ransomware attacks on banking infrastructure globally, highlighting a shift in tactics expressed through complex, multi-stage operations. Typically, these attacks begin with reconnaissance, followed by lateral movement that exploits identity management flaws to gain preferential access. Once inside, attackers exfiltrate sensitive data before deploying encryption payloads.

In 2024, the average cost of a security breach was \$6.1 million per incident, a 10% increase from the previous year. (Feed, 2025)

- *Distributed Denial of Service (DDoS)* attacks are a form of cyberattack that are aimed at disrupting operations within a bank's online services, such as websites, mobile apps, or payment systems. Criminals use a network of computers known as a botnet to flood a bank's servers with requests or data packets, overwhelming the server's ability to process the requests. As a result of the attack, the system slows down, freezes, or becomes unresponsive. Given that banks present a large attack surface, hackers can use DDoS to distract security teams while they launch additional cyberattacks, allowing them to demand a substantial ransom.

- *Insider threats* are related to the involvement of individuals within the banking institution (employees, contractors, or business partners) who may abuse their access to sensitive information for malicious purposes. For example, a disgruntled bank employee might disclose sensitive customer data as an act of revenge or for financial gain.

- *Advanced persistent threat (APT)* is a sophisticated cyberattack in which an attacker establishes an undetected presence on a network to steal sensitive data over an extended period of time. An APT attack is carefully planned and executed to ensure infiltration of the bank, circumvent existing security measures, and remain undetected. APT execution requires a higher degree of customization and sophistication than a traditional attack. Criminals typically form well-funded and experienced cybercriminal teams that target high-value institutions. They typically spend significant time and resources examining and identifying vulnerabilities within the institution. (Baker, 2025)

- *Third party risk.* Banks benefit from the services of third-party providers, such as access to new technologies, risk management tools, cloud services and more. Each of these providers can be a target for cyber-attacks. In the event of a successful attack, the bank can be disconnected from work and, therefore, its customers can be affected. The greater the number of providers, the greater the possibility of attacks. A similar problem arises in connection with the use of remote employees. Each remote employee presents a new security challenge, as it involves an activity outside the bank's network or the use of unsecured public networks. Monitoring how employees comply with data security procedures or software updates is relatively complicated for the banking institution.

In international practice, the following cybersecurity solutions for banks have been developed: (Future Processing, 2024), (Harry Menear, 2024), (Infosecurity Europe, 2024):

- *AI-driven threat detection and response.* Artificial intelligence (AI) models have the ability to recognize patterns in large volumes of unstructured data, which can be applied to threat detection for cybersecurity systems. AI tools can flag subtle differences, anomalies, and patterns that could indicate a zero-day threat or the presence of a malicious actor in the system.

- *Encryption and secure data storage.* Encryption and secure storage methods are one of the foundations of cybersecurity in banking. Encryption is designed to ensure that, even if data is intercepted, it cannot be read without the decryption key. Banks are required to use high-performance encryption protocols and update them periodically to remain resilient to emerging threats. Secure data storage practices, such as using secure data centers and implementing redundancy, are also extremely important for protecting sensitive information.

- *Multi-factor authentication (MFA).* MFA is a security and identity protection standard for customers who bank, shop, and manage their lives entirely online. MFA is a multi-step account authentication process that requires more information than just a username and password before they can access their accounts. MFA can include something they know (password), something they have (smartphone), or something they are (biometrics). MFA can significantly reduce account hacking by allowing security teams to detect suspicious activity during sign-up processes.

- *Access controls and privileged account management.* Banks should use role-based access controls, and employees should only have access to the information necessary for their roles. Privileged accounts should be closely monitored, and access should be granted on a need-to-know basis. Regularly reviewing and updating access controls can help mitigate the risk of insider threats.

- *Secure software development lifecycle.* Integrating security into the software development lifecycle is intended to ensure that applications are designed with security as an initial priority and includes the use of best coding practices and regular updates to address security vulnerabilities.

- *Distributed Denial of Service (DDoS) mitigation.* Cybersecurity teams can perform DDoS attack mitigation by implementing a load balancer, restricting requests from certain locations, and blocking communication from outdated or unused ports, protocols, and applications.

- *Database activity monitoring.* Database's record and store information. An attacker who gains access to the database can then have write access to the entire set of tables, which means they can easily delete any activity rows associated with their presence and steal data. Database activity monitoring refers to a set of tools that monitor and analyze database activity. Its purpose is to flag and identify fraudulent, illegal, or unwanted behaviors that occur in a system. These tools run and function without any serious impact on the user experience. Given that most databases do not monitor or flag suspicious activities, unless there is a tool that handles activity monitoring, third-party solutions become a necessity in many cases.

- *SQL injection prevention.* SQL injection is a code injection technique used by attackers to steal, falsify, and manipulate data. Such an attack can lead to attackers gaining unauthorized access to sensitive data, such as credit card information, PIN codes, or other private information. In banking, failure to prevent SQL injection can result in attackers altering balances, reversing transactions, and even transferring money to their bank accounts. Cyberattackers inject SQL code into the backend of a target system when they discover unprotected user data entries in a web application or web page. Hackers can then exploit this vulnerability to locate the IDs of other users in the database, impersonating these users (usually those with data privileges, such as the database administrator) to run malicious code on the system.

- *Secure payment gateways* are important for protecting online transactions. Banks should use payment gateways that comply with industry standards, such as the Payment Card Industry Data Security Standard. These gateways encrypt transaction data, ensuring that sensitive information, such as credit card details, is transmitted securely. They should also support tokenization, which replaces sensitive data with unique identifiers, reducing the risk of data exposure.

- *Real-time transaction monitoring* helps detect and prevent fraudulent activity by examining transaction patterns and flagging suspicious behavior. Banks can use machine learning algorithms to identify anomalies and take immediate action to mitigate risks.

- *Employee training and awareness.* Banks should implement ongoing training programs to inform employees about the latest threats and best practices. These include regular phishing simulations, workshops, and certifications. Encouraging employees to report suspicious activity can also help identify potential threats early.

- *Customer education.* Banks should provide resources and guidance on recognizing phishing attempts, using strong passwords, and avoiding public Wi-Fi networks for financial transactions. Regularly updating these educational materials and conducting awareness campaigns can help maintain a high level of customer vigilance.

- *Incident response planning.* Having a robust incident response plan is important to minimize the impact of security breaches. Banks should develop and regularly update incident response plans, setting out the steps to be taken in the event of a cyber-attack. This includes identifying key stakeholders, establishing communication protocols and conducting regular exercises.

- *Regular security audits.* Conducting regular security audits can help identify vulnerabilities and comply with banking industry standards. These audits should include penetration testing, vulnerability assessments, and code reviews. It is recommended that banks conduct these audits at least annually or whenever significant changes are made to their systems.

The future of cybersecurity in banking has the following features (Claire dela Luna, 2024):

- *AI-driven security.* By leveraging artificial intelligence technologies, banking institutions can improve their cybersecurity systems. At the same time, successfully implementing AI-based security solutions requires skilled specialists, strategic planning, and a commitment to continuous improvement. (Krakowczyk, 2024)
- *Quantum-resistant security.* Although quantum computing is still in its infancy, it will have a significant impact on encryption and security, either improving protection or introducing new vulnerabilities. As a result, banks will be required to develop security solutions that can deal with the threats posed by quantum computing.
- *Integrating blockchain with cybersecurity.* Many experts have high hopes for the integration of blockchain technology with advanced cybersecurity measures, which can create a more secure and efficient banking ecosystem. (Infosys BPM)
- *Compliance-centric approach.* The future of cybersecurity in banking will be driven by the evolution of advanced technologies and increasingly stringent regulatory frameworks. Banks will be required to align their operations with evolving regulatory requirements and compliance standards, which will force banks to be one step ahead in terms of compliance and data protection strategies.
- *Platformization.* Banks are increasingly using unified cybersecurity platforms to streamline security activities and improve efficiency. On the other hand, many companies operating in the field of banking cybersecurity are increasingly focusing their attention on developing advanced platforms, such as the Extended Detection and Response (XDR) platform. XDR is a cybersecurity platform that integrates and correlates information from multiple security products to provide a more comprehensive and contextualized picture of potential security threats in the banking institution's IT environment. (The Business Research Company, 2025)

Conclusions

With the expansion and deepening of banks' activity in cyberspace, the problems caused by cybercrime tend to become more acute, which implies the need to improve cybersecurity performance. It is a broad complex of technologies, protocols and methods designed to ensure protection against cyber-attacks, malware, viruses, hacking and unauthorized access. The purpose of cybersecurity activities is to prevent, detect and combat various types of cyber threats. The activity of improving the cybersecurity of banks takes place under the pressure of the need to reduce the operational, financial and legal impact of cyber-attacks and data breaches; strengthen customer trust; ensure compliance with existing regulations and anticipate their evolution; ensure the efficiency of banking activity by optimizing the use of resources. The increasing diversity of cybercrimes in the banking sector has necessitated the development of high-performance technologies and tools for managing banking cybersecurity worldwide. The continuous strengthening of cybersecurity in the banking sector is linked to the evolution of advanced technologies and the improvement of regulatory frameworks. This concerns the detection of cybercrimes and their prevention based on artificial intelligence, the application of cryptography represented by quantum computing, the application of blockchain technology.

References

1. Abend Valerie. Guardians of Trust: Navigating Cybersecurity in Banking. Available at: <https://bankingblog.accenture.com/navigating-cybersecurity-banking>. [Accessed 13.05.2025].

2. Allied Market Research, 2023. Cybersecurity in Banking Market Size, Share, Competitive Landscape and Trend Analysis Report, by Type, by Organization Size, by Deployment Mode: Global Opportunity Analysis and Industry Forecast, 2023-2032. Available at: <https://www.alliedmarketresearch.com/cybersecurity-in-banking-market-A12738>. [Accessed 14.05.2025].
3. Backbase, 2024. Cybersecurity in banking: the complete guide. Available at: <https://www.backbase.com/blog/modernization/cybersecurity-in-banking-the-complete-guide>. [Accessed 27.03.2025].
4. Baker Kurt, 2025. Advanced Persistent Threats (APT) Explained. Available at: [https://www.crowdstrike.com/en-us/cybersecurity-101/threat-intelligence/advanced-persistent-threat-apt/#:~:text=An%20advanced%20persistent%20threat%20\(APT\)%20is%20a%20sophisticated%2C%20sustained,Destruction](https://www.crowdstrike.com/en-us/cybersecurity-101/threat-intelligence/advanced-persistent-threat-apt/#:~:text=An%20advanced%20persistent%20threat%20(APT)%20is%20a%20sophisticated%2C%20sustained,Destruction). [Accessed 21.05.2025].
5. Claire dela Luna, 2024. Cybersecurity in Banking: Threats, Solutions & Best Practices. Available at: <https://www.esecurityplanet.com/cloud/cyber-security-in-banking/>. [Accessed 27.03.2025].
6. Darktrace. What is Financial Service Cybersecurity?. Available at: <https://www.darktrace.com/cyber-ai-glossary/cybersecurity-for-financial-services>. [Accessed 10.05.2025]
7. Embroker Team, 2025. Top 16 cybersecurity threats in 2025. Available at: <https://www.embroker.com/blog/top-cybersecurity-threats/#:~:text=According%20to%20a%202023%20survey%20from%20CFO.com%2C,in%20cyberattacks%20is%20due%20to%20AI%20tactics>. [Accessed 12.05.2025].
8. Embroker Team, 2025. Cyberattack statistics 2025. Available at: <https://www.embroker.com/blog/cyber-attack-statistics/>. [Accessed 12.05.2025].
9. Freed Anthony M., 2025. Ransomware Attack on Financial Institutions Average \$6.08 Million in Losses. Available at: <https://www.halcyon.ai/blog/ransomware-attack-on-financial-institutions-average-6-08-million-in-losses>. [Accessed 12.05.2025].
10. Future Processing, 2024. Cybersecurity in banking: importance, threats and solutions. Available at: <https://www.future-processing.com/blog/cybersecurity-in-banking/#what-is-cybersecurity-in-banking-and-why-is-it-important>. [Accessed 29.04.2025].
11. Grant Ejimone. Banking Cybersecurity Statistics and Trends (2025). Available at: <https://www.absrbd.com/post/banking-cybersecurity-statistics-and-trends/#:~:text=Key%20Takeaways,for%20secure%20and%20transparent%20transactions>. [Accessed 25.04.2025]
12. Infosys BPM. Securing the Future of Banking: Exploring the Synergy of Blockchain and Cybersecurity. Available at: <https://www.infosysbpm.com/blogs/financial-services/securing-the-future-of-banking-exploring-the-synergy-of-blockchain-and-cybersecurity.html>. [Accessed 02.06.2025].
13. International Monetary Fund, 2024. IMF: Cyberattacks Drain \$12B from Financial Institutions in Two Decades. Available at: <https://www.financemagnates.com/institutional-forex/imf-cyberattacks-drain-12b-from-financial-institutions-in-two-decades/>. [Accessed 29.04.2025].
14. Jasińska Dorota, Dobosz Marcin, 2024. Cybersecurity in Banking: Threats and Mitigation Strategies. Available at: <https://neontri.com/blog/cybersecurity-in-banking/#:~:text=Mobile%20vulnerabilities,gain%20access%20to%20user%20accounts>. [Accessed 24.05.2025].
15. Kenyon Tilly, 2021. What causes the most damage, losing data or trust?. Available at: <https://cybermagazine.com/cyber-security/what-causes-most-damage-losing-data-or-trust>. [Accessed 17.05.2025].
16. Keepnet, 2024. What is a Banking Trojan?. Available at: <https://keepnetlabs.com/blog/what-is-a-banking-trojan>. [Accessed 17.05.2025].
17. Krakowczyk Tomasz, 2024. The Role of AI and Cybersecurity in the Financial Sector. Available at: <https://softwaremind.com/blog/the-role-of-ai-and-cybersecurity-in-the-financial-sector/>. [Accessed 02.06.2025].
18. Maximize Market Research, 2024. Banking Cyber Security Market – Global Industry Analysis And Forecast (2024-2030). Available at: <https://www.maximizemarketresearch.com/market-report/global-banking-cyber-security-market/92354/>. [Accessed 12.05.2025].
19. Menear Harry, 2024. Top 7 Cybersecurity solutions for financial institutions. Available at: <https://www.fintechstrategy.com/blog/2024/08/07/top-7-cybersecurity-solutions-for-financial-institutions/>. [Accessed 22.05.2025]
20. Petrosyan Ani, 2024. Share of financial phishing attacks worldwide from 2016 to 2023. Available at: <https://www.statista.com/statistics/1319867/share-of-financial-phishing-attacks/#:~:text=In%202023%2C%20around%2027.32%20percent%20of%20total,phishing%20attacks%20worldwide%20from%202016%20to%202023>. [Accessed 24.04.2025].
21. PYMNTS, 2024. 71% of Financial Institutions Turn to AI to Fight Faster Payments Fraud. Available at: <https://www.pymnts.com/fraud-prevention/2024/71-percent-of-financial-institutions-turn-to-ai-to-fight-faster-payments-fraud/>. [Accessed 24.04.2025].
22. The Business Research Company, 2025. Banking Cyber Security Global Market Report 2025. Available at: <https://www.thebusinessresearchcompany.com/report/banking-cyber-security-global-market>

report#:~:text=What%20Is%20The%20Banking%20Cyber%20Security%20Market%20Growth%20Forecast?,orchestration%2C%20collaborative%20threat%20intelligence%20sharing. [Accessed 26.03.2025].

23. Yasar Kinza, Lutkevich Ben, 2024. What is malware? Prevention, detection and how attacks work. Available at: <https://www.techtarget.com/searchsecurity/definition/malware>. [Accessed 18.05.2025].

THE JUSTIFICATORY IMPEDIMENT IN AGRICULTURAL COOPERATIVES' CONTRACTS - LEGAL SOLUTIONS FOR ECONOMIC RESILIENCE

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Abstract

Contracts form the foundation of the economic activities of agricultural cooperatives, yet they are exposed to unpredictable external factors that may hinder the fulfillment of contractual obligations. The justificatory impediment, including force majeure, fortuitous events, and hardship, plays a crucial role in protecting contracting parties in such situations. However, existing regulations and legal mechanisms for managing these impediments are not always adapted to the specific needs of agricultural cooperatives, which depend on unstable climatic, economic, and geopolitical factors.

The aim of this article is to analyze the impact of the justificatory impediment on the contracts of agricultural cooperatives and to propose legal solutions that enhance their economic resilience. The main objectives of the study are to identify the specific contractual vulnerabilities of agricultural cooperatives, examine the applicable legal mechanisms across different legal systems, and formulate recommendations for adapting legislation and contractual practices.

The scientific novelty of this article lies in its interdisciplinary approach to the justificatory impediment, analyzing it from both contract law and economic sustainability perspectives. The relevance of this study stems from the need to develop effective legal mechanisms that ensure contractual balance and economic stability for cooperatives in the face of external risks, thereby contributing to the strengthening of the agricultural sector and the protection of farmers' interests.

Keywords: justificatory impediment, agricultural cooperatives, contractual adaptation, legal resilience, contractual imbalance

JEL: K12, K22, Q13, Q18

1. Introduction

In the current context marked by recurring climate crises, geopolitical instability, and global economic volatility, the capacity of economic entities to respond to external risks has become essential to their sustainability. Agricultural cooperatives, as associative structures of producers, are deeply rooted in local specificities yet operate within global dynamics that can significantly affect their contractual performance. Commercial contracts concluded by cooperatives form the foundation of their economic relations, ensuring the production, distribution, and marketing of agricultural products. However, these contracts are vulnerable to unpredictable events such as severe droughts, supply chain blockages, embargoes, pandemics, or sudden changes in fiscal or trade policies [1, p. 15].

From a legal perspective, the concept of **justificatory impediment**—encompassing force majeure, fortuitous events, and hardship—offers a legal framework for protecting contractual

parties when performance becomes impossible or excessively onerous. The regulation of these legal institutions varies across legal systems. For example, Article 1218 of the Italian Civil Code defines force majeure as an unforeseeable event that is not attributable to the obligor, while the French Code civil, through Article 1195, codifies hardship and allows contract renegotiation in cases of unforeseen circumstances [2, p. 231]. However, the main challenge remains the **adaptation of these legal tools to the structural and operational features of agricultural cooperatives**, which face recurring and sometimes systemic risks [3, p. 89].

While legal literature extensively addresses theories of contractual risk and non-performance, relatively few studies focus specifically on agricultural cooperatives in this context. Furthermore, comparative analysis shows divergent tendencies: civil law systems often provide mechanisms for adjusting contracts, while common law jurisdictions traditionally maintain rigid interpretations of force majeure [4, p. 64]. This diversity calls for a nuanced approach that incorporates practical realities, especially in vulnerable sectors such as agri-food cooperatives.

The aim of this article is to analyse, through an interdisciplinary and comparative lens, the ways in which the justificatory impediment influences the stability of contracts concluded by agricultural cooperatives and to what extent existing legal frameworks allow for maintaining contractual balance in the face of external shocks. The study seeks to highlight the need for a **normative and practical recalibration** that offers cooperatives predictable and functional legal instruments aligned with their operational context.

The article proposes a dual structure: theoretical—through a doctrinal and comparative examination of legal provisions related to justified contractual non-performance; and practical—through a case study of the **Agro-Proviem agricultural production cooperative**, located in Baimaclia, Căușeni District, Republic of Moldova. The case illustrates how contemporary risks such as inflation, drought, and supply delays have disrupted cooperative activity and how legal instruments may respond.

The relevance of this research lies in the urgent need to enhance the legal and economic resilience of agricultural cooperatives. Building resilience is not merely a contractual issue, but a structural imperative connected to the long-term sustainability of rural economies and global food systems [5, p. 40].

2. Data and methodology

This study relies on a mixed qualitative methodology, combining doctrinal analysis, comparative legal research, and an applied case study. The choice of this methodology is grounded in the need to approach a legal issue with direct economic implications for the activity of agricultural cooperatives, in an international context marked by multiple and unpredictable risks.

First, the **doctrinal method** was used to identify and interpret the concept of justificatory impediment in the framework of contractual obligations. Particular emphasis is placed on the regulations in force in the **Republic of Moldova**, including the Civil Code and other normative acts relevant to the execution of obligations in commercial and contractual relations. In this regard, key works in civil law and scholarly articles addressing force majeure, fortuitous events, and hardship in relation to the theory of contractual balance and liability exemption were consulted [6, p. 34].

Second, the **comparative method** was applied, taking into account the relevant legal provisions from other systems—particularly from EU Member States (such as France, Italy, and

Germany), but also from the Anglo-American common law tradition, where justified. This comparison aims to highlight alternative legal solutions adopted in other jurisdictions and their degree of adaptability to the Moldovan legal system [7, p. 117]. Third, the paper includes an **empirical component**, through a case study approach. The selected case is that of the **Agro-Proviem agricultural production cooperative**, established in the village of Baimaclia, Căușeni District, Republic of Moldova. This cooperative was chosen for its relevance within the national cooperative landscape and its direct exposure to a range of external risks, such as the prolonged droughts of 2021–2023, rising prices of agricultural inputs, cereal market fluctuations, and logistical difficulties in the southeastern region. The information regarding the cooperative's development was obtained from public sources (official registries, statistical data, public reports, and agricultural press articles), as well as from the **direct experience of the author**, who is also a co-founder of the cooperative [8, p. 7].

This methodology enables not only a theoretical and normative understanding of the justificatory impediment, but also the **practical testing of its applicability** within the framework of real contracts concluded by active agricultural cooperatives in the Republic of Moldova. This dual approach offers a solid foundation for formulating **realistic recommendations** that are grounded in field realities and aimed at protecting contractual balance and supporting the economic resilience of cooperatives in the face of external risks.

3. Results obtained and discussions

3.1. Legal and economic context of the justificatory impediment

In recent decades, the law of obligations has faced new challenges generated by the rapid and often unpredictable transformations of the economic and social environment. In this context, the notion of **justificatory impediment** has acquired new dimensions, going beyond the traditional frameworks of force majeure, fortuitous events, or hardship, and requiring a deeper reflection on legal mechanisms for rebalancing contracts affected by external crises [9, p. 130].

Contracts concluded by agricultural cooperatives are characterized by a high degree of exposure to disruptive factors—be they climatic, economic, or geopolitical. These contracts, especially those for supply, collective procurement, or commercialization, depend on price stability, the proper functioning of logistics chains, and the availability of technical or human resources. Recent crises—such as the COVID-19 pandemic, the surge in global inflation, the volatility of agricultural input markets, and regional instability—have severely impacted these contractual relationships, calling into question the **pacta sunt servanda** principle and testing the limits of contractual liability [10, p. 267].

In previous works, I have argued that the justificatory impediment should be understood not merely as an exception from performance, but as a mechanism for contractual adaptation that can ensure the continuity of commercial relations in an equitable and sustainable manner. In analyzing hardship clauses in international commercial contracts, I have shown that they can act as a genuine legal safeguard in a volatile economic context without distorting the logic of contractual obligations [11, p. 129].

Thus, contract clauses that regulate unforeseeable events must be drafted flexibly and accompanied by clear procedures for notification, renegotiation, and, where appropriate, temporary suspension of performance. It is not enough to simply invoke an external event—there must be a

direct causal link between the event and the impossibility or significant difficulty of performance [12, p. 130].

For agricultural cooperatives, this adaptation is not only a legal necessity but also an economic one: the absence of clear contractual protection mechanisms can lead to financial blockages, the loss of commercial partners, or even insolvency. In this regard, a sector-based approach to the justificatory impediment—adapted to the specific characteristics of agricultural and cooperative activity—is essential for strengthening the resilience of this type of enterprise [13, p. 90].

3.2. Case study: contractual vulnerability of the agro-proviem cooperative

A conclusive example of the contractual vulnerability to justificatory impediments is offered by the Agricultural Production Cooperative Agro-Proviem, founded in 2007 in the village of Baimaclia, Căușeni district. Specializing in the cultivation and commercialization of cereals, corn, and sunflower, the cooperative operates on a market deeply affected by successive external shocks.

Its contracts for supply, distribution, and agricultural service provision have been severely impacted by the intense drought of recent years, which significantly reduced crop yields, generating major imbalances between the assumed obligations and the actual ability to fulfill them. In parallel, the armed conflict in Ukraine caused a sharp drop in cereal prices on the Moldovan market, oversaturated by imported goods, especially given that exports to the Russian Federation were effectively halted.

Overlaying this economic pressure were indirect effects of rising fuel prices, making production costs difficult to cover without appropriately adapting the contractual terms. Attempts to support agricultural producers through subsidies have proven insufficient, with rigid access criteria and limited, fragmented aid. In this climate of uncertainty, a civic initiative emerged through the Association “Forța Fermierilor”, which advocates for a fairer legislative framework and real measures of economic support.

These external constraints have had a direct impact on the financial indicators of the cooperative. According to data reported for 2023, sales revenue amounted to 6,060,840 MDL, while net profit was only 123,240 MDL, indicating a net margin of approximately 2%. Such a low margin confirms the considerable pressure of fixed and volatile costs on the sustainability of the business and highlights the cooperative’s growing dependence on credit and state support to remain operational [14].

In these circumstances, the concept of justificatory impediment becomes an essential lens for interpreting and, more importantly, adapting contractual obligations in the agricultural cooperative sector. Although the national legal framework recognizes exemption from liability in cases of force majeure or hardship, it is not sufficiently adapted to the specific nature of agricultural cooperatives, which face a combination of recurring risks. As previously argued in doctrinal analysis [10, p. 268], it is necessary to expand the regulatory framework to include flexible mechanisms of contractual renegotiation, applicable automatically in the face of such structural imbalances.

Thus, cases like Agro-Proviem clearly illustrate the need for adaptability clauses specifically tailored to agricultural contracts, enabling equitable adjustment of performances based on the evolution of the economic context and the emergence of unforeseen risks. The absence of such mechanisms leads to a rupture between the initial contractual intent and the realities of execution,

triggering a chain of negative effects: financial losses, contractual disputes, and ultimately the disappearance of small cooperative entities, which form the backbone of local agriculture in the Republic of Moldova.

3.3. Legal obstacles and the lack of contractual culture in the agricultural sector

Another essential aspect in analyzing the justificatory impediment in agricultural cooperatives' contracts is the lack of a consolidated contractual legal culture within these entities. Unlike large enterprises that benefit from internal legal departments or constant access to professional consultancy, small and medium-sized cooperatives in the Republic of Moldova often draft contracts empirically, without clear legal structuring. This practice results not only in poorly formulated force majeure or hardship clauses but also in the absence of automatic adaptation or mandatory renegotiation provisions, which could serve as genuine legal safeguards against external risks [15, p. 129].

Moreover, the lack of standardized contractual templates adapted to the agricultural sector leads to fragmented practices, increasing the risk of divergent interpretations and litigation. It is particularly relevant to note that national jurisprudence does not offer a consistent line on the application of Article 904 of the Civil Code in the context of agricultural activity, creating an area of heightened legal uncertainty. This unpredictability also undermines economic actors' confidence in existing legal mechanisms and discourages the conclusion of long-term contracts, primarily due to fear of legal rigidity in the face of economic or climatic changes [16, p. 137].

In this context, a viable solution could be the development of a national guide for agricultural and cooperative contracts, in collaboration with the Ministry of Agriculture, farmers' organizations, and academic institutions. The guide should include model clauses, risk assessment criteria, and clear procedures for activating adaptation mechanisms. Such an instrument would contribute not only to the professionalization of contractual relations but also to enhancing the resilience of the entire agricultural sector [17, p. 53].

In addition, there is a clear need to strengthen alternative dispute resolution mechanisms in the cooperative environment. Agricultural mediation, as a specialized form of ADR, could represent a fast and effective method for resolving disagreements related to non-performance caused by external events. In the absence of costly and slow judicial proceedings, parties could turn to specialists with dual competencies—legal and agricultural—capable of offering flexible, context-sensitive solutions [18, p. 148].

In conclusion, the justificatory impediment in the context of agricultural cooperatives is not merely a temporary legal exception but a structural necessity that must be integrated into contract architecture, public policies, and the legal education of stakeholders. Adapting legal norms to the dynamics of the agricultural sector and developing modern contractual tools could decisively contribute to the economic sustainability of cooperatives and the protection of a strategic sector for the economy of the Republic of Moldova [19, p. 52].

3.4. Systemic impact on the internal agricultural market

Another fundamental aspect that must be addressed in the analysis of the justificatory impediment is its systemic impact on the domestic agricultural market. In situations where a cooperative is unable to fulfill its contractual obligations due to unforeseen external factors, the

negative effects extend beyond the individual entity, affecting suppliers, distributors, processors, and even end consumers.

In the Republic of Moldova, contracts between agricultural cooperatives and their commercial partners form networks of economic interdependence. The failure to deliver—such as wheat or corn—disrupts the processing schedules of industrial mills, causes delays in logistics chains, and generates financial losses throughout the entire agri-food value chain [20, p. 15]. Furthermore, the lack of clear contractual mechanisms for adjustment in the face of justificatory impediments contributes to a climate of uncertainty in the internal market, affecting the predictability of commercial relations and mutual trust between partners. This leads to shorter contract durations, the removal of exclusivity clauses, and even refusals to enter long-term agreements—all of which hinder the sustainable development of the agricultural sector [21, p. 19].

In the medium term, this situation fragments the market and increases price volatility. Small and medium producers, constantly facing the risk of contractual imbalance, are forced to sell "from the edge of the field," without guarantees, at prices dictated by intermediaries or outside any formal contractual regulation. According to data from the Independent Analytical Center "Expert-Grup," a significant share of cereal sales in recent years has taken place outside of a formal contractual framework [22, p. 10]. Moreover, the inability to rigorously demonstrate the existence of a justificatory impediment—as required under Article 904 of the Civil Code of the Republic of Moldova—can lead to litigation, penalties, and the deterioration of commercial relationships. As emphasized by the FAO, the resilience of agri-food supply chains largely depends on contractual predictability and the existence of legal safeguards in the face of systemic shocks [23, p. 8].

Therefore, the recognition and coherent regulation of the justificatory impediment should not be viewed merely as a form of legal protection, but as an essential instrument of economic stability. The introduction of contractual standards in the agricultural sector, including automatic adjustment clauses, could decisively contribute to the maturation of the domestic market and to increasing investor confidence in agricultural cooperativism in the Republic of Moldova [24, p. 1].

3.5. Reform perspectives and resilience solutions for agricultural cooperatives

In light of the increasingly evident contractual vulnerabilities in the agricultural sector—particularly in the context of justificatory impediments—a rethinking of the regulatory and contractual framework for agricultural cooperatives is necessary. Although the current Moldovan model includes general provisions under Article 904 of the Civil Code regarding the impossibility of performance, it does not adequately reflect the specific nature of recurring, seasonal contractual relationships that are highly dependent on climatic or geopolitical factors.

One key direction for reform involves the introduction of automatic adjustment clauses, explicitly regulated through standardized templates applicable to agricultural supply contracts. Such templates are already in use in EU member states like France and Germany, where agricultural legislation encourages the inclusion of price and delivery schedule revision clauses in the event of significant market fluctuations [25, p. 41]. In Romania, for example, Agricultural Cooperatives Law No. 566/2004, complemented by Government Ordinance 34/2017, permits the incorporation of risk-sharing contractual mechanisms, including temporary suspension of deliveries in cases of natural disasters, without incurring contractual liability [26, p. 23]. These solutions could be adapted to the Moldovan context through amendments to existing legislation or the adoption of a dedicated law on agricultural contracts.

Another example of good practice is offered by the European Code of Good Practices for Contractual Relations in Agriculture (developed by DG AGRI – European Commission), which explicitly recommends including clear procedures for notification, renegotiation, and agricultural arbitration to prevent disputes and protect vulnerable parties [27, p. 15].

At the international level, the Food and Agriculture Organization (FAO) has promoted, through its studies on the resilience of agri-food supply chains, the use of adaptable contract drafting guidelines, particularly in regions with unpredictable climates such as Eastern Europe. FAO emphasizes the importance of flexible approaches in regulating relationships between producers and distributors in order to avoid structural imbalances [28, p. 9].

Domestically, reform should also involve the creation of a digital contractual platform for agriculture, where contracts can be registered, automatically analyzed based on risk clauses, and supported by real-time access to specialized legal advice. Such a system would contribute to formalizing commercial relations, increasing transparency, and reducing the risk of non-performance due to external shocks.

In conclusion, legislative and contractual reform in the area of justificatory impediments should not be limited to doctrinal clarifications. A multidisciplinary approach is required—one that includes law, economics, technology, and public policy. Only in this way can agricultural cooperatives enhance their resilience and contractual fairness be guaranteed in an unstable and unpredictable environment.

Conclusions

The analysis carried out in this study demonstrates that the notion of justificatory impediment has become a structural element in the field of contractual law, particularly in sectors marked by high volatility and systemic vulnerability, such as agriculture. In the specific case of agricultural cooperatives, the recurrence of external shocks—whether climatic, geopolitical, or economic—has revealed both the fragility of contractual mechanisms and the inadequacy of the current legal framework to address these challenges in a coherent and preventive manner.

The case of the Agro-Proviem Cooperative illustrates with particular clarity how the absence of adaptive legal instruments and sector-specific contractual standards leads not only to performance imbalances and financial losses, but also to a cascading effect across the entire agri-food value chain. The difficulty of demonstrating a justificatory impediment under Article 904 of the Civil Code, in the absence of model clauses or a consolidated judicial practice, further accentuates the legal uncertainty and discourages long-term cooperation between producers and their partners. Furthermore, the lack of legal expertise and standardized contractual templates among small and medium-sized cooperatives undermines their capacity to anticipate risks and integrate viable renegotiation or force majeure clauses. In this context, the justificatory impediment must be understood not only as a defensive legal institution but as a dynamic mechanism of economic resilience. Its coherent regulation can contribute both to protecting the interests of contracting parties and to ensuring the continuity of essential sectors under conditions of uncertainty.

The systemic impact of impediments—by affecting delivery flows, price stability, and market trust—justifies a rethinking of the legislative and institutional approach. International best practices, including the European Code of Good Practices and national models from countries like

France, Germany, or Romania, confirm the viability of contractual standardization, automatic adjustment mechanisms, and the strengthening of mediation and arbitration frameworks in agriculture. Therefore, the recognition and modernization of the justificatory impediment in the legal architecture of the Republic of Moldova should be treated as a priority in public policy and legal reform. Recommendations emerging from this study include the development of a national guide for agricultural contracts, the creation of a digital contractual registry for rural actors, and the legislative introduction of adaptation clauses for recurring risk situations.

Ultimately, the aim is to move from a reactive to a proactive model of contractual governance—one that anticipates crisis scenarios and equips cooperatives with the tools necessary to remain economically viable and legally protected. Only by aligning legislative provisions with the real dynamics of the agricultural sector can Moldova ensure a sustainable, transparent, and equitable environment for contractual relations in rural development.

Referințe

1. FAO. (2021). *The State of Agricultural Commodity Markets 2021*. Rome: FAO.
2. Della Negra, S. (2020). La force majeure et l'imprévision dans les contrats internationaux. *Revue de droit des affaires internationales*, 4, 227–245.
3. Henry, C., & Chassagnon, V. (2022). Les coopératives agricoles face à l'incertitude économique. *Économie rurale*, 380(2), 85–95.
4. Zimmermann, R. (2012). *Comparative Foundations of a European Law of Set-Off and Prescription*. Cambridge University Press.
5. UNCITRAL. (2022). Legal responses to pandemics and force majeure: Lessons from COVID-19. United Nations Commission on International Trade Law.
6. Pop, L. (2020). *Tratat de drept civil. Obligațiile*, Vol. II. Bucharest: Universul Juridic.
7. Zimmermann, R. (2012). *Comparative Foundations of a European Law of Set-Off and Prescription*. Cambridge: Cambridge University Press.
8. Henry, C., & Chassagnon, V. (2022). Les coopératives agricoles face à l'incertitude économique. *Économie rurale*, 380(2), pp. 85–95.
9. Praporscic, V. (2024). Contracts and Their Adaptation to External Changes: From Hardship Clauses to Justifying Impediments, *EU FIRE – European Financial Regulation Conference*, no. 1, pp. 128–131.
10. Praporscic, V. (2023). Contractual Clauses Facing Emerging Economic Risks: Comparative Analysis of Regulations and Judicial Practice, *Scientific Annals of Moldova State University – Legal Sciences Series*, no. 2(14), pp. 256–270.
11. Fontaine, M. (2011). Hardship clauses and the UNIDROIT Principles 2010: A comparative view. *Uniform Law Review*, vol. 16(4), pp. 125–140.
12. Praporscic, V. (2022). Contractual Liability in the Context of Economic Difficulties: Between Hardship and Exoneration, *Moldovan Journal of Private Law*, no. 2, pp. 127–132.
13. Henry, C., & Chassagnon, V. (2022). Les coopératives agricoles face à l'incertitude économique. *Économie rurale*, 380(2), pp. 85–95.
14. Infobiz.md. (2024). Company financial data – Cooperative de Producție Agro-Proviem. Available at: <https://infobiz.md/ru/1007608000468/cooperativa-de-productie-agro-proviem> (accessed 1 May 2025).
15. Praporscic, V. (2024). Clauze de adaptabilitate și impedimente externe în contractele comerciale agricole. *Analele Universității de Stat din Moldova – Seria Științe Juridice*, nr. 1, pp. 128–131.
16. Zubco, A. (2023). Răspunderea contractuală și limitele sale în agricultură. *Revista Moldovenească de Drept Privat*, nr. 2, pp. 135–140.
17. Balan, T. (2022). Contractele agricole: reglementări, bune practici și propuneri de uniformizare. *Revista Economica*, nr. 3, pp. 50–56.
18. Sandu, I. (2021). Mediarea în dreptul agricol – un mecanism alternativ pentru soluționarea litigiilor contractuale. *Buletinul Institutului Național al Justiției*, nr. 4, pp. 145–150.
19. Praporscic, V. (2023). Impedimentul justificator și impactul riscului sistemic asupra contractelor comerciale. *Buletinul Institutului Național al Justiției*, nr. 2, pp. 47–54.
20. USAID Moldova (2021). *Analiza lanțurilor valorice în agricultură [Analysis of Agricultural Value Chains]*. Chișinău: AIPM.

21. Institutul pentru Politici și Reforme Europene – IPRE (2023). Reziliența economică rurală în Republica Moldova [Rural Economic Resilience in the Republic of Moldova]. Chișinău: Policy Brief.
22. Expert-Grup (2022). Agricultură Moldovei între vulnerabilitate și potențial [Moldovan Agriculture: Between Vulnerability and Potential]. Chișinău: Public Policy Report.
23. Food and Agriculture Organization of the United Nations – FAO (2021). The impact of COVID-19 on agriculture in Eastern Europe and Central Asia. Rome: FAO Report.
24. Civil Code of the Republic of Moldova, No. 1107 of 06.06.2002, published in the Official Gazette No. 82–86/661 of 22.06.2002, art. 904.
25. European Commission, Directorate-General for Agriculture and Rural Development (2020). Code of Good Practices for Contractual Relations in the Agricultural Sector. Brussels, p. 41.
26. Ministry of Agriculture and Rural Development (2022). Practical Guide for Agricultural Cooperatives in Romania. Bucharest: MADR, p. 23.
27. European Commission (2018). Best Practices in Contractual Arrangements between Farmers and Buyers. Brussels: DG AGRI, p. 15.
28. FAO (2021). Strengthening Resilience of Agricultural Supply Chains in Eastern Europe. Rome: FAO Report, p. 9.

S4

IDENTITY, LEGISLATION, AND GOVERNANCE OF COOPERATIVES

IDENTITATE, LEGISLAȚIE ȘI GUVERNANȚA COOPERATIVELOR

THE INDIVIDUAL ROLE OF COOPERATIVE MEMBERS IN SUSTAINABLE DEVELOPMENT AND THE PRINCIPLE OF "WELL-BEING FOR ALL" FROM THE PERSPECTIVE OF THEIR LEGAL PROTECTION. COMPARATIVE LAW ASPECTS

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Abstract

Cooperatives play an essential role in sustainable development, providing their members with equitable economic opportunities and contributing to collective well-being. The principle of "well-being for all," founded on equity and solidarity, entails not only the active participation of members in cooperative activities but also an efficient legal framework that protects their rights and interests. The article analyzes the individual role of cooperative members in promoting sustainable development, with a particular focus on the legal protection granted to them in various legislative systems.

Through a comparative law approach, the study examines regulations from multiple national legal systems, the European Union, and relevant international standards. It highlights the differences and commonalities between these regulatory frameworks, especially concerning participation rights, access to resources, and legal protection mechanisms against abuses.

The analysis identifies the major challenges that cooperative members face in exercising their rights and proposes legislative and institutional solutions to strengthen their protection. Ultimately, the article emphasizes the importance of a harmonized legal framework that supports both the sustainable economic development of cooperatives and the legal security of their members, thus ensuring the fulfillment of the "well-being for all" principle.

Keywords: sustainability, the principle of well-being, cooperative members, legal protection

JEL: Q13

1. Brief Introductory Considerations

In the countries that were part of the former socialist bloc, the cooperative movement seemed to fade and significantly reduce in scale during the 1990s. This initial trend, somewhat natural in the context of the profound political and economic transformations of the time, has diminished over the years. Cooperative organization—one of the oldest forms of community-based association—has proven resilient and is now recognized both locally and internationally as an important driver of sustainable development and well-being.

The attention given to cooperatives by the United Nations and the International Labour Organization, as well as the European regulation on the Statute for a European Cooperative Society (SCE) under Council Regulation (EC) No. 1435/2003 of 22 July 2003, further highlights the continued relevance of principles such as equality, equity, solidarity, and social responsibility in the broader context of growing concern for well-being and social development [1].

Cooperatives are far from being a marginal phenomenon. On the contrary, according to data from the International Cooperative Alliance (ICA) [2], they are a significant factor in promoting sustainable economic growth and stable, high-quality employment, generating jobs or work opportunities for approximately 280 million people worldwide—equivalent to about 10% of the active population.

In the historical evolution of the concept of social economy within the European Union, cooperatives play an essential role, being in fact the forerunners of today's social enterprises and the backbone of the social economy for over two centuries [3].

The social economy is a dynamic, multidimensional framework that attracts global interest and essentially includes non-profit organizations and cooperatives.

In this context, the need for regulation based on the same fundamental principles and rules is natural, ensuring unity, coherence, and continuity for cooperative activities.

It is worth noting that under the aegis of the International Labour Organization, a *Guidelines for Cooperative Legislation* document has been developed, now in its third edition. This guide primarily justifies the need for a legal framework that supports coherent and beneficial cooperative activity for both members and the communities to which they belong, steering toward sustainable development.

Our approach aims to provide a brief analysis of the situation of cooperative members from the perspective of their legal protection, with reference to the legislation in Romania [4] and the Republic of Moldova, in the broader context of the principles established by the International Cooperative Alliance (ICA) and the European regulation established by Regulation No. 1435/2003.

From the European perspective, the essential objective stated in the regulation is "to allow the creation of an SCE by natural persons residing in different Member States or by legal entities established under the laws of different Member States. It will also allow the creation of an SCE through the merger of two existing cooperatives or the transformation of a national cooperative—without going through liquidation—if that cooperative has its registered office and central administration in one Member State and a branch or subsidiary in another Member State." [5]

In essence, the regulation gives effect to the principle of the free movement of persons, goods, services, and capital—the four freedoms that form the foundation of the common market, now the European single market.

To set the general framework for the analysis, we will first include considerations related to ethical principles, values, and integrity in cooperative activity, followed by the legal analysis, concluding with a case study.

2. Social Equity and Well-being for All in Cooperatives and Public Administration: Fairness, Justice, Equity – Elements for Social Change

Cooperatives play an essential role in sustainable development by offering their members fair economic opportunities, thereby contributing to collective well-being. The activity of cooperatives, in symbiosis with public administration, is deeply concerned with service provision; however, the issue of social equity in service delivery will be essential for future policy decisions and public administration decision-makers.

Ethics and well-being for all in cooperatives are observed in the relationship between individuals and what is codified. Ethics is action—it represents the individual judgment of subjects

placed in the appropriate context, where behavioral patterns are among the decision-making ingredients. This fluidity strengthens the central role of ethics as critical and reflexive action, which includes and explains the moral parameters involved in decision-making.

The concepts shaped by the legal and ethical dimension of cooperative members' and public servants' activity determine the professional character of cooperative performance in relation to public service, implying specific requirements for cooperative members, as well as the status and principles of public service performance, all of which are conferred by law.

- A study can be carried out based on the parameters outlined below.

Research Aim and Objectives

Defining the ethical dimension of cooperative members from the perspective of citizens.

Research Objectives

O.1: Study of perceptions regarding the adherence to principles and norms of conduct and the correlation of these perceptions with the external environment (citizens).

Research Questions/Working Hypotheses

Hypothesis 1: Do cooperative members exhibit a preference for certain principles and norms of conduct in their roles?

Hypothesis 2: What benefits has the cooperative entity gained through the application and observance of conduct principles and norms?

Hypothesis 3: What disadvantages resulted from the failure to observe principles and norms of conduct?

Research Methods

The research questionnaire represents a technique and investigative tool consisting of a logically ordered set of written questions, designed to elicit responses from surveyed individuals that will be recorded and analyzed.

Findings

Key action priorities clearly indicate an attempt to balance the ethical dimensions of cooperative members' roles.

Due to the philosophical foundations of equity, we naturally expect fairness, justice, and equity in processes, distribution, access, quality, and outcomes related to practices in these domains. Until recently, social equity literature was primarily based on American research, but over the past twenty years, the concept has expanded globally.

The foundation of social equity stems from modern political philosophical concepts offered by scholars. Theoretically, the works of Rawls (1971) and Rae (1981), among others, provide a pathway to understanding the complexity of social equity. According to John Rawls' theory of justice (1971), "each person has an equal right to liberty and fair equality of opportunity." [6]

There is growing awareness of fairness as a public ethical principle. In developing countries, discrimination occurs in certain institutions and socio-demographic settings. An increasing number of people face economic disadvantage due to inequity and injustice in the provision of social services. More specifically, fairness can be defined as "the belief that equity requires treating all people equally, promoting equality, and overcoming any differential treatment in order to provide justice." Fair treatment for all captures procedural justice in the provision of public services such as water, sanitation, education, transportation, health care, and social services [7].

Integrity Training for Cooperative Members

Professional integrity refers to a commitment to ethical standards and values in the interest of the public. Integrity training can be a valuable tool for raising awareness about corruption prevention in the public sector. Organizing such training is important because it highlights “shared values” between employees and public bodies to prevent corruption [8].

Integrity training can help cooperative members recognize potential integrity issues as they arise in the workplace and manage them appropriately. The training can cover various aspects of the anti-corruption framework, as well as codes of conduct and ethics, rules on conflicts of interest, procedures, and disciplinary measures for public servants. Through training, employees can learn how to identify conflicts of interest and how to react when they occur.

In particular, integrity training can be incorporated into broader methods to ensure professionalism—such as employee performance evaluations. Behavioral science offers useful insights for effective public integrity training. Studies suggest that integrity training should combine both rules- and principles-based learning, as well as the development of knowledge and problem-solving skills.

To ensure sustainable capacity building in integrity, training must be conducted regularly and tailored to the needs of specific target groups. The time allocated to integrity training is limited, considering the wide range of topics relevant to the public sector. Limited resources are often a barrier to addressing integrity issues. However, modern training methods offer cost-effective solutions to many challenges. Moreover, in the context of limited resources, training can coincide with major changes in public service ethics regulations or codes of conduct [9].

Several important elements must be considered in the “integrity training design process” [10]:

- **Needs Assessment** – Training must be cost-effective and include an assessment of vulnerabilities in the public sector.
- **Target Group** – Integrity training may be aimed at the sectoral or general level; introductory training can be offered to new employees, or targeted sessions for senior personnel; online training allows for broad participation.
- **Methods, Techniques, and Tools** –

Four typical integrity training methods are identified:

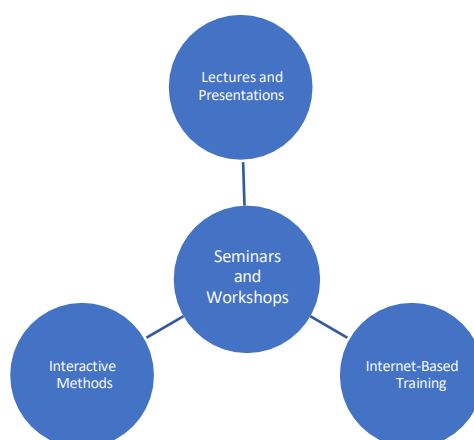


Figure 1. Typical Methods of Integrity Training

Source: OECD. 2018. Behavioural insights for public integrity: Harnessing the human factor to counter corruption. OECD Public Governance Reviews, OECD Publishing, Paris.

- **Integrity Training Content** – May incorporate legislative frameworks and core values.

An OECD (2013) study on ethics training identified the following laws and regulations typically included in integrity training: public sector laws, conflict of interest laws, anti-corruption legislation, administrative codes, public procurement laws. In terms of integrity values, the following were identified: impartiality, transparency, accountability, legality, integrity, efficiency, and fairness.

3. Comparative Analysis of the Regulatory Systems in Romania and the Republic of Moldova Regarding Cooperatives

In both legal systems—that of Romania and that of the Republic of Moldova—the importance of associations between individuals or legal entities is recognized, establishing the necessary legislative framework for the creation of legal entities based on the voluntary association of members for the purpose of carrying out common economic activities.

In the case of cooperatives, the legislator in the Republic of Moldova shows a greater interest in developing specific regulations for various forms of profit-oriented associations. Thus, Law no. 1252 of 28.08.2000 sets the conditions for the establishment and organization of consumer cooperatives. Law no. 73 of 12.04.2001 regulates entrepreneurial cooperatives, classified into processing, service provision (including consultancy), savings and loan cooperatives, or other activity types. Production cooperatives are governed by Law no. 1007/25.04.2002.

In Romania, a general framework is established through Law no. 1/2005 on the organization and functioning of cooperatives, applicable to craft, valorization, housing, fishing, transportation, forestry cooperatives, or other cooperative types that are to be established in compliance with the provisions of this law. Special regulations exist for credit cooperatives—through GEO 99/2006—and agricultural cooperatives—through Law 566/2004.

According to Law 1/2005, a cooperative society is defined as an autonomous association of natural and/or legal persons, formed based on their freely expressed consent, with the purpose of promoting the economic, social, and cultural interests of cooperative members, jointly owned and democratically controlled by them, in accordance with cooperative principles. The cooperative society is a private capital economic agent.

A similar definition is found in Law 1252/2000 of the Republic of Moldova, where a consumer cooperative is an autonomous and independent association of individuals created on the principle of free consent, through the cooperation of social shares of its members, conducting economic activities to meet their interests and consumer needs. A major difference is that membership is granted exclusively to natural persons.

Legal entities in Moldova can only become members of an entrepreneurial cooperative, which is regulated as a commercial organization (enterprise) with legal personality, whose members may be legal and/or natural persons engaged in entrepreneurial activity.

As in the case of consumer cooperatives, production cooperatives in Moldova also recognize only individuals as members. According to Law 1007/2002, a production cooperative is an enterprise established by five or more individuals to jointly engage in production and other economic activities, based primarily on the personal work of its members and the cooperation of capital contributions. The cooperative is a private law enterprise with legal personality and a profit-making purpose (including commercial).

In Romanian legislation, the right of legal entities to associate is recognized, including in the case of agricultural cooperatives, which are similar in activity to production cooperatives in Moldova.

Without exception, the legislators of both countries have established principles for the organization and functioning of cooperatives, thus regulating the conduct of cooperative members.

In Moldovan legislation, for production or entrepreneurial cooperatives, basic principles include: voluntary association and free withdrawal from the cooperative; members' participation in general meetings based on democratic principles; democratic administration of cooperative activities; unity of labor interests; economic contribution and mutual support of members; and free access to information about cooperative activities. For consumer cooperatives—where, as mentioned, only individuals can be members—principles are extensively detailed:

- **Voluntary Association:** Individuals may voluntarily join and withdraw from consumer cooperatives. Consumer cooperative organizations are open to all individuals capable of using the services of consumer cooperation and assuming membership responsibilities.
- **Collegiality:** Relationships among cooperative members and consumer cooperative organizations are based on collegiality and collaboration. Decisions in consumer cooperative organizations are made collegially (by vote).
- **Democracy:** Consumer cooperation organizations are democratic entities controlled by their members, who actively participate in setting development strategies and decision-making.

To implement the principle of democracy, the following rules must be rigorously respected:

a) each cooperative member has one vote at the general meeting, regardless of the number of subscribed shares; b) each representative of an associated cooperative organization has one vote in the supreme governing body of the union; c) governing and control bodies report to the supreme governing body; d) members and representatives freely participate in the election of the governing and control bodies.

Members exercise control over the organization's assets based on democratic and equal principles.

- **Equality:** Cooperative members are equal in rights, without discrimination based on race, nationality, ethnic origin, language, religion, gender, opinion, political affiliation, wealth, or social origin. They have equal rights to be promoted to governing and control bodies.
- **Transparency:** Activities of the consumer cooperative organization are transparent. Members and associated organizations have free access to the information held by governing and control bodies.
- **Mutuality:** Members and associated cooperative organizations support each other and benefit from facilities established by law and cooperative statutes.
- **Contribution:** Members and associated cooperative organizations participate equally in cooperative activities, capital formation, and monitoring operations and transactions.

A similarly comprehensive regulation of cooperative principles, aligned with Moldovan law, is included in Romania's framework law on cooperatives, Law no. 1/2005. According to it, members' conduct is based on:

a) the principle of voluntary and open association: cooperative societies are voluntary organizations formed on the basis of free consent and are open to all persons capable of using their services and willing to assume membership responsibilities, without discrimination; b) the principle

of democratic member control: cooperatives are democratic organizations controlled by their members, who participate in policy setting and decision-making. Elected representatives are accountable to the members. In first-degree cooperatives, each member has one vote, regardless of the number of shares held; c) the principle of economic participation of members: members equitably contribute to and democratically control the cooperative's capital; d) the principle of autonomy and independence: cooperatives are self-help organizations controlled by their members. Engagements with third parties must preserve democratic control and autonomy; e) the principle of education, training, and information: cooperatives ensure the education and training of their members, elected representatives, and employees to enable them to contribute effectively to cooperative development; f) the principle of cooperation among cooperatives: cooperatives serve their members and strengthen the cooperative movement by working together at local, national, regional, and international levels; g) the principle of concern for the community: cooperatives work for the sustainable development of their communities through policies approved by their members.

A further similarity between the two legislative systems is the recognition of the right of individuals who have reached the age of 16 to become members, as an exception to the full legal capacity requirement.

There are also restrictions on acquiring founding member status or holding roles in governing bodies. Romanian law is stricter, emphasizing the moral integrity of members.

According to Article 15 of Law 1/2005, individuals who are legally incapacitated or have final convictions for crimes such as corruption, money laundering, tax evasion, embezzlement, breach of trust, forgery, fraud, bribery, or other crimes listed in the law, may not be founding members.

In Moldova, restrictions generally apply to participation in cooperative governing bodies. For example, in production cooperatives, responsible individuals cannot be: public officials; persons prohibited by court ruling from holding such roles; or persons with unexpunged criminal records for financially motivated crimes.

Members of entrepreneurial cooperatives may include: legal entities based in Moldova or abroad; and/or natural persons who are Moldovan citizens, foreign citizens, or stateless persons with residency in Moldova, not under legal guardianship and engaged in entrepreneurial activity under the law.

In both countries, the cooperative statute may establish additional conditions for acquiring and maintaining membership status.

Additionally, both legal frameworks recognize various member rights and obligations. Key rights include: participating in general meetings; electing and being elected to governing bodies; proposing agenda items; contributing labor under legal and statutory conditions; suggesting improvements; requesting audits or extraordinary general meetings; receiving a share of net profit and benefits; transferring or bequeathing participation shares; accessing cooperative information (except trade secrets); withdrawing from the cooperative; and receiving capital and other payments upon withdrawal or liquidation.

Main obligations include: making full contributions to initial and additional shares; engaging in economic relations with the cooperative per law and statute; updating membership data; complying with laws and regulations; and implementing general meeting decisions.

Membership terminates upon withdrawal, share transfer, exclusion, death, or cooperative reorganization or liquidation.

Cooperatives play an important role in national economies, significantly contributing to local community development and sustainable economic growth through increased employment, sectoral development, and competitiveness.

4. Case Study

To highlight the need for legal provisions regarding the protection of cooperative members—provisions that effectively embody the principles underlying cooperative activity— we will briefly analyze a relevant Romanian court decision.

Case Details: A first-degree cooperative society, established under Law no. 1/2005, with 23 members, received 30 applications for subscription of social shares and admission as cooperative members. All 30 applications were rejected without justification by a General Assembly decision, with 22 votes in favor and one against.

The applicants whose requests were rejected went to court, asking for the cooperative to be ordered to register them as members under Law no. 1/2005 and Article 1528 of the Romanian Civil Code on obligations to perform an action.

They argued that the General Assembly could only decide on acceptance or rejection based on the legal conditions, and once those legal and statutory conditions were met, the request could not be denied. Rejection should only be allowed if the applicant did not meet criteria such as legal age or residence within the cooperative's area of activity.

The plaintiffs further claimed that a consumer cooperative is a voluntary organization open to anyone capable and willing to assume the responsibilities of membership. They stressed that financial support and member recruitment are key objectives of the cooperative and that rejecting qualified applicants harms the cooperative by depriving it of significant contributions.

County Court Decision: The first court [11] agreed with the plaintiffs and ordered the cooperative to register them as members. It found no legal justification for the arbitrary rejection of their applications by the General Assembly, thus violating cooperative principles, including openness to all who meet legal requirements, without discrimination.

Court of Appeal Decision: On appeal, the decision was overturned, and the plaintiffs' claims were dismissed.

The Court of Appeal argued that cooperative members cannot be forced to associate with others against their will. While verifying eligibility criteria is mandatory, there is no obligation to admit all applicants who meet those criteria. The court emphasized that the principle of voluntary and open membership, under Article 7(3)(a) of Law no. 1/2005, applies equally to both parties.

Applicable Norms and Principles: The case raises the question of whether a court can override management decisions or replace private decision-making within a private capital entity, potentially infringing on the right to private property, which includes use, enjoyment, and disposal.

The cooperative, as an economic agent, bases decisions on market experience, available knowledge, or even intuition. The General Assembly, the supreme decision-making body, is responsible for guiding the cooperative in accordance with its goals.

The principle of freedom of association must be interpreted as mutual, meaning that an agreement of will is essential. Without such an agreement, the request for membership is invalid. It would be unreasonable to require that anyone meeting formal requirements be granted membership, potentially gaining control over the cooperative's assets.

Although the applicants met the legal conditions to become members under Law no. 1/2005, they cannot demand automatic admission without the cooperative's consent. They are, in principle, free to establish a new cooperative or join another existing one if all other legal requirements are met.

The cooperative in question is a private capital economic agent formed to promote its members' economic, social, and cultural interests, jointly owned and democratically controlled in accordance with Articles 7(1) and (2) of Law no. 1/2005 and Article 2 of its Constitutive Act.

Another principle under Article 7(2)(d) of Law no. 1/2005 is autonomy and independence, meaning cooperatives are self-governed and controlled by their members. Legal relationships with third parties, including the government, must preserve democratic control and cooperative autonomy.

Democratic character is ensured through General Assembly decisions, the highest authority within the cooperative's structure, composed of all members.

In this case, the underlying concern was a potential hostile takeover of the cooperative's assets by new members, given that each member has one vote and the number of applicants exceeded the number of current members.

5. Conclusions

The increased interest shown in the last decades [12] by international institutions—the United Nations, the International Labour Organization, the International Cooperative Alliance—in social economy and cooperative activity, along with the proliferation of social economy entities [13], naturally leads to the need for regulations that ensure the effective application of the sector's guiding principles.

Moreover, there is growing emphasis on educating cooperative members for proper governance of their organizations [14].

Membership acquisition, decision-making in governing bodies, and asset management are critical elements in the efficient administration of social economy entities. These must always align with universally recognized principles forming the foundation of cooperative activity.

From the comparative analysis of Romanian and Moldovan cooperative laws, in relation to relevant European regulations and jurisprudence, we deduce the importance of legal awareness, principle-based interpretation, and strict application to provide a normative framework that effectively supports the growth of the cooperative movement.

References

1. <https://orbi.uliege.be/bitstream/2268/162288/1/Defourny%20Third%20Sector%20i>
2. <https://ica.coop/en/cooperatives/facts-and-figures>
3. https://www.eesc.europa.eu/sites/default/files/resources/docs/12_368-gr3-env2.pdf
4. For a detailed analysis of cooperative societies in relation to other commercial and non-commercial entities, see Viorel Găină, Mihnea Al. Găină la <https://drept.ucv.ro/RSJ/images/articole/2008/RSJ3/05Gaina.pdf>
5. <https://eur-lex.europa.eu/legal-content/RO/TXT/?uri=celex:32003R1435>
6. Rhys Andrews, Jilke Sebastian and Steven Van de Walle, (2019), Economic strain and social cohesion in Europe: Does institutional trust Matter?. *European Journal of Political Research*, p.9.
7. Buss Terry and Ahmed Usama, (2019), Social equity and Development. In Johnson, Norman and Svava James (Ed), *Justice for All: Promoting Social Equity in Public Administration*. Routledge: New York, p.11.
8. OECD, (2018), *Behavioural insights for public integrity: Harnessing the human factor to counter corruption*. OECD

Public Governance Reviews, OECD Publishing, Paris.

9. OECD, (2021), Lobbying in the 21st century: Transparency, integrity and access.
10. OECD, (2020), Public integrity handbook.
11. <https://www.rejust.ro/juris/79d29de3>
12. Gabriela Fotache, The Role of the Social Economy in Achieving the Sustainable Development Goals (Sdgs) at EU and Global Level, Economy Transdisciplinarity Cognition, George Bacovia University, vol.XXV, issue 2/2022
13. Claudia Petrescu, Cooperation in Romania – A Social Economy Actor, Quality of Life Journal, nr.4/2011
14. <https://ica.coop/sites/default/files/2022-05/Review%20of%20International%20Co-operation%202022%20-%20v03.pdf>

THE EVOLUTION OF THE NORMATIVE FRAMEWORK OF COOPERATIVES AND ITS IMPACT ON SUSTAINABLE DEVELOPMENT

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Abstract

This article examines the evolution of cooperative legislation within the context of sustainable development and international economic processes influenced by globalization. It underscores the significance of cooperatives in the global economy and the necessity for their modernization in accordance with European standards following the signing of the Moldova-EU Association Agreement. The study compares the cooperative legislation of the Republic of Moldova with that of the European Union, highlighting the need for legislative adjustments to align with European standards. The role of cooperatives in sustainable development and the circular economy is emphasized, promoting efficient resource management and waste reduction. Collaboration among members and communities is essential for implementing the circular economy, contributing to sustainable development. In conclusion, the necessity of supporting cooperatives within the framework of the circular economy to build a sustainable future is accentuated. This research aims to analyze the evolution of cooperative legislation at both national and international levels, highlighting key legislative changes that have contributed to strengthening this economic model. It examines the extent to which current regulations support the sustainable development of cooperatives and the existing legal challenges in ensuring good governance. Additionally, it discusses legislative solutions designed to facilitate the adaptation of cooperatives to the requirements of the circular economy and sustainable development.

Keywords: cooperative, legislation, sustainability, economic development, environmental protection, legal regulation

JEL: K20, K23, Q01, L31

Introducere

Cooperativele exercită un rol extrem de important în societatea contemporană, datorită impactului major pe care îl au asupra dezvoltării socio-economice în orice țară [16, p. 6]. Aceste entități economice se disting prin modelul lor dual, îmbinând o componentă economică cu una socială, și au demonstrat de-a lungul timpului o reziliență sporită în perioade de criză, reușind adesea să depășească efectele negative ale recesiunilor economice. Datorită diversității activităților pe care le promovează, nivelului ridicat de implicare a membrilor și contribuției lor la creșterea calității vieții și dezvoltarea comunităților, cooperativele au devenit un pilon esențial în politicile

internaționale și europene privind dezvoltarea economică durabilă, coeziunea socială și incluziunea tuturor categoriilor sociale [16, p. 6].

Recunoașterea internațională a importanței cooperativelor s-a concretizat în documente normative de referință. Astfel, Organizația Națiunilor Unite a adoptat Rezoluția “*Cooperativele în cadrul dezvoltării umane*” (2001), Organizația Internațională a Muncii a emis Recomandarea 193/2002 privind promovarea cooperativelor, iar la nivelul UE a fost publicată Comunicarea Comisiei Europene “*Promovarea societăților cooperative în Europa*” (2004), urmată de Rezoluția Parlamentului European din 2013 privind contribuția cooperativelor la depășirea crizei economice [16, p. 7]. Aceste inițiative subliniază consensul global și european cu privire la rolul pozitiv al cooperativelor în dezvoltarea sustenabilă și necesitatea unui cadru legislativ care să le valorifice potențialul.

În RM, cooperativele au o tradiție îndelungată – prima cooperativă de consum datează din anul 1868 [1] – iar după proclamarea independenței, cadrul normativ a evoluat pentru a reglementa diferitele forme cooperatiste. Dezvoltarea sustenabilă, înțeleasă ca progres economic, social și de mediu pe termen lung, a devenit un obiectiv strategic național, iar cooperativelor le revine un loc important în atingerea acestui obiectiv, dat fiind că acestea pun adesea oamenii și scopul social sau ecologic înaintea profitului [14]. Totodată, asocierea RM cu UE și perspectiva armonizării legislației impun realizarea unui studiu comparativ al sistemului cooperatist național în raport cu cel european [15], pentru a identifica bune practici și eventuale lacune legislative [6].

Prezenta cercetare își propune să analizeze evoluția cadrului normativ al cooperativelor din RM în comparație cu reglementările relevante din UE, evaluând totodată impactul acestor reglementări asupra dezvoltării sustenabile. Studiul cuprinde o examinare doctrinară (a conceptelor și principiilor juridice cooperatiste) și empirică (date și exemple concrete), incluzând referințe bibliografice recente din perioada 2023–2025. Structura lucrării urmează formatul unui articol științific: după prezentarea contextului teoretic și normativ, se realizează o analiză comparativă a legislației cooperatiste, se discută studii de caz și practici europene relevante, pentru ca în final să fie formulate concluzii și recomandări legislative clare privind armonizarea și îmbunătățirea regimului juridic al cooperativelor în vederea promovării dezvoltării sustenabile.

Rezultate obținute și discuții

Definiția și principiile cooperativelor. Cooperativele sunt întreprinderi autonome de persoane unite voluntar pentru a satisface nevoi și aspirații economice, sociale și culturale comune, printr-o entitate cu proprietate comună și guvernare democratică. În esență, ele fac parte din sfera mai largă a economiei sociale, alături de alte forme asociative precum mutualele, asociațiile și fundațiile. Toate acestea se caracterizează prin prioritizarea oamenilor și a scopului social/ecologic în fața profitului, prin reinvestirea majorității excedentului în sustenabilitatea organizației și interesul general, precum și prin guvernanta democratică sau participativă [14]. Aceste principii – cunoscute drept principiile cooperatiste (precum *aderarea voluntară și deschisă, controlul democratic al membrilor* “un membru, un vot”, *participarea economică echitabilă, autonomia și independența, educația și informarea membrilor, cooperarea între cooperative și grija față de comunitate*) – ghidează funcționarea cooperativelor peste tot în lume. Ele asigură alinerea activității economice a cooperativei cu obiectivele de dezvoltare sustenabilă: crearea de locuri de muncă decente, incluziune socială, reducerea inegalităților și protecția mediului [3]. În fapt, un Raport al

Secretarului General al ONU pe 2023 evidențiază că, la nivel global, cooperativele pot contribui substanțial la atingerea Obiectivelor de Dezvoltare Durabilă (ODD) – în special prin crearea de locuri de muncă decente, eradicarea sărăciei și promovarea sustenabilității mediului [3]. Același raport subliniază că pentru ca acest potențial să fie pe deplin valorificat, este esențială existența unui *mediu favorabil* (en. *enabling environment*) pentru cooperative, care include legi și politici adecvate, instituții de sprijin, educație și formare, acces la finanțare și parteneriate [3]. Cu alte cuvinte, cadrul normativ joacă un rol determinant în dezvoltarea sectorului cooperatist și în impactul său asupra dezvoltării sustenabile.

Evoluția cadrului normativ în RM. Imediat după obținerea independenței, RM a adoptat primele acte normative menite să reglementeze cooperativa ca formă juridică distinctă, recunoscând moștenirea istorică a cooperației de consum și necesitatea reînvierii altor tipuri de cooperative într-o economie de piață. Un act fondator a fost Legea cu privire la cooperație nr. 864/1992, care a stabilit principiile generale pentru sectorul cooperatist în anii '90. Ulterior, la începutul anilor 2000, legislatorul a optat pentru reglementări distincte în funcție de tipul de cooperativă, adoptând trei legi separate care alcătuiesc și astăzi pilonii cadrului legal al cooperativelor în RM: Legea privind cooperativele de întreprinzător nr. 73-XV din 12.04.2001 [10], Legea privind cooperativele de producție nr. 1007-XV din 25.04.2002 [11] și Legea cooperației de consum nr. 1252-XIV din 28.09.2000 [8].

Fiecare dintre aceste legi se adresează unei forme specifice de cooperativă, reflectând realitățile economice ale perioadei:

- *Cooperativele de consum* – succesoarele cooperativelor sătești din perioada sovietică – sunt organizații în care membrii (de regulă consumatori locali sau mici comercianți) se asociază pentru a opera magazine, depozite angro sau alte servicii comerciale în beneficiul comunității. Ele sunt guvernate de Legea cooperației de consum din 2000, care prevede dreptul cooperativelor de consum de a se asocia în uniuni teritoriale și o Uniune Centrală (Moldcoop), continuând tradiția instituționalizată a rețelei cooperatiste de consum [1]. Această lege stipulează principiile de funcționare (libera asociere a persoanelor fizice, caracterul nonprofit în sensul distribuirii limitate a profitului, patrimoniu indivizibil în caz de lichidare ș.a.) și modul de organizare internă al cooperativelor de consum.
- *Cooperativele de întreprinzător* sunt o formă de cooperativă orientată spre afaceri (de tip antreprenorial), în care membrii pot fi persoane fizice sau juridice care se unesc pentru a desfășura împreună o activitate economică productivă sau de servicii, împărțind riscurile și beneficiile. Legea nr. 73/2001 definește condițiile de constituire (număr minim de membri fondatori, capital social subscris etc.), organele de conducere (Adunarea generală, consiliul de administrație, comisia de cenzori), precum și regulile privind distribuirea profitului (de regulă limitarea dividendelor proporțional cu participarea membrilor și reinvestirea excedentelor în dezvoltarea cooperativei).
- *Cooperativele de producție* (Legea nr. 1007/2002) [11] sunt în esență cooperative ale muncitorilor sau producătorilor, asemănătoare într-o oarecare măsură cu cooperativele de tip “worker cooperative” din occident. Membrii sunt în același timp angajați ai cooperativei, participând direct la producerea bunurilor sau serviciilor. Legea din 2002 detaliază modul în care membrii își exercită dreptul de proprietate comună asupra mijloacelor de producție și modul de repartizare a veniturilor obținute din activitatea de

producție, punând accent pe principiul participării egale a membrilor la gestionarea afacerii.

Pe lângă aceste legi speciale, cooperativele din RM sunt supuse și cadrului legal general aplicabil persoanelor juridice și activității de întreprinzător: Codul civil al RM [2] (care recunoaște cooperativele ca subiecte de drept distincte, cu personalitate juridică proprie) și legislația conexasă (de ex. Legea privind înregistrarea de stat a persoanelor juridice nr. 220/2007, pentru formalitățile de înmatriculare [9], sau Codul fiscal al RM). Este de menționat că, spre deosebire de unele state UE, Constituția RM nu conține prevederi explicite referitoare la cooperative sau la economia socială, însă Strategiile naționale recente recunosc rolul cooperativelor în dezvoltarea rurală și agricultură. Spre exemplu, *Strategia națională de dezvoltare agricolă și rurală 2023–2030* include măsuri de încurajare a asocierii producătorilor agricoli în cooperative, recunoscând că acest model poate spori valoarea adăugată obținută de micii fermieri și reziliența comunităților rurale [7].

În pofida existenței unui cadru legal dedicat, experții și practicienii au semnalat de-a lungul anilor anumite lacune și rigidități legislative care îngreunează dezvoltarea sectorului cooperatist în RM. De exemplu, Legea cooperației de consum din 2000, deși a fost crucială pentru reorganizarea sistemului cooperatist de consum post-privatizare, este considerată în parte *învechită* de către liderii cooperației, necesitând actualizări pentru a corespunde economiei moderne [1]. Într-un interviu din 2014, Președintele Uniunii Centrale a Cooperativelor de Consum (Moldcoop) sublinia că statutele cooperativelor din RM au fost deja armonizate în bună măsură cu statutul-cadru al Alianței Internaționale a Cooperativelor, dar că legea națională trebuie îmbunătățită în continuare, în colaborare cu experți europeni, pentru a introduce dispoziții noi care să îmbunătățească cadrul juridic [1]. Un aspect particular este numărul minim relativ ridicat de membri fondatori impus de lege pentru anumite tipuri de cooperative (de exemplu, 15 persoane la cooperativele de consum, comparativ cu cerințe mult mai flexibile în alte jurisdicții), fapt care poate descuraja inițiativele cooperative mici sau locale. De asemenea, reglementările privind divizarea pe tipuri de cooperative strict separate pot limita *inovația cooperatistă* – spre exemplu, apariția de cooperative sociale (în domeniul serviciilor sociale sau de sănătate) ori cooperative energetice (în sectorul energiilor regenerabile) nu este expres prevăzută de legislația actuală, aceste inițiative fiind nevoite fie să se încadreze forțat în una din formele existente, fie să adopte alte forme juridice (asociații obștești, SRL-uri etc.). Toate aceste elemente evidențiază necesitatea unei actualizări și armonizări a cadrului normativ din RM, astfel încât acesta să devină mai suplu, incluziv și orientat spre dezvoltare sustenabilă.

Cadrul normativ european și internațional. La nivelul UE, deși nu există o *lege unică a UE privind reglementarea cooperativelor* care să fie direct aplicabilă în toate statele membre (cooperativele fiind reglementate preponderent de legislațiile naționale), există instrumente juridice și politici care conturează un mediu favorabil cooperativelor în spațiul comunitar. Un element notabil este Statutul Societății Cooperative Europene (SCE), instituit prin Regulamentul (CE) nr. 1435/2003 al Consiliului. Acest regulament permite înființarea de cooperative transnaționale înregistrate la nivel european (SCE), cu scopul de a facilita cooperarea între membrii din mai multe state membre. Deși numărul de societăți cooperative europene rămâne relativ redus (utilizarea statutului SCE fiind întâmpinată de provocări practice și juridice în primul deceniu de la introducerea), existența sa reflectă recunoașterea la nivel UE a cooperativelor ca formă de organizare distinctă, ce merită un cadru *supranațional* de funcționare [5]. În plus, Directiva 2003/72/CE

completează regulamentul SCE, asigurând implicarea angajaților în structurarea acestor cooperative europene, în consonanță cu principiile guvernantei democratice.

Mult mai relevante însă pentru viața de zi cu zi a cooperativelor sunt legislațiile naționale ale statelor membre UE, care, în mare parte, integrează principiile cooperative internaționale și au suferit reforme semnificative în ultimele două decenii. De exemplu, Italia consacră prin Constituție (art. 45) rolul social al cooperativelor și impune prin lege supravegherea și sprijinirea acestora de către stat, având astăzi unul dintre cele mai dezvoltate sectoare cooperatiste (cuprinzând cooperative de consum, de credit, agricole, industriale și *sociale*, cele din urmă furnizând servicii sociale sau integrând persoane defavorizate pe piața muncii). Spania are, la rândul său, un sector cooperatist robust, în special în Țara Bascilor și Catalonia – celebrul grup Mondragon din Țara Bascilor fiind cel mai mare conglomerat cooperatist din lume, cu peste 80.000 de angajați și zeci de cooperative interconectate în domenii variate (producție industrială, retail, finanțe, educație etc.). Aceste exemple au demonstrat că prin politici publice consecvente (facilități fiscale pentru cooperative, acces la finanțare dedicată, parteneriate public-cooperative) și un cadru legal stabil, cooperativele pot deveni motoare ale dezvoltării locale sustenabile, creând locuri de muncă stabile și păstrând bogăția în comunitățile unde operează. Nu întâmplător, Mondragon este studiat de Organizația Națiunilor Unite ca *studiu de caz* privind rolul cooperativelor în dezvoltarea economică – Raportul ONU din 2023 privind cooperativele menționează Mondragon ca exemplu de bună practică în combaterea sărăciei și promovarea incluziunii prin mijloace cooperatiste [3].

În Europa de Est, multe țări au inițiat reforme legislative post-2000 pentru a revitaliza sectorul cooperatist, în contextul tranziției de la economia planificată la economia de piață. România, spre exemplu, a abrogat vechile legi cooperatiste de inspirație socialistă și a adoptat Legea nr. 1/2005 a cooperației, care unifică regulile pentru cooperativele de consum și cele meșteșugărești (cooperația de consum și cooperația de credit funcționează totuși sub legi separate, dar armonizate). Legea română actualizată (modificată și republicată în mai multe rânduri până în 2023) aliniază principiile cooperatiste la standardele europene și prevede, de exemplu, un număr minim de 5 membri pentru înființarea unei cooperative, posibilitatea constituirii de uniuni naționale ale cooperativelor cu rol de reprezentare, precum și unele facilități fiscale (scutiri de impozit pe profit reinvestit, scutiri de la anumite taxe locale) menite să stimuleze dezvoltarea cooperativelor ca actori ai economiei sociale. Alte țări, precum Franța, au adoptat legi-cadru ale economiei sociale și solidare (de exemplu, Legea ESS din 2014 în Franța) care acordă cooperativelor un statut privilegiat și instrumente de finanțare dedicate, recunoscându-le drept parteneri ai autorităților publice în furnizarea de servicii de interes general și în atingerea obiectivelor de dezvoltare durabilă.

La nivelul UE, impulsul politic major din ultimii ani îl reprezintă Planul de acțiune al UE pentru economia socială, lansat de Comisia Europeană în 2021 și susținut de Parlamentul European și Consiliu. Acest Plan conține 38 de acțiuni concrete ce urmează a fi implementate până în 2030, vizând crearea unui mediu favorabil pentru întreprinderile de economie socială, inclusiv cooperative, prin măsuri ce țin de accesul la finanțare, adaptarea normelor de ajutor de stat, promovarea achizițiilor publice responsabile social, dezvoltarea competențelor etc. [6]. Una dintre inițiativele-cheie generate de Planul de acțiune este Recomandarea Consiliului UE din 27 noiembrie 2023 privind dezvoltarea cadrului de condiții pentru economia socială, document ce invită statele membre să elaboreze strategii naționale cuprinzătoare pentru economia socială și să adapteze cadrul legislativ și politicile astfel încât acestea să sprijine pe deplin potențialul social și economic al cooperativelor și al celorlalți actori din domeniu [6]. Recomandarea prevede măsuri precum

facilitarea accesului entităților de economie socială la finanțări și piețe (inclusiv la contracte publice), utilizarea oportună a normelor de ajutor de stat (pentru a sprijini activitățile cu impact social), dezvoltarea unui mediu fiscal favorabil și creșterea vizibilității și recunoașterii economiei sociale [6]. Adoptată în unanimitate de statele membre, Recomandarea Consiliului din 2023 marchează un angajament politic la nivel european de a moderniza politicile publice privind cooperativele, recunoscându-le drept actori centrali în tranziția către o economie incluzivă și sustenabilă. Acest trend european este extrem de relevant pentru RM, în condițiile ambiției sale de integrare europeană: alinierea cadrului normativ autohton la bunele practici europene în materia cooperativelor nu doar că va facilita participarea la programe și rețele europene, dar va și asigura că dezvoltarea sustenabilă – prin crearea de locuri de muncă decente, inovare socială și creștere “verde” – este susținută de un sector cooperatist puternic.

Analiză comparativă: Republica Moldova vs. Uniunea Europeană

Analiza comparativă a cadrului normativ relevă atât convergențe, cât și divergențe între RM și spațiul UE în privința reglementării cooperativelor. Vom examina în continuare câteva aspecte esențiale comparate: (1) tipologia și definirea cooperativelor, (2) condițiile de constituire și funcționare, (3) sprijinul instituțional și politicile publice dedicate, precum și (4) integrarea obiectivelor de dezvoltare sustenabilă în legislație.

(1) Tipologia și definirea cooperativelor. În RM, cadrul legislativ segregat pe tipuri distincte de cooperative (de consum, de întreprinzător, de producție) este o caracteristică specifică. Fiecare lege oferă o definiție particularizată cooperativei vizate și stabilește scopul principal al acesteia (de exemplu, cooperativa de consum este definită în legea din 2000 ca asociație autonomă de persoane fizice care se unesc liber pentru a desfășura activități de comerț și servicii în interesul membrilor și al comunității) [1]. În schimb, în majoritatea statelor UE există o lege-cadru unică a cooperativelor (uneori completată de legi sectoriale, ca în cazul cooperativelor de credit sau de asigurări), care definește cooperativa într-un mod general, aplicabil oricărui domeniu de activitate, accentuând elementele comune: asociere voluntară, scop mutual, guvernare democratică, distribuire limitată a profitului. De exemplu, în România, Legea 1/2005 definește societatea cooperativă ca persoană juridică înființată de minimum 5 persoane, pe baza acordului liber exprimat, în scopul desfășurării în comun a activităților economice, având personalitate juridică și funcționând după principiile cooperatiste. Definiții similare se regăsesc în legislația altor state membre, ceea ce arată o abordare mai unitară în UE față de abordarea fragmentată din RM. Un efect al acestui contrast este că, în RM, anumite forme noi de cooperative (de exemplu, cooperative de energie regenerabilă sau cooperative sociale pentru integrarea persoanelor vulnerabile) nu sunt menționate explicit în lege și nu se încadrează perfect în categoriile tradiționale, pe când în UE există o mai mare flexibilitate: legea generală a cooperativelor permite practic constituirea de cooperative în orice domeniu, atâta vreme cât respectă principiile mutualității. În plus, unele state UE recunosc explicit sub-tipuri inovatoare: Italia, spre exemplu, are legislație specială pentru *cooperative sociale* (Legea 381/1991), iar Franța pentru *cooperative de activitate și ocupare* (CAEs) ș.a. – concepte absente deocamdată în peisajul juridic moldovenesc.

(2) Constituirea și funcționarea – cerințe legale cheie. Din perspectivă comparativă, există diferențe notabile în privința pragurilor și cerințelor de constituire a cooperativelor. În RM, legislația impune un număr minim relativ ridicat de membri fondatori: de exemplu, 5 membri pentru

cooperativele de întreprinzător, 3 pentru cooperativele de producție (care sunt adesea mici asociații de muncitori) și nu mai puțin de 15 membri în cazul cooperativei de consum [12]. Prin contrast, în țări din UE, tendința actuală este de a facilita constituirea de cooperative prin cerințe minime accesibile: în Franța și Spania sunt necesari doar 3 membri, iar în Polonia chiar 3 persoane fizice sau juridice pot forma o cooperativă. Pragul de 15 persoane, moștenit probabil din perioada istorică a cooperației de consum când cooperativele deserveau comunități întregi, poate constitui în prezent o barieră în calea inițiativelor locale de mai mică anvergură (de exemplu, un grup de 5-10 fermieri care ar dori să-și creeze o cooperativă de marketing în Moldova s-ar confrunta cu cerința legală de a găsi minimum 15 membri, altfel ar trebui să opteze pentru alt tip asociativ).

Un alt aspect este capitalul social și răspunderea membrilor. Actele normative ale RM prevăd că membrii contribuitori la capitalul cooperativei își exercită drepturile patrimoniale în limitele aportului, iar în caz de faliment, răspunderea lor este limitată la partea nevărsată a aportului subscris (similar cu societățile comerciale, deci limitând riscul personal). În multe state membre UE regimul este similar – cooperativele fiind adesea asimilate ca formă de societate cu răspundere limitată a membrilor, tocmai pentru a încuraja antreprenoriatul colectiv fără teama răspunderii nelimitate. Totuși, unele țări permit opțional și cooperativa cu răspundere nelimitată a membrilor (de exemplu, în Germania există *registrierte Genossenschaft* cu răspundere limitată, dar istoric existau și forme cu răspundere nelimitată). RM nu are o asemenea distincție, toate cooperativele funcționând cu răspundere limitată.

Guvernanța internă este un capitol în care reglementările se aseamănă în spirit între RM și UE, dar pot diferi în detalii. Principiul “un membru – un vot” este consfințit atât în legile moldovenești, cât și în legislațiile europene ca fundament al deciziilor în Adunarea Generală a membrilor (indiferent de aportul la capital). De asemenea, structura organelor de conducere (Adunare Generală, Consiliu de Conducere/Consiliu de Administrație și organ de control intern – cenzor/comisie de cenzori) se regăsește în mod similar. Cu toate acestea, legislația RM, influențată de modelele ex-sovietice, tinde să fie mai rigidă în privința organizării: de exemplu, impune existența unui anume număr de membri în organele de conducere sau stabilește intervale fixe pentru convocarea adunărilor, pe când legile occidentale pot lăsa aceste detalii la latitudinea statutului cooperativei. Un element distinct în unele jurisdicții UE este posibilitatea de a accepta *investitori externi* (membri asociați fără drept de vot sau cu drepturi de vot limitate, care aduc capital) – spre exemplu, legislația franceză a introdus categoria “membres associés” în cooperative, tocmai pentru a facilita atragerea de finanțare. În RM, cooperativele rămân închise către non-membri din perspectiva capitalului (cu excepția împrumuturilor sau parteneriatelor contractuale), ceea ce poate limita accesul la resurse financiare.

(3) Sprijinul instituțional și politicile publice. Aici diferențele țin mai puțin de prevederi legale stricte și mai mult de arhitectura instituțională și de politicile guvernamentale. În țările UE cu sectoare cooperatiste puternice, există instituții publice sau parteneriate consultative dedicate economiei sociale/cooperativei – de exemplu, Consilii naționale pentru economia socială (în Franța, Spania, Portugalia, Italia, etc.) care reunesc reprezentanți ai guvernului și ai mișcării cooperatiste pentru a discuta politicile sectoriale [6]. Un astfel de mecanism asigură participarea cooperativei la formularea politicilor care le privesc și o *coordonare verticală* între nivelul central și nevoile locale ale cooperativei. În RM, nu există încă un organism consultativ național focalizat pe cooperative sau economie socială. Cu toate acestea, sectorul cooperativ de

consum beneficiază de Moldcoop – Uniunea centrală a cooperativelor de consum – care acționează ca un fel de federație națională, reprezentând interesele celor ~172 de cooperative membre (date valabile la 2014) [1]. Moldcoop colaborează cu autoritățile, însă rolul său nu este formalizat prin lege ca partener obligatoriu de consultare (situație diferită de, să zicem, Centrala Cooperativelor din țările nordice, recunoscută partener social). În ultimii ani, odată cu apropierea de UE, autoritățile moldovene au început să includă conceptul de *economie socială* în strategii și chiar să finanțeze proiecte-pilot de antreprenoriat social, însă cooperativelor ca atare nu li s-a acordat încă un program național de sprijin dedicat. În schimb, la nivelul UE există numeroase fonduri și programe accesibile cooperativelor: Programul European pentru Ocupare și Inovare Socială (EaSI, integrat acum în Fondul Social European Plus) a finanțat incubatoare și proiecte cooperative, Fondul European Agricol pentru Dezvoltare Rurală oferă subvenții pentru grupuri de producători agricoli și cooperative, iar noul program InvestEU prevede garantarea unor împrumuturi pentru întreprinderi sociale (deci și cooperative) [6]. Practic, mediul UE oferă oportunități de finanțare și dezvoltare de care cooperativele din RM nu pot încă beneficia pe deplin, decât eventual prin programe bilaterale sau de pre-aderare. Acest lucru se reflectă și în nivelul de dezvoltare al sectorului: în UE există aproximativ 250.000 de întreprinderi cooperatiste, însumând 163 de milioane de membri și oferind circa 5,4 milioane de locuri de muncă [4], în timp ce în RM numărul cooperativelor active este mult mai mic raportat la populație (de exemplu, Moldcoop reunește 172 de organizații cooperatiste de consum [1], iar cooperativele agricole și de producție se numără în sute, nu mii). Această diferență indică un potențial neexplorat în RM, care ar putea fi atins prin politici publice mai curajoase de stimulare a cooperativelor.

- (4) Integrarea obiectivelor de dezvoltare sustenabilă. Un element central al discuției este în ce măsură legislația și practicile din RM și UE promovează explicit contribuția cooperativelor la dezvoltarea sustenabilă. În UE, cooperativele sunt recunoscute nu doar ca agenți economici, ci și ca promotori ai coeziunii sociale și ai tranziției ecologice. Rezoluția Parlamentului European din iulie 2022 subliniază că economia socială – din care fac parte cooperativele – pune accentul pe obiective sociale și ecologice, reinvestind majoritatea profitului și oferind bunuri/servicii de interes general [14]. Multe state membre au inclus în strategiile lor de dezvoltare sustenabilă referiri la rolul cooperativelor în atingerea ODD (ex: combaterea sărăciei, educație de calitate, energie curată și accesibilă, muncă decentă etc.). Un exemplu elocvent este domeniul energiei regenerabile: la nivelul UE, Directivele privind energia regenerabilă încurajează *comunitățile energetice* și *cooperativele energetice*, recunoscându-le ca modalități prin care cetățenii pot participa la tranziția verde. Drept urmare, în țări ca Germania, Danemarca sau Belgia, cooperativele de energie solară sau eoliană s-au dezvoltat rapid, sprijinite de un cadru legal care le permite accesul la rețea și la scheme de tarifyare avantajoase. În RM, subiectul cooperativelor energetice este abia la început, neavând încă prevederi dedicate în Legea energiei regenerabile – însă acesta este un domeniu cu potențial enorm în viitor, mai ales în contextul preocupărilor pentru securitate energetică și mediu. De asemenea, cooperativelor li se recunoaște meritele în dezvoltarea rurală sustenabilă (prin reducerea intermediarilor pe lanțul agroalimentar, creșterea veniturilor producătorilor locali și menținerea populației în zonele rurale). Atât UE cât și RM, prin strategiile agricole, încurajează formarea de grupuri de producători și cooperative agricole, însă în practică RM se confruntă încă cu reticența unor fermieri, pe fondul experiențelor istorice negative (colectivizarea forțată din perioada sovietică a lăsat o amprentă care face ca

“cooperația” să fie uneori privită cu suspiciune). Cadrul legislativ modern poate contribui la schimbarea acestei percepții, dacă este însoțit de măsuri de educare și promovare a modelului cooperatist ca unul voluntar, democratic și orientat spre binele comun.

Menționăm, că analiza comparativă denotă că RM are încă un drum de parcurs pentru a-și alinia pe deplin cadrul normativ la cel al UE în materia cooperativelor. Principiile de bază sunt deja împărtășite (voluntariat, democrație, scop mutualist), însă tehnica legislativă și politicile de sprijin pot fi îmbunătățite considerabil, învățând din experiența UE. În secțiunea următoare vom ilustra aceste idei prin studii de caz și exemple de practici europene de succes, care pot servi drept inspirație pentru reformele viitoare în RM.

Studii de caz

Pentru a înțelege mai bine cum influențează cadrul normativ dezvoltarea cooperativelor și contribuția lor la sustenabilitate, este util să examinăm succint câteva studii de caz – atât din Europa Occidentală, cât și din RM – evidențiind atât realizările posibile, cât și lecțiile învățate.

Cauza Mondragon, Spania – un ecosistem cooperatist integrat. Mondragon Corporation din Țara Bascilor (Spania) este adesea citată drept exemplul suprem al potențialului cooperativelor într-o economie modernă. Fondată în anii 1950 de un grup de absolvenți ai unei școli tehnice și inspirată de preceptele preotului catolic Jose Maria Arizmendiarieta, Mondragon a crescut dintr-o mică cooperativă de manufactură într-un grup de peste 90 de cooperative interconectate, acoperind industrii diverse (electrocasnice prin brandul Fagor, piese auto, retail – lanțul de supermarketuri Eroski, servicii financiare – banca cooperatistă Laboral Kutxa, învățământ superior – Universitatea Mondragon etc.). Cadrul legal spaniol, care încă din 1987 recunoștea statutul special al cooperativelor de muncitori (*Ley de cooperativas*), a permis Mondragon să inoveze: fiecare cooperativă din grup este deținută de muncitorii săi, dar există mecanisme federative (fonduri comune de redistribuire a capitalului, un fond de garantare intern pentru situații de criză, structuri de coordonare inter-cooperativă) care au conferit reziliență întregului grup. În timpul crizei financiare din 2008–2012, spre exemplu, Mondragon a reușit să protejeze majoritatea locurilor de muncă prin transferul de personal între cooperative și reducerea temporară a remunerațiilor conducerii, evitând concedieri masive – o performanță recunoscută de Parlamentul European în rezoluția sa privind cooperatives și depășirea crizei [16, p.6]. Astăzi, Mondragon angajează aproximativ 70–80 de mii de persoane și are o cifră de afaceri de ordinul miliardelor de euro, demonstrând că principiile cooperatiste (precum echitatea salarială – raportul dintre cel mai mare și cel mai mic salariu fiind menținut în jur de 6:1) [13] pot coexista cu competitivitatea globală. Cheia succesului Mondragon a constatat nu doar în cultura cooperatistă internă, ci și în cadrul legislativ prietenos: legislația bască a cooperativelor a permis crearea de grupuri cooperatiste cu personalitate juridică, iar politicile fiscale spaniole au oferit scutiri de impozit pe profit reinvestit și reduceri de taxe cooperativelor, recunoscând aportul lor social. Mondragon servește drept inspirație directă și altor țări – inclusiv RM, unde liderii cooperației de consum au menționat dorința de a prelua elemente din experiența Germaniei și Suediei, iar în esență modelul Mondragon este studiat ca referință globală de bune practici [1].

Cauza Cooperativele sociale din Italia – integrarea categoriilor vulnerabile. Italia a fost primul stat UE care, în 1991, a creat prin lege o nouă formă juridică numită “cooperativa socială”. Aceasta este o cooperativă care are fie obiect de activitate furnizarea de servicii sociale, medicale, educative către comunitate (tip A), fie integrarea socio-profesională a persoanelor defavorizate (tip

B). Cadrul normativ inovator (Legea 381/1991, completată ulterior de reforme în 2017) a permis înflorirea a mii de cooperative sociale pe tot teritoriul Italiei. Aceste cooperative au un regim fiscal stimulat (scutiri de unele taxe dacă reinvestesc profitul, acces la fonduri publice pentru servicii sociale delegate) și pot include ca membri nu doar angajații, ci și *beneficiarii* sau *voluntarii*. Rezultatele sunt remarcabile: cooperativele sociale italiene au creat zeci de mii de locuri de muncă pentru persoane cu dizabilități, șomeri de lungă durată, dependenți reabilitați, contribuind direct la Obiectivul de Dezvoltare Durabilă nr.8 – muncă decentă și creștere economică incluzivă. Modelul a fost exportat și adaptat în alte țări (de ex. în Polonia există “cooperativa socială” din 2006, în România se discută despre introducerea conceptului). Pentru RM, unde problemele de incluziune socială (persoane cu dizabilități cu rata scăzută de angajare, comunități rurale marginalizate) sunt stringente, cooperativa socială ar putea fi o soluție. Însă actualmente legislația moldovenească nu conține o asemenea formă specifică – ar fi nevoie fie de modificarea legilor existente, fie de o lege nouă a întreprinderilor sociale care să includă și cooperativele sociale ca formă distinctă. Practica italiană arată că o inovație legislativă în acest sens poate declanșa apariția unui sector complet nou, capabil să abordeze nevoi sociale pe care statul sau piața convențională nu le satisfac.

Cauza Cooperația de consum din RM – modernizare sub constrângeri. În contrast cu exemplele vest-europene, este util să privim și către realitatea locală: rețeaua cooperativelor de consum din RM, moștenitoare a *sistemului “Moldcoop”*, a supraviețuit tranziției anilor '90 și continuă să reprezinte un actor economic relevant în mediul rural. La nivelul anului 2020, Moldcoop raporta o cifră de afaceri anuală de peste 1 miliard de lei, generată în principal din activități de retail (magazine satești, piețe) și de prelucrare primară (fabrici de panificație, ateliere etc.) aparținând cooperativelor [1]. Acest volum indică faptul că, în pofida concurenței dure cu rețelele comerciale private, cooperativele de consum mențin o cotă de piață semnificativă în zonele rurale și orașele mici, asigurând accesul populației la produse alimentare și bunuri de strictă necesitate. Impactul asupra dezvoltării sustenabile locale este demn de remarcat: profitul realizat de cooperative este în mare parte reinvestit în comunitate – de exemplu, sumele sunt folosite pentru renovarea și modernizarea magazinelor (peste 800 de magazine rurale au fost renovate și dotate în ultimele decenii) [1], ceea ce îmbunătățește infrastructura locală și creează un mediu comercial civilizat pentru locuitorii satelor. De asemenea, cooperativele de consum oferă locuri de muncă (mii de angajați, majoritatea în provincie) [1], constituind adesea cel mai mare angajator din anumite comune sau raioane. În plus, ele mențin tradiția aprovizionării cu produse locale – multe cooperative colectează producția fermierilor din zonă (fructe, lapte, legume) pentru a o vinde prin magazinele proprii sau pentru a o prelucra, contribuind astfel la lanțuri alimentare scurte și la susținerea micilor producători (alinieri cu ODD 12 – consum și producție responsabile). Toate aceste realizări ale cooperației de consum au avut loc în pofida unor limitări ale cadrului normativ: după cum menționam, Legea din 2000 a cooperației de consum a necesitat modificări, iar adaptarea la economia de piață a fost dificilă. Faptul că sistemul cooperatist a rezistat indică o capacitate de auto-organizare și un spirit asociativ puternic între membrii săi, însă viitorul depinde de modul în care legislația va sprijini extinderea acestor practici. Modernizarea continuă a cadrului legal – de exemplu, eliminarea prevederilor depășite, clarificarea regimului patrimonial al acestor cooperative, stimulente fiscale pentru investiții în zonele rurale – ar putea revitaliza și extinde în mod semnificativ contribuția cooperației de consum la bunăstarea generală.

Cauza Cooperativele agricole și de mediu din UE – catalizatori ai tranziției verzi. În contextul Pactului Ecologic European, cooperativele sunt privite ca parteneri importanți în atingerea

obiectivelor climatice și de mediu. Un exemplu vine din Danemarca, unde cooperativele de fermieri domină sectorul eolian: din anii '70, mii de cetățeni s-au asociat în cooperative pentru a instala turbine eoliene, beneficiind de un cadru legal care a garantat prioritate la conectarea la rețea și prețuri feed-in. Rezultatul: astăzi o parte semnificativă din energia eoliană a Danemarcei este produsă de comunități locale cooperatiste. În Germania, după adoptarea *Legii Energiei Regenerabile* (EEG) în 2000, a explodat numărul de *Energiegenossenschaften* (cooperative energetice) – peste 800 de astfel de cooperative formate din cetățeni și autorități locale operează panouri solare, instalații de biogaz sau micro-grids locale. Cadrul normativ german a permis municipalităților să devină membre în cooperative, facilitând parteneriate public-cetățenești pentru energie verde. În plus, legislația fiscală a fost favorabilă, tratând veniturile din aceste micro-producători la fel ca pe cele ale gospodăriilor (scutite de anumite taxe sub un prag). Această fuziune între obiectivele de mediu și forma cooperativă este un trend în întreaga Europă, recunoscut și de Comisia Europeană. În Raportul Comisiei și al OCDE din 2022 s-a evidențiat că economia socială (inclusiv cooperatives) poate contribui substanțial la economia circulară și la atenuarea schimbărilor climatice [14]. Prin urmare, statele sunt încurajate să își adapteze cadrul legislativ astfel încât să elimine barierele în calea acestor inițiative – de exemplu, să permită distribuția de energie între membrii cooperativei, să ușureze autorizarea pentru proiecte comunitare etc. Pentru RM, care se confruntă cu provocări de mediu (ex. gestionarea deșeurilor, eficiența energetică scăzută, dependența de importuri de energie), cooperativele verzi ar putea fi o soluție inovatoare. Deja mici asociații de săteni s-au unit informal pentru a achiziționa împreună utilaje de compost sau panouri fotovoltaice, dar un cadru legal clar pentru *comunitățile energetice locale* (inclusiv forma cooperativă) ar putea propulsa aceste inițiative. Practica UE arată că atunci când cetățenii devin coproprietari și beneficiari direcți ai proiectelor de mediu, susținerea publică pentru tranziția verde crește, iar implementarea tehnologiilor sustenabile se accelerează.

Studiile de caz analizate demonstrează versatilitatea cooperativelor și capacitatea lor de a se adapta la diverse nevoi – de la industrie hi-tech la incluziune socială, de la comerț rural la energie verde. Succesul lor nu depinde doar de spiritul antreprenorial al membrilor, ci și de existența unui cadru normativ stimulat și a unor politici publice inteligente. Din exemplele europene reiese clar că acolo unde statul și-a asumat un rol de partener (fie prin facilități legislative, fie prin consultare și sprijin financiar), cooperativele au prosperat și au adus beneficii tangibile societății. Aceste lecții sunt cruciale pentru RM în definirea pașilor următori.

Concluzii

Evoluția cadrului normativ al cooperativelor în RM reflectă eforturile de a acomoda această formă asociativă la economia de piață și de a valorifica tradiția cooperației în contextul actual. S-au înregistrat progrese importante – existența legilor speciale pentru cooperativele de consum, de producție și de întreprinzător a oferit baze legale clare pentru funcționarea acestor entități. Totodată, analiza comparativă relevă că legislația națională rămâne parțial aliniată la practicile europene, existând domenii unde ameliorarea este necesară: actualizarea definițiilor și tipologiilor de cooperative pentru a permite inovarea (ex. cooperative sociale, energetice), reducerea obstacolelor birocratice (ex. număr minim de membri, proceduri de înregistrare), precum și integrarea explicită a obiectivelor de dezvoltare sustenabilă (ex. prin stimulente pentru cooperativele care creează impact social sau de mediu pozitiv). Impactul cadrului normativ asupra dezvoltării sustenabile este

bidirecțional: un cadru favorabil stimulează creșterea sectorului cooperatist și, implicit, contribuția acestuia la economia locală și bunăstarea socială; invers, un cadru permisiv insuficient sau depășit poate frâna inițiativele colective și pierde oportunități de dezvoltare (rata scăzută a cooperativelor agricole în RM comparativ cu UE se poate explica parțial prin lipsa unor politici de promovare și a încrederii, aspect ce ține de climatul legislativ și instituțional). Astfel, se impune o acțiune strategică de reformă legislativă, corelată cu orientările UE și cu recomandările organismelor internaționale, pentru a crea în RM un mediu propice dezvoltării cooperativelor ca vectori ai dezvoltării sustenabile.

Recomandări

Ținând cont de cele analizate, formulăm următoarele recomandări concrete, menite să armonizeze și să îmbunătățească regimul juridic al cooperativelor în RM, în consonanță cu bunele practici europene și cu exigențele dezvoltării durabile:

- Elaborarea unui nou act normativ privind reglementarea cooperativelor, care să enunțe principiile generale cooperatiste, recunoscând explicit principiile cooperatiste internaționale (așa cum recomandă și Consiliul UE) [6].
- Reducerea numărului minim de membri fondatori la un prag accesibil (de exemplu 3 sau 5 persoane, în funcție de tipul cooperativei), aliniindu-se la practica UE. De asemenea, procedura de înregistrare și autorizare a cooperativei trebuie simplificată și digitalizată, în spiritul recomandărilor UE de a facilita economia socială [6].
- Propunem completarea cadrului legal cu dispoziții care ar permite apariția *cooperativelor sociale* (orientate spre inserția persoanelor vulnerabile și servicii sociale) și a *cooperativelor verzi* (comunități energetice locale, cooperative de mediu).
- În concordanță cu recomandările Consiliului UE din 2023 [6], Guvernul ar trebui să instituie facilități fiscale pentru cooperative, mai ales pentru cele care își demonstrează impactul social sau ecologic. Recomandăm scutirea sau reducerea impozitului pe profit reinvestit în dezvoltarea cooperativei, reduceri de impozite/taxe locale pentru cooperativele nou-înființate în mediul rural sau în domeniul verzi [6].
- În concordanță cu Recomandarea Consiliului UE, recomandăm elaborarea Strategiei naționale pentru economia socială și cooperativă, care să stabilească ținte clare (ex: creșterea numărului de cooperative active cu X% până în 2030, integrarea a Y persoane vulnerabile prin cooperative sociale, etc.) și să prevadă măsuri de implementare și indicatori de monitorizare [6]. Totodată, se recomandă instituirea unui Consiliu consultativ al cooperativelor și economiei sociale, format din reprezentanți ai Ministerului Agriculturii și Industriei Alimentare, Ministerului Dezvoltării Economice și Digitalizării, Ministerului Muncii și Protecției Sociale și ai sectorului cooperatist (Moldcoop, potențiale uniuni ale cooperativelor agricole, reprezentanți ai mediului academic și ONG), care va permite oferirea consultanțelor în procesul legislativ și ar asigura dialogul constant între decidenți și beneficiari, după modelul consiliilor consultative existente în statele UE [6].
- Pentru a fundamenta politici informate, este esențial să existe date statistice fiabile despre cooperativele din RM. Se recomandă ca Biroul Național de Statistică al RM să colecteze și să publice anual indicatori despre cooperative (număr, domenii de activitate, număr de membri, cifră de afaceri, locuri de muncă create etc.), în conformitate cu apelul

Parlamentului European de a îmbunătăți colectarea datelor privind economia socială [14]. O mai bună cunoaștere a sectorului va permite identificarea sectoarelor cu potențial și monitorizarea progreselor în timp.

- Recomandăm ca autoritățile competente să susțină dezvoltarea educației privind fenomenul cooperatist, atât în cadrul instituțiilor de învățământ profesional și superior, cât și în cele cu profil vocațional, prin integrarea unor module specifice. Totodată, se impune promovarea unor campanii de informare publică menite să crească nivelul de conștientizare și înțelegere a rolului și beneficiilor cooperativelor în societate. Implementarea principiului cooperatist al educației membrilor poate fi facilitată de stat prin parteneriate cu universități (spre exemplu, Universitatea Cooperatist-Comercială din Moldova poate juca un rol cheie), programe pilot în instituțiile de învățământ privind antreprenoriatul colectiv și schimburi de bune practici cu cooperative din UE. O populație informată cu privire la beneficiile cooperării economice va fi mai dispusă să inițieze sau să susțină cooperative locale, ceea ce în final contribuie la sustenabilitatea comunităților.

În perspectivă, implementarea acestor recomandări ar putea pregăti RM nu doar pentru armonizarea legislativă cu UE, dar și pentru a fructifica pe deplin potențialul cooperativelor ca *“motor al dezvoltării durabile și al bunăstării pentru toți”*. Contextul internațional este favorabil: anul 2025 a fost proclamat drept Anul Internațional al Cooperativelor de către ONU, ceea ce va aduce și mai mult în prim-plan importanța acestora. Prin urmare, este momentul oportun ca și RM să își reafirme angajamentul în sprijinul mișcării cooperatiste, modernizându-și cadrul normativ conform celor mai înalte standarde. Un cadru legislativ modern, armonizat cu cerințele secolului XXI și fundamentat pe valorile durabile ale cooperării, poate crea premisele necesare pentru ca formele cooperatiste să se dezvolte sustenabil. Într-un asemenea context, cooperativele ar putea deveni actori-cheie în promovarea unei economii incluzive, echitabile și responsabile față de mediu – contribuind astfel la edificarea unui model de dezvoltare sustenabilă, în beneficiul generațiilor actuale și viitoare.

Referințe

1. CARAUȘ, Vasile. Valentina Ursu în dialog cu șeful Uniunii cooperației de consum din Moldova. 17.04.2014. <https://moldova.europalibera.org/a/25351922.html>, accesat la 24.03.2025.
2. Codul Civil al RM nr.1107 din 06.06.2002. Publicat : 01-03-2019 în Monitorul Oficial Nr. 66-75 art. 132. Republicat în Monitorul Oficial nr.66-75 din 01.03.2019 art.132. https://www.legis.md/cautare/getResults?doc_id=112573&lang=ro, accesat la 01.03.2025.
3. Committee for the promotion and advancement of cooperatives. 13.10.2023. UN Secretary-General Report on cooperatives in social development released. <https://www.copac.coop/2023-un-secretary-general-report-on-cooperatives-in-social-development-released/#:~:text=The%202023%20UN%20Secretary%20General,eradication%20and%20promoting%20environmental%20sustainability>, accesat la 16.05.2025.
4. Cooperatives Europe. Our approach. <https://coopseurope.coop/our-approach/#:~:text=These%20represent%20163%20million%20individual,4%20million%20European%20citizens%20C>, accesat la 02.03.2025.
5. Cooperatives Europe. Pozition on EU Action Plan on Social Economy. <https://coopseurope.coop/publication/eu-action-plan-on-social-economy/#:~:text=1,SE%20entities%20requires%20removing%20barriers>, accesat la 19.04.2025.
6. Council of the European Union. Council Recommendation of 27 November 2023 on developing social economy framework conditions. In: Official Journal of the European Union. C/2023/1344. Publication Date: 29.11.2023. <https://www.europeansources.info/record/proposal-for-a-council-recommendation-on-developing-social-economy-framework->

conditions/#:~:text=This%20Council%20Recommendation%20calls%20on,recognition%20of%20the%20social%20economy, accesat la 19.05.2025.

7. Hotărârea Guvernului RM Nr. 56 din 17-02-2023 cu privire la aprobarea Strategiei naționale de dezvoltare agricolă și rurală pentru anii 2023-2030. Publicat : 06-04-2023 în Monitorul Oficial Nr. 117-118 art. 244. https://www.legis.md/cautare/getResults?doc_id=136318&lang=ro, accesat la 26.03.2025.
8. Legea cooperăției de consum nr. 1252-XIV din 28.09.2000. Publicat: 14-12-2000 în Monitorul Oficial Nr. 154-156 art. 1156. Versiune în vigoare din data 12.08.2005 în baza modificărilor prin LP155-XVI din 21.07.05, MO107-109/12.08.05 art.525. https://www.legis.md/cautare/getResults?doc_id=65050&lang=ro, accesat la 16.05.2025.
9. Legea RM nr. 220 din 19.10.2007 privind înregistrarea de stat a persoanelor juridice și a întreprinzătorilor individuali. Publicat : 30-11-2007 în Monitorul Oficial Nr. 184-187 art. 711. Modificat LP181 din 07.07.23, MO272-273/27.07.23 art.470; în vigoare 01.03.24, accesat la 07.05.2025. https://www.legis.md/cautare/getResults?doc_id=138261&lang=ro, accesat la 20.04.2025.
10. Legea RM privind cooperativele de întreprinzător nr. 73-XV din 12.04.2001. Publicat: 03-05-2001 în Monitorul Oficial Nr. 49-50 art. 237. https://www.legis.md/cautare/getResults?doc_id=78181&lang=ro, accesat la 14.05.2025.
11. Legea RM privind cooperativele de producție nr. 1007-XV din 25.04.2002. Publicat: 09-05-2002 în Monitorul Oficial Nr. 71-73 art. 575. Versiune în vigoare din 30.12.18 în baza modificărilor prin LP238 din 08.11.18 MO441-447 din 30.11.18 art. 709. https://www.legis.md/cautare/getResults?doc_id=110662&lang=ro, accesat la 03.05.2025.
12. Legea României nr.109/1996 privind Cooperativa de consum. https://lege5.ro/Gratuit/ge3denbz/cooperativa-de-consum-lege-109-1996?dp=giztgnzuheydo#google_vignette, accesat la 12.05.2025.
13. NICK, Romeo. How Mondragon became the world's largest co-op. August 27, 2022. <https://www.newyorker.com/business/currency/how-mondragon-became-the-worlds-largest-co-op#:~:text=How%20Mondragon%20Became%20the%20World%27s,no%20outside%20shareholders%3B%20instead%2C>, accesat la 14.04.2025.
14. Parlamentul European. Raport referitor la Planul de acțiune al UE pentru economia socială. A9-0192/2022. https://www.europarl.europa.eu/doceo/document/A-9-2022-0192_RO.html#:~:text=A,%C8%99i%20guvern%C8%9Ba%20democratic%C4%83%20sau%20participativ%C4%83, accesat la 10.05.2025.
15. Position on EU Action Plan on Social Economy. 31.03.2022. <https://coopseurope.coop/publication/eu-action-plan-on-social-economy/#:~:text=1,SE%20entities%20requires%20removing%20barriers>, accesat la 16.05.2025.
16. ȘAVGA, Larisa. Evoluții și orientări strategice de dezvoltare a cooperăției de consum din Republica Moldova / Larisa Șavga; Univ. Cooperatist-Comercială din Moldova. Chișinău: UCCM, 2018 (PIM, Iași). 268 p. ISBN 978-9975-81-041-8. https://ibn.idsi.md/sites/default/files/imag_file/Carte%20Coop%202018%2011.04.18_1.pdf#:~:text=Cooperativele%20exercit%C4%83%20un%20rol%20important,pilon%20important%20%C3%AEn%20politicele%20intern%C5%A3ionale, accesat la 21.03.2025.

EMBEDDING COOPERATIVE IDENTITY IN INTERNATIONAL TAX LAW: TREATY CLAUSES, TRANSFER PRICING REFORMS, AND FISCAL GOVERNANCE FOR DEMOCRATIC ENTERPRISE

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Abstract

Cooperative enterprises engaged in international activities face structural disadvantages under current tax systems, which are primarily designed around corporate models focused on shareholder value and profit distribution. This paper identifies three areas where international tax law fails to accommodate the legal identity and governance logic of cooperatives: bilateral tax treaties, transfer pricing rules, and carbon taxation frameworks. Bilateral tax treaties often exclude cooperatives due to narrow definitions of eligible entities, denying them access to treaty benefits and exposing them to double taxation. The paper proposes the insertion of “cooperative clauses” to explicitly recognize cooperative entities, protect reinvested surpluses, and treat federated structures as unitary economic actors. In the area of transfer pricing, standard arm’s length rules disregard the solidarity-based pricing practices common in cooperative networks. To address this, the article introduces the concept of “solidarity pricing margins” and simplified documentation models aligned with cooperative governance. Finally, carbon taxation regimes tend to favour capital-

intensive firms, marginalizing cooperatives despite their strong environmental role. The paper calls for eligibility criteria that reflect democratic ownership and local reinvestment. Together, these reforms aim to align tax law with cooperative identity, promoting legal equity, governance legitimacy, and institutional diversity in support of a democratic and sustainable economic transition.

Keywords: Cross-border cooperatives, Fiscal governance, Tax treaties, Transfer pricing, Carbon taxation, Cooperative identity

JEL: H25, H26, K34, F23, Q58

Introduction – Cooperative Identity and Fiscal Governance in the International Tax System

The expansion of cooperative enterprises beyond national borders presents critical governance challenges in the domain of international taxation. Cooperatives—by design—are democratically governed, member-oriented entities that prioritize service and reinvestment over profit distribution. Their legal identity is anchored in principles of autonomy, solidarity, and social utility. However, current international tax instruments are fundamentally shaped around corporate forms driven by shareholder value and capital accumulation. As a result, cooperatives operating across jurisdictions often encounter a legal architecture that does not recognize, support, or appropriately regulate their structural and functional specificities [9, pp. 27–29; 8, p. 18; 16, p. 92].

This misalignment is particularly evident in the interpretation and application of bilateral tax treaties, where cooperatives frequently fail to qualify for tax reliefs or protections due to the absence of formal distribution of profits or their federated legal form. Many treaties define eligible entities narrowly, referencing “persons” or “residents” with full tax liability, and implicitly presuming profit-motivated structures. This creates a significant risk of double taxation on retained surpluses—funds that, in a cooperative, are often reinvested for collective benefit or used to fund member services [2, pp. 23–25; 18, pp. 144–147].

To address this, a core proposal of this contribution is the insertion of “cooperative clauses” in bilateral tax treaties. These clauses would explicitly recognize cooperatives as eligible treaty subjects, define retained surpluses reinvested in accordance with cooperative statutes as non-distributable profit, and establish clear criteria for recognizing multi-tier cooperative structures as single economic entities for treaty purposes. Such provisions would remove ambiguity in treaty interpretation, prevent fiscal discrimination, and institutionalize the cooperative model within the international tax order [2, pp. 46–49; 17, pp. 91–93].

A second major obstacle arises in the domain of transfer pricing. Existing frameworks require intra-group transactions to reflect market-based arm’s length prices. While this standard aims to prevent base erosion and profit shifting, it does not fit cooperative realities. Federated cooperatives and cooperative groups often operate under principles of cost-sharing, mutual support, and internal solidarity, rather than competitive pricing. For example, a primary cooperative providing goods to a secondary-level marketing federation may do so at cost, as determined by member votes—not market comparables [1, pp. 100–101; 4, pp. 92–94].

Such transactions, while legitimate within cooperative governance, can be mischaracterized by tax administrations as underpricing or non-compliance, leading to tax adjustments, penalties, or recharacterization. To correct this mismatch, cooperative-sensitive “solidarity pricing margins” and simplified documentation thresholds should be introduced within transfer pricing frameworks. These would acknowledge internal cooperative pricing policies when they are democratically

approved, transparent, and aligned with the cooperative's statute and sectoral norms [1, pp. 157–158; 4, p. 95].

The third structural gap lies in the operation of carbon taxation regimes, a growing area of fiscal policy used to incentivize environmental responsibility and finance green transitions. Cooperatives—particularly in renewable energy, low-emission agriculture, and resource circularity—are natural actors in this transition. However, tax incentives, exemptions, or rebates in carbon taxation are often accessible only to firms with high capital capacity, investor profiles, or sophisticated carbon accounting. Cooperatives, despite their high social and environmental contribution, frequently lack access to these mechanisms due to their scale, ownership model, or investment capacity [3, pp. 16–17; 6, pp. 10–11; 7, p. 141; 19, pp. 75–78].

Addressing this imbalance requires designing eligibility mechanisms within carbon tax regimes that consider governance form, ownership structure, and social utility. Cooperative-owned renewable installations, for example, should benefit from reduced carbon tax rates or credits based on their decentralized structure and reinvestment of revenues into local systems. Tax policies should include metrics for democratic control, local impact, and collective benefit—expanding beyond purely financial or technological thresholds.

Taken together, these challenges illustrate a deeper structural issue: the absence of fiscal instruments that reflect the legal and governance identity of cooperatives. The international tax system continues to apply standards that presuppose corporate forms, ignoring alternative economic models rooted in mutuality, social purpose, and local reinvestment. This disconnect affects not only fiscal treatment but also legal certainty, institutional legitimacy, and long-term economic viability for cooperative enterprises [5, pp. 112–115].

By integrating cooperative clauses in treaties, solidarity-based pricing rules in transfer pricing, and cooperative-sensitive eligibility in environmental taxation, this contribution argues for a recalibration of fiscal governance that restores alignment between legal form and fiscal treatment. These proposals are grounded in established international tax practice and build on gaps and reform possibilities acknowledged in authoritative technical manuals [1, pp. 18–22; 2, p. 67; 3, p. 8].

Such reforms are essential to reinforce cooperative identity, support transparent and legitimate governance practices, and ensure that cooperative legislation at national level is not undermined by international fiscal asymmetries. They contribute to a global tax system that accommodates legal diversity, promotes equity, and empowers democratic economic actors. In doing so, they directly respond to the objectives of Section 4: Identity, Legislation and Governance of Cooperatives, promoting institutional clarity, policy coherence, and legal innovation in support of cooperative development.

Results obtained and discussions

The research conducted reveals a consistent pattern of structural misalignment between the legal identity of cooperatives and the operative logic of international tax law. By analysing current treaty practices, transfer pricing standards, and environmental taxation schemes, this contribution has demonstrated that fiscal governance instruments often fail to recognise the normative, legal, and economic distinctiveness of cooperative enterprises [1, p. 100; 2, pp. 23–25; 3, pp. 16–17]. Three core areas of concern were identified, each of which generates systemic obstacles for cooperative governance and calls for precise, technically feasible legal innovations.

1. Cooperative Clauses in Bilateral Tax Treaties: Enabling Legal Recognition and Fiscal Neutrality

The comparative analysis of bilateral tax treaties reveals a structural and persistent deficiency in the recognition of cooperatives as fully entitled fiscal subjects under international tax law. Most treaties, following the OECD and UN model conventions, define the scope of application through restrictive notions of “persons covered” (Article 1) and “residency” (Article 4), typically designed with conventional corporate forms in mind. These notions are tailored to legal entities that are capital-owned, profit-oriented, and subject to comprehensive income taxation at the entity level. As a result, they exclude or inadequately reflect cooperative enterprises whose legal, fiscal, and operational logics diverge fundamentally from investor-owned companies [2, pp. 43–47; 9, p. 30].

Cooperatives are structured around principles of democratic member control, limited or absent profit distribution, and the reinvestment of surpluses in collective or statutory purposes. In many jurisdictions, especially civil law systems, they may be taxed under special regimes that recognize their mutualistic function—such as partial exemption, entity-level transparency, or tax relief on retained earnings used for non-commercial objectives. This means that while cooperatives are indeed subject to taxation, they often do not satisfy the formal requirement of being “liable to tax in respect of all their income” under the strict terms of many treaties [2, pp. 67–69].

The consequence is a **legal and fiscal invisibility** in treaty practice. Cooperatives engaging in cross-border activities—such as agricultural consortia exporting produce, federated cooperatives coordinating regional logistics, or energy cooperatives operating across transmission zones—may be denied access to treaty benefits. These include relief from source-state withholding tax on royalties, interest, or service fees; application of reduced tax rates; and the credit method for avoiding international double taxation. In practice, this results in unjustified fiscal burdens and discrimination against legal entities that pursue social and collective goals [9, pp. 33–34].

The problem is exacerbated when cooperative activity is conducted through **federated or multi-tier structures**, which are intrinsic to the cooperative model in many sectors. In such structures, a secondary cooperative may centralize functions such as marketing, procurement, certification, or export logistics on behalf of its primary cooperative members, who are legally independent but economically integrated. Treaty rules, however, typically assess tax liability and residency at the individual entity level, without regard for internal governance mechanisms or the collective structure of cooperative groups. This formalistic approach creates a legal disconnect between the economic substance of federated cooperatives and their fiscal treatment under cross-border taxation rules.

To address this asymmetry, this paper proposes the insertion of “**cooperative clauses**” into bilateral tax treaties as a concrete legal innovation. These clauses would perform three key functions:

1. **Explicit Recognition of Cooperative Entities:** The clause would define cooperatives, as recognized under domestic law and registered in cooperative registries, as eligible “persons” under Article 1. This would ensure their access to the treaty framework without the need for interpretative litigation or discretionary rulings. It would remove uncertainty about their inclusion and affirm their legal standing alongside corporations, partnerships, and associations [2, p. 75].
2. **Clarification of Tax Liability on Retained Surpluses:** The clause would affirm that retained surpluses reinvested in accordance with cooperative statutes—such as for

community benefit, member services, or democratic development—shall not be construed as “profit distributions” for the purpose of determining liability to tax. This would align treaty interpretation with the functional realities of cooperative law and prevent exclusion based on technical non-distribution.

3. **Recognition of Federated Structures as Unified Economic Units:** The clause would provide that federated or tiered cooperative groups—wherein multiple cooperatives coordinate operations through a common governance framework—may be treated as a **unitary economic enterprise** for the application of treaty rules on permanent establishment, source income, and entitlement to relief. This would allow for tax relief mechanisms (such as withholding tax reduction or mutual agreement procedures) to be applied to the cooperative group as a whole, not just to the entity at the top of the tier [2, pp. 77–78].

These cooperative clauses would have several beneficial effects. First, they would promote **legal certainty**, giving tax administrations and cooperative enterprises clear rules on eligibility and treatment. Second, they would reduce **compliance friction and administrative burdens**, both for tax authorities unfamiliar with the cooperative model and for cooperatives required to navigate unclear treaty provisions. Third, they would promote **horizontal equity** in international tax law by ensuring that economic actors are not disadvantaged purely due to their legal form or mission orientation [9, pp. 34–35].

Importantly, such clauses would also reinforce the **internal governance logic** of cooperatives, by allowing their statutes, reinvestment obligations, and federated frameworks to be respected by fiscal authorities [8, pp. 45–46]. This would prevent the need for cooperatives to restructure or alter their decision-making procedures solely to comply with rules designed for commercial corporations. In this way, the proposed reform contributes not only to better tax law but also to the preservation and strengthening of cooperative governance itself [9, pp. 34–35].

Ultimately, the insertion of cooperative clauses would advance the principle of **fiscal neutrality**—ensuring that tax systems do not distort organisational choice or penalise non-capitalist models of enterprise [2, p. 79]. It would also respond directly to the objective of strengthening the **legal identity and institutional governance of cooperatives**. In doing so, it supports the broader agenda of inclusive fiscal governance and the recognition of legal diversity within international economic law [11, pp. 95–96].

2. Transfer Pricing and Federated Governance: Accommodating Solidarity-Based Internal Transactions

The second key finding of this study concerns the fundamental incompatibility between current international transfer pricing standards and the internal transaction logic of federated cooperative enterprises. Transfer pricing rules, both in national law and international guidelines (particularly those based on the OECD Transfer Pricing Guidelines and the UN Practical Manual on Transfer Pricing for Developing Countries), are rooted in the arm’s length principle [1, pp. 18–22; 4, pp. 40–44]. This principle requires that related entities—defined as legally distinct but economically linked—price their intra-group transactions as if they were unrelated third parties negotiating in the open market. While appropriate for profit-maximizing multinational corporations (MNEs), this approach fails to reflect the economic, legal, and institutional realities of cooperative groups [1, pp. 94–96; 9, pp. 30–31].

Federated cooperatives often consist of a primary level of local cooperatives and a secondary or tertiary structure that centralizes functions such as procurement, processing, marketing, or export coordination. These entities are legally separate but governed by shared statutes, common democratic assemblies, and joint reinvestment frameworks. Pricing decisions within this structure are typically driven by internal solidarity principles, democratic mandate, and mutual support, rather than short-term profitability or shareholder returns. Member cooperatives may deliver products to the central cooperative at a cost-based transfer value, determined by collective agreement and intended to preserve affordability, equity, and service continuity rather than to extract margin [1, pp. 157–158; 4, p. 92].

However, when evaluated through conventional transfer pricing frameworks, these transactions risk being classified as non-arm's length. In practice, this can lead to three major fiscal and administrative consequences:

1. **Adjustments to taxable income:** Tax authorities may re-price cooperative transactions using external comparables or profit-based benchmarks, inflating the cooperative's taxable base without regard to its governance-driven pricing logic [1, pp. 204–205].
2. **Recharacterisation of internal solidarity mechanisms:** Revenue pooling, service fees, or inter-branch contributions may be misinterpreted as disguised dividends or non-deductible transfers, particularly where no “commercial rationale” is discernible through market-based logic [4, pp. 92–94].
3. **Excessive documentation burdens:** Cooperatives are often required to provide benchmarking studies, comparability analyses, and master/local files designed for MNEs, even where their internal pricing policies are explicitly set by statute or member vote. This imposes disproportionate compliance costs on cooperatives, especially in the agricultural, renewable energy, and social services sectors where margins are thin and administrative capacity limited [1, pp. 219–221].

Such outcomes are not merely technical distortions—they undermine the legal identity and autonomy of cooperatives. Requiring cooperatives to simulate competitive market behavior among member-controlled entities contradicts their statutory purpose and erodes the legitimacy of their internal governance mechanisms. It also generates uncertainty, disincentivizes cross-border cooperation, and creates legal exposure for entities that operate transparently and in good faith under democratic principles [9, pp. 34–35].

In response, this paper proposes a twofold legal and administrative adjustment to the current transfer pricing paradigm:

a) Recognition of “Solidarity Pricing Margins”

Rather than requiring strict adherence to market pricing, cooperative groups should be permitted to operate within solidarity pricing margins—defined tolerance bands around standard benchmarks that reflect internal cost structures, sector-specific norms, and member-based decision-making. These margins would not exempt cooperatives from scrutiny but would allow for principled deviation from market rates, justified through internal governance documentation, member-approved pricing resolutions, and cooperative statutes [1, pp. 206–207; 4, p. 95].

The use of solidarity margins would:

- Respect the principle of proportionality in tax administration;
- Avoid reclassification of legitimate cooperative transfers as avoidance schemes;

- Reinforce transparency by aligning pricing practice with publicly registered governance rules;
- Recognize that arm's length pricing has interpretive flexibility, particularly in the presence of demonstrable economic substance and member benefit [1, pp. 208–209].

b) Simplified Documentation Regimes for Cooperatives

Transfer pricing documentation standards should be scaled to the cooperative model. Drawing inspiration from existing SME safe harbours and low-risk thresholds, the paper advocates for the development of cooperative-specific simplified documentation regimes. These would apply to entities that:

- Are registered as cooperatives under national law;
- Operate within federated or sectoral cooperative structures;
- Use pricing methodologies explicitly defined in their governance documents and approved by member assemblies [1, p. 220].

Such regimes could include:

- Template-based justifications for internal transfer prices;
- Exemption from full benchmarking where transactions are governed by statutory obligations;
- Acceptance of sectoral comparables or internal parity pricing as legitimate reference points [1, pp. 221–222].

These reforms would not dilute the principle of tax compliance. On the contrary, they would promote transparency and legal certainty by enabling cooperatives to comply in a manner consistent with their internal logic. They would also reduce the likelihood of arbitrary enforcement, encourage cooperative internationalisation, and create room for administrative cooperation between tax authorities and cooperative registries [9, pp. 35–36].

Importantly, the proposed adjustments respond directly to the broader challenge of identity and governance at the heart of this article. Federated cooperatives must not be forced to adopt the fiscal posture of investor-owned multinationals in order to function internationally. Their governance systems—anchored in mutual responsibility, non-profit distribution, and democratic control—must be recognized as legitimate determinants of how value is created and distributed within the group [8, pp. 45–46].

In this respect, the recognition of solidarity-based pricing and proportionate documentation requirements serves a dual purpose: it aligns fiscal enforcement with legal reality, and it protects the democratic functioning of the cooperative movement in the face of global regulatory harmonisation [1, p. 226].

3. Carbon Taxation and the Fiscal Exclusion of Democratic Green Actors

The third key dimension of this analysis concerns the design and application of carbon taxation regimes and related environmental fiscal policies. These instruments—intended to reduce greenhouse gas emissions and support the financing of ecological transition—are becoming a central pillar of both national and international tax systems. However, their architecture is largely built around **capital-intensive corporate models** that do not reflect the operational and governance features of cooperative enterprises [3, pp. 7–9].

Current carbon taxation schemes typically establish eligibility for incentives, credits, or reduced rates based on criteria such as high-volume emissions, levels of investment in low-carbon

technologies, participation in carbon markets, or the deployment of formal ESG reporting tools. These criteria implicitly favour large private or listed firms that possess the **technical infrastructure, legal counsel, and financial reserves** necessary to comply. In contrast, cooperatives—particularly those active in renewable energy, sustainable agriculture, local waste recovery, and mobility sharing—are **frequently excluded** from these fiscal benefits, despite their substantive contributions to environmental and social goals [3, p. 14; 6, pp. 21–24].

Several systemic factors contribute to this exclusion. First, cooperatives often operate at small or medium scale, using **decentralised and territorially rooted business models** that fall below the thresholds typically used in tax codes or emission registries. Second, they are frequently structured as non-profit or limited-profit organisations with reinvestment mandates, meaning they lack the **capital deployment profiles** commonly required for eligibility under green investment deductions or credit-based systems. Third, most cooperative entities—especially in rural or community-based settings—do not engage in carbon credit trading or advanced reporting mechanisms, further distancing them from fiscal schemes built on tradable offset markets [3, pp. 19–20].

Moreover, the **governance form of cooperatives**—anchored in democratic member control and local accountability—often remains invisible in the algorithms or eligibility matrices used by tax administrations. As a result, cooperatives may find themselves **locked out** of environmental fiscal policy, unable to access the same tax incentives, exemptions, or rate reductions available to private sector actors with less social embeddedness or long-term sustainability commitment.

To address this imbalance, the paper advances the **development of cooperative-sensitive eligibility mechanisms** within carbon tax regimes. These mechanisms are not intended to create parallel systems, but to adapt existing frameworks in ways that recognise **alternative institutional forms and non-market contributions**.

Three core proposals are outlined:

a) Adjusted Thresholds for Emissions-Based Rebates

Carbon taxation often applies rebates or reduced rates to enterprises that achieve significant emissions reductions or operate below certain emission thresholds. However, these thresholds are frequently standardised across sectors and legal forms. This paper proposes adjusting thresholds for **revenue size, territorial footprint, and governance structure**, in order to recognise the unique low-emission profile and local reinvestment dynamics of cooperatives [3, pp. 24–25]. For example, a cooperative-owned wind energy park or organic farming network should be assessed not solely on volume metrics but also on the basis of democratic governance and local impact.

b) Expanded Qualification Criteria Based on Governance and Social Performance

Eligibility criteria for environmental tax relief should explicitly include **legal and institutional indicators** such as:

- The presence of a registered cooperative statute;
- Requirements for democratic member control;
- Statutory commitments to local reinvestment and public benefit.

Incentive structures could integrate **hybrid evaluation metrics** that consider not only emissions data but also governance form, ownership decentralisation, and positive externalities generated for local ecosystems and communities [6, pp. 29–30].

c) Simplified Registration and Access Procedures

Access to green tax instruments often requires complex applications, audits, or certification systems designed for well-resourced firms. To ensure equitable access, carbon tax regimes should develop **simplified registration procedures** tailored to the cooperative sector. This may include:

- Pre-approval pathways for cooperatives registered under recognised legal frameworks;
- Standardised sustainability declarations compatible with cooperative reporting norms;
- Partnerships with cooperative federations for verification and compliance support [3, pp. 30–31].

These adjustments would significantly reduce the administrative and financial burdens faced by small and medium cooperatives, enabling broader participation in environmental tax systems without compromising governance or democratic integrity.

The reforms proposed in this chapter would not only increase the **inclusiveness and proportionality** of carbon taxation, but also enhance its **effectiveness** in promoting genuine ecological transition. By integrating cooperative values—democratic governance, social accountability, and local reinvestment—into fiscal eligibility frameworks, tax authorities could more accurately **target actors that deliver real sustainability impact**.

Moreover, these changes would foster **greater alignment between fiscal law and the governance identity of cooperatives**, preventing institutional disincentives that force socially responsible enterprises to mimic corporate forms for survival. This, in turn, supports the creation of **resilient cooperative ecosystems** capable of leading local transitions in energy, food, and resource systems.

Institutional Implications and Governance Outcomes

The findings of this study confirm that the **legal and fiscal invisibility** of cooperatives in international tax law is not merely a technical gap but a systemic deficiency with direct institutional consequences. When cooperative entities are not explicitly recognised in tax treaties, transfer pricing regulations, or carbon taxation regimes, their operations are subject to frameworks that were never designed to accommodate their principles of solidarity, reinvestment, and democratic control [2, pp. 21–23; 1, pp. 56–57; 3, pp. 7–9].

This absence of recognition creates uncertainty in the **interpretation and application of legal norms**, particularly when the legitimacy of cooperative governance mechanisms is not reflected in fiscal instruments. In practice, this translates into:

- Denial of treaty benefits due to technical non-compliance with residence or liability-to-tax conditions [2, pp. 43–45];
- The recharacterisation of intra-group solidarity transactions as abusive under transfer pricing rules [1, pp. 100–103; 4, pp. 152–153];
- Systematic exclusion from environmental tax incentives due to capital-based eligibility requirements or market-standard evaluation benchmarks [3, pp. 13–15].

These outcomes are not neutral—they disincentivise cooperative formation, weaken cross-border federations, and place democratic governance models at a structural disadvantage within the global tax order [9, pp. 28–30].

The proposed solutions—**cooperative clauses in treaties, solidarity pricing margins in transfer pricing, and inclusive eligibility mechanisms in carbon tax regimes**—are not simply corrective tools. They represent a **normative shift** in fiscal governance: a movement away from

legal monism based on the corporate archetype, and toward a model of tax regulation that reflects **legal pluralism and economic diversity** [8, pp. 19–21; 11, pp. 91–94]. These proposals do not demand the creation of parallel systems or exemptions. Rather, they advocate for the **integration of cooperative identity into the interpretive frameworks, definitions, and procedural thresholds that already exist in international tax law** [2, pp. 65–67; 1, p. 118].

Institutionally, this integration would yield multiple governance outcomes:

- It would establish **legal certainty** for cooperative groups operating internationally, reducing litigation risk and increasing predictability in tax planning [2, p. 101];
- It would reinforce **accountability structures** rooted in member governance by recognising the legal validity of democratically approved pricing and reinvestment mechanisms [1, pp. 75–76];
- It would foster **horizontal equity** in the application of tax law by ensuring that organisational form does not translate into fiscal penalty [8, pp. 45–48].

Moreover, the implementation of these measures would strengthen the **infrastructure of cooperative governance**, particularly in sectors undergoing green transition and digital transformation [6, pp. 22–25; 7, pp. 118–120]. By allowing federated cooperatives to access treaty benefits as unified economic actors, or enabling rural energy cooperatives to access green tax credits despite their scale, fiscal law would cease to be an obstacle to development and become an instrument of empowerment [3, p. 24; 5, pp. 136–138].

These reforms also have **pedagogical and policy effects**. They provide a roadmap for legislators, tax authorities, and cooperative registries to **harmonise fiscal enforcement with institutional missions**, without compromising on tax integrity [1, p. 120; 11, pp. 104–106]. By doing so, they contribute to the **re-legitimation of tax systems** at a time when public trust in fiscal fairness and institutional responsiveness is under pressure.

In a broader sense, this chapter reaffirms the **constitutional role of cooperatives** in democratic economies: not merely as market actors, but as institutional vehicles for inclusive development, participatory governance, and social resilience [9, p. 35].

Conclusions

The fiscal architecture governing international economic relations remains structurally rooted in assumptions derived from capital-based, profit-maximizing enterprise models. This article has critically examined the ways in which international tax law—particularly through bilateral tax treaties, transfer pricing standards, and carbon taxation regimes—systematically overlooks or misrepresents the identity and governance logic of cooperative enterprises. These entities, unlike corporations, operate on principles of democratic member control, non-distributive surplus reinvestment, mutual aid, and long-term service to community goals. Yet, current tax instruments continue to reflect a monocultural legal vision that does not accommodate this diversity of organisational forms.

The comparative analysis of bilateral tax treaties demonstrates that cooperatives often remain legally invisible in the definitional scope of “persons” or “residents” entitled to treaty benefits. In many cases, cooperative groups structured through federated tiers—each with distinct national registrations but operating as a unified democratic entity—face disqualification from relief mechanisms such as exemption from double taxation or access to reduced withholding rates. This

results in legal uncertainty, fiscal discrimination, and barriers to cross-border cooperative coordination. The article proposes the insertion of cooperative clauses that would correct this asymmetry by formally recognising cooperatives as eligible subjects under treaty law, protecting retained surpluses when used for statutory purposes, and treating tiered cooperative networks as unified economic actors for fiscal purposes [2, pp. 43–47].

In the field of transfer pricing, the tension between cooperative governance and fiscal enforcement becomes particularly evident. The arm's length principle, intended to prevent profit shifting among multinational enterprises, presumes that intra-group transactions occur under competitive market logic. However, federated cooperatives, by their very nature, operate through cost-sharing arrangements, solidarity pricing, and democratically approved internal transfers that lack comparables in investor-driven markets [1, pp. 7–8; 4, pp. 92–94]. This can lead to recharacterisation of legitimate cooperative transactions as tax avoidance or underpricing, resulting in fiscal penalties and audit risks. To bridge this gap, the paper advances the concept of solidarity pricing margins—defined tolerance bands around standard benchmarks that recognise sector-specific and governance-driven pricing policies. This is accompanied by a call for simplified documentation regimes modelled on low-risk entity provisions, allowing cooperatives to justify internal pricing through statutes and member-approved protocols rather than full benchmarking analyses [1, pp. 54–55].

The third dimension of the inquiry focuses on carbon taxation, a rapidly evolving area of fiscal governance with profound implications for climate justice and sustainable development. While carbon taxes aim to incentivise emission reductions and generate funding for green transition, current regimes are often inaccessible to cooperatives due to structural exclusion. Eligibility criteria—such as minimum emission levels, technological capacity, or ESG certifications—implicitly favour large investor-owned firms, sidelining smaller, decentralised, democratically controlled organisations. This is particularly problematic given the high environmental performance of cooperatives active in renewable energy, low-carbon agriculture, and community-based circular economy projects [3, pp. 16–17; 6, p. 21]. The article proposes the institutionalisation of cooperative-sensitive eligibility criteria, including adjusted thresholds, governance-based metrics, and simplified access mechanisms, which would allow green cooperatives to access rebates, tax credits, and reduced rates proportionate to their social and ecological contribution [3, pp. 24–26].

These proposals align with empirical studies confirming that cooperatives respond to crisis with stronger resilience, long-term reinvestment, and stability compared to capital-based firms [12, pp. 638–654; 13; 14, p. 312]. Research on the Italian wine and agri-food sectors further reveals that cooperative governance supports economic balance and operational continuity even in turbulent fiscal environments [15, pp. 325–330].

They also reflect a broader theoretical framework on the need for fiscal reform consistent with plural enterprise models and institutional sustainability, particularly in the context of European integration and fiscal resilience [16; 17; 18]. Moreover, they demonstrate how fiscal policy and legal design must adapt to heterogeneous organisational realities—an approach grounded in comparative legal analysis and forward-looking institutional studies [19].

Collectively, these proposals represent more than isolated technical corrections. They signal a normative reorientation of international tax law: from a system that reinforces legal uniformity based on shareholder primacy, to one that acknowledges the pluralism of enterprise forms and values fiscal justice as a dimension of institutional equity. Embedding cooperative identity into tax

law is not about creating preferential treatment, but about ensuring that entities operating under democratic, participatory, and redistributive logics are not penalised by instruments designed for radically different governance models.

From a governance perspective, the implementation of these reforms would reinforce the internal legitimacy and external visibility of cooperatives. Recognising solidarity-based pricing, legal eligibility in treaties, and inclusive climate taxation fosters an environment where cooperative enterprises can scale across borders, federate their operations, and maintain institutional coherence without having to adopt hybrid or mimic corporate forms to gain legal protection. It ensures continuity between legal personality, fiscal recognition, and governance mandates, which is critical for policy coherence and sustainable economic planning.

In contributing to the diffusion of scientific knowledge and policy innovation, the article aligns closely with the objectives of promoting sustainable development, social inclusion, and economic equity in a changing institutional environment. It offers concrete, actionable legal innovations that build bridges between academic research, cooperative governance practice, and international regulatory frameworks. Furthermore, it provides a roadmap for legislators and tax authorities to harmonise fiscal law with the principles of democratic economy, reinforcing tax compliance while enabling alternative enterprise models to thrive.

Ultimately, recognising and accommodating cooperative identity in the global tax system is not only a matter of legal fairness—it is essential for designing institutions that are resilient, inclusive, and democratically accountable. Fiscal systems that fail to reflect the diversity of legal forms risk undermining the very goals they are tasked to support: inclusive growth, ecological transition, and social cohesion. This article affirms that fiscal governance, when properly aligned with cooperative values, can become a powerful enabler of institutional innovation and collective prosperity.

References

1. UNITED NATIONS. Practical Manual on Transfer Pricing for Developing Countries. Rev. ed. New York: United Nations, 2021. 662 p. ISBN 978-92-1-159129-7.
2. UNITED NATIONS. Manual for the Negotiation of Bilateral Tax Treaties between Developed and Developing Countries. New York: United Nations, 2023. 255 p. ISBN 978-92-1-113074-8.
3. UNITED NATIONS. Carbon Taxation Handbook for Developing Countries. New York: United Nations, 2024. 112 p. ISBN 978-92-1-101471-0.
4. OECD. Transfer Pricing Guidelines for Multinational Enterprises and Tax Administrations 2022. Paris: OECD Publishing, 2022. 656 p. ISBN 978-92-64-82756-4.
5. EUROPEAN COMMISSION. A map of social enterprises and their eco-systems in Europe. Synthesis Report. Brussels: European Commission, 2015. 278 p. Available at: <https://euricse.eu/wp-content/uploads/2015/11/Synthesis-report-FINAL.pdf> (visited 07.09.2024).
6. ILO. Providing clean energy and decent jobs: The role of cooperatives in the sustainable energy sector. Geneva: International Labour Organization, 2021. 89 p. ISBN 978-92-2-035937-0.
7. UNCTAD. World Investment Report 2023: Investing in Sustainable Energy for All. New York – Geneva: United Nations, 2023. 244 p. ISBN 978-92-1-113031-1.
8. OECD. Tax Policy and Inclusive Growth. Paris: OECD Publishing, 2021. 134 p. ISBN 978-92-64-49456-9.
9. CHOMEL, P., SCHNEIDER, N. Cooperative Taxation in the 21st Century: Comparative Lessons from Europe. In: International Journal of Cooperative Law. 2023, vol. 5, no. 1, pp. 27–45. ISSN 2511-9850.
10. YUWONO, M., ELLITAN, L. The Role of Internal Audit in The Merger and Acquisition Process to Provide Added Value: A Critical Review. In: Shafin Sharia Finance and Accounting Journal. 2024, no. 4(1), pp. 17–34. ISSN 2797-5320. <https://doi.org/10.19105/sfj.v4i1.12541>
11. PÉREZ, C. Taxing for Sustainability: A Legal Framework for Green Cooperative Finance. In: European Tax Studies Quarterly. 2024, no. 2(3), pp. 89–106. ISSN 2674-2133.

12. FUSCO, F., MIGLIACCIO, G. Cooperatives and crisis: economic dynamics in Italian context. In: International Journal of Business and Globalisation. 2019, vol. 22, no. 4, pp. 638–654. ISSN 1753-3627.
13. FUSCO, F., MIGLIACCIO, G. Profitability of Italian cooperatives: the impact of geographical area and business sectors. In: 9th Annual Conference of the EuroMed Academy of Business. 2016.
14. FUSCO, F., MIGLIACCIO, G. Cooperatives and global economic crisis 2008–2013: financial dynamics. Some Considerations From Italian Context. In: Vrontis, D. et al. (eds.), EuroMed Press, 2015.
15. MIGLIACCIO, G., TUCCI, L. Economic assets and financial performance of Italian wine companies. In: International Journal of Wine Business Research. 2020, vol. 32, no. 3, pp. 325–352. ISSN 1751-1062.
16. URICCHIO, A. F., GIAMBRONE, F. Entwicklungen im italienischen Steuerrecht als Herausforderung des neuen europäischen Entwicklungsprozesses. Bari: Cacucci Editore, 2020. ISBN 978-88-6611-912-8. Available at: https://opac.bncf.firenze.sbn.it/bncfprod/searchh=def&f=author_1xx_7xx_search:%22Giambrone%2C+Filippo+Lui%22
17. URICCHIO, A. F., GIAMBRONE, F. European finance at the test of the emergency. Bari: Cacucci Editore, 2020. ISBN 978-88-6611-918-0. Available at: https://bigsearch.unibg.it/primo-explore/fulldisplay?vid=39BRG_VIEW&docid=39brg_almap2194687060004046&lang=it_IT&context=L
18. GIAMBRONE, F. New Fiscal, Monetary, Financial, Banking and Capital Perspectives of the European Union. Bari: Cacucci Editore, 2021. 276 p. ISBN 979-12-5965-002-3. Dissertation.
19. GIAMBRONE, F. Aspekte des türkischen Familienrechts unter Würdigung rechtserheblicher familienrechtlicher Aspekte des italienischen und österreichischen Rechts. Eine Rechtsvergleichung. Bari: Cacucci Editore, 2016. 319 p. ISBN 978-88-6611-549-6.

CONSIDERATIONS ON THE LEGAL NATURE OF COOPERATIVES

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Abstract

Cooperative businesses and cooperative organizations have not been the subject of in-depth theoretical research in Romanian law, mainly due to the sharp decline in the contribution of the cooperative sector in the national economy.¹ In the commercial law doctrine, cooperatives have been qualified as being a professional trader.² The economic doctrine analyses cooperatives as key actors of the social economy emphasizing both their economic and social value. Both approaches are reflected in the applicable legal regulations, as will be shown below.

Key words: cooperatives, professional trader, economic enterprise, social enterprise, cooperative values

JEL: P13, K20, K23

1. Preamble

The organization of the cooperative is underpinned by the Statement on the Cooperative Identity, adopted in 1995 by the International Cooperative Alliance (ICA)³, which includes the values and principles of the cooperative movement. According to this document, a cooperative is an

¹ See Ioan Ciochiră-Barbu – Perspective istorico-juridice privind evoluția cooperației în România (Historical-legal perspectives on the evolution of the cooperatives in Romania) – article published in Dezvoltarea inovativă, colaborativă, incluzivă a cooperativelor: teorie, practică, perspective (Innovative, collaborative and inclusive development of cooperatives: theory, practice, perspectives), p.176;

Claudia Petrescu – Cooperativa în România – actor al economiei sociale (The cooperative in Romania – actor of social economy) in Calitatea vieții, Volume 22 No. 4 (2011), pp. 409-430.

² Stanciu D Carpenaru: Tratat de drept comercial român (Treatise of Romanian Commercial Law), 6th Edition updated, 2019, Universul Juridic Publishing House, p. 46

³ International Cooperative Alliance Statement on the Cooperative Identity, ICA, 1995, available online at <https://ica.coop/en/cooperatives/cooperative-identity>

autonomous association of persons united voluntarily to meet their common economic, social and cultural needs and aspirations through a jointly owned and democratically controlled enterprise.

Cooperatives are based on the values of self-help, self-responsibility, democracy, equality, equity and solidarity. In the tradition of their founders, cooperative members believe in the ethical values of honesty, openness, social responsibility and caring for others.

The Statement on the Cooperative Identity sets out seven principles/guidelines that ensure the implementation of the cooperative values⁴, namely: voluntary and open membership; democratic member control; member economic participation; autonomy and independence; education, training and information; cooperation among cooperatives; concern for community.

The economic doctrine defines cooperatives as «organizational forms capable of adapting to economic, social, cultural and political changes due to their ability to reduce specific trading costs caused by market failures in several sectors»⁵. Other authors emphasize the role of cooperatives as key actors of the social economy that diminish market failures by being present in areas that are not profitable for private companies, provide jobs for marginalized persons, buy locally produced goods at higher prices in order to ensure local development, guarantee food safety, sell products and services at low prices to low-income communities⁶ etc.

Four models for the development of cooperatives have been identified in the economic doctrine, which emphasize either their economic role as private enterprises, or their mutuality component, promoting the interests of the members, or their component focused on satisfying the interests of the community, respectively:

- **Mutual model** – cooperatives that are private enterprises pursuing the economic interests of their members and have an economic role to correct market failures.
- **Sociological model** – cooperatives that take into consideration the interests of the community in which they operate, characterized by a “weak mutuality”, with the interests of their members not being a priority.
- **Intermediary model** – cooperative pursuing to promote the interests of their members, but also common goals for the community.
- **Quasi-public model** – cooperatives that are organized as public enterprises, their management rules are dictated by public authorities.

The doctrine concludes that cooperatives play an ambiguous role in classical economics, with no clear delimitation as to whether they are profit or non-profit oriented⁷. Cooperatives are too economically oriented to be considered non-profit organizations and too socially organized to be considered profit-oriented economic organizations. They are seen as a dual model, based on an economic and a social component, a hybrid organization, combining voluntary and commercial elements.⁸ From an economic point of view, cooperatives are small and medium-sized enterprises

⁴ See also Guidance Notes to the Cooperative Principles adopted by the Principles Committee of ICA in 2016 providing detailed guidance on the practical implementation of these principles in cooperatives, available online at <https://ica.coop/en/media/library/the-guidance-notes-on-the-co-operative-principles>.

⁵ Borzaga, C., Spear, R., eds., Trends and challenges for cooperatives and social enterprises in developed and transition countries, Trento, Edizioni, 31, 2004.

⁶ Novkovic, S., Cooperative business: the role of cooperative principles and values, in “Journal of Cooperative Studies”, 39 (1), 2006, pp. 5–16.

⁷ C. Petrescu, Op. cit., p. 414;

⁸ C. Petrescu, Op. cit., p. 414;

Levi and Davis 2008; Borzaga & others, 2009.

which are aimed at an economic interest, but also at satisfying the social needs of their members by common action and mutual assistance.⁹

2. Cooperatives – social enterprises

The concept of social economy adds a new dimension to the classical profit-making dimension of business, namely the social purpose of enterprises in order to strengthen economic and social cohesion, support communities, fight poverty, unemployment and social exclusion. The goal of the social economy is to create a sustainable, environmentally friendly and inclusive economy. In this concept, an enterprise becomes a hybrid organization, both social and economic, which aims to enhance the interests of communities. In domestic law, social economy is regulated by Law No. 219/2015 on the social economy as further amended and supplemented¹⁰. The social economy is informally referred to as the “third sector” and defined as all private economic and social activities serving the general interest, the interests of a community and/or non-material personal interests by increasing social inclusion and/or supplying goods, providing services or executing works. The social economy is based on voluntary and solidarity-based private initiative with a high degree of autonomy and responsibility and limited distribution of the profit or surplus, as appropriate, to associates or members. The social economy is based on the following principles:

- a) prioritizing the individual and the social goals over profit growth;
- b) solidarity and collective responsibility;
- c) convergence between the interests of the associate members and the general interest and/or the interests of a collectivity;
- d) democratic control by the members over the activities carried out;
- e) voluntary and free nature of association in the forms of organization specific to the social economy;
- f) distinct legal personality, autonomy of management and independence from public authorities;
- g) allocation of the largest part of the profit/financial surplus to achieve the general interest goals of a collectivity or in the personal non-material interests of the members.

The social economy contributes to the development of local communities, strengthening of economic and social cohesion, job creation, involvement of persons belonging to the vulnerable groups, in social and/or economic activities, facilitating their access to the community resources and services, development of social services.

The objectives set out in the law are achieved mainly through the following activities of general interest:

Levi, Y., Davis, P., Cooperatives as the “enfants terribles” of economics: Some implications for the social economy, in “The Journal of Socio-Economics” no. 37, 2008, pp. 2178–2188.; Borzaga, C., Depedri, S., Ermanno, T., The role of cooperative and social enterprises: a multifaceted approach for economic pluralism, in „Euricse Working Papers”, N. 000/09, 2009.

⁹ Săulean, D., Defining the Cooperative Sector in Romania, București, FDSC, 1998, available online at www.fdsc.ro

¹⁰ Article 2 of Law No. 219/2015 on the social economy, published in the Official Gazette No. 561 of 28 July 2015, as further amended and supplemented by GEO No. 33 of 30 March 2022 amending and supplementing the Law No. 219 of 2015 on the social economy, published in the Official Gazette No. 323 of 1st April 2022, approved by Law No. 240 of 20 July 2022 for the approval of the GEO No. 33 of 2022 amending and supplementing Law No. 219/2015 on the social economy, published in the Official Gazette No. 736 of 21 July 2022.

- a) manufacturing of goods, provision of services and/or execution of works contributing to the well-being of the community and its members;
- b) promotion, as a priority, of activities that can create or provide jobs for the employment of persons belonging to the vulnerable group;
- c) development of professional training programmes dedicated to persons belonging to the vulnerable group;
- d) development of social services for increasing the capacity for inclusion in the labour market of the persons belonging to the vulnerable group.

According to Article 3 para 1 a) and b) of Law No. 219/2015 on the social economy, cooperatives operating based on Law No. 1/2005 on the organization and functioning of cooperatives, republished, as further amended, and credit cooperatives operating based on the Government Emergency Ordinance No. 99/2006 on credit institutions and capital adequacy approved as amended and supplemented by Law No. 226/2007 as further amended and supplemented, may be social enterprises¹¹.

Cooperative businesses acquire the status of social enterprise if they carry out activities in the field of social economy and hold the **social enterprise certificate** issued by the County Employment Agency and Bucharest Employment Agency respectively. The certificate is conferred upon request based on the founding and operating documents, which provide that the following conditions must be entirely fulfilled:

- a) acting for social purposes and/or in the general interest of the community;

An activity of general interest is defined as any activity in the economic, cultural-artistic, social, educational, scientific field, health, sports, housing, environment protection, preservation of traditions, whose ultimate purpose is to fulfil the goals of the social economy. A social activity is defined as an activity pursuing the general interest in meeting the social needs of vulnerable groups, preventing and fighting the risk of social exclusion and promoting social inclusion.

- b) allocating at least 20% of the realized profit/surplus to the social purpose and statutory reserve;
- c) undertaking to transfer the assets remaining after liquidation to one or more social enterprises;
- d) applying the principle of social equity towards employees and directors by ensuring fair levels of wages/remuneration, between which there could be no difference more than a 1:8 ratio.

The certificate is an individual administrative act according to the provisions of Article 2 para c) of the Law on administrative disputes No. 554/2004.

The social enterprise certificate is conferred for a period of 5 years, with the possibility of extension if it is proved that the conditions based on which it was conferred are fulfilled.

¹¹ According to the law, social enterprises may be: cooperative businesses, credit cooperatives, associations and foundations, pensioners' mutual aid associations, agricultural associations, agricultural cooperatives, any other categories of legal entities, regardless of their field of activity, which entirely comply, according to their legal founding and operating documents, with the definition and principles of social economy.

3. Cooperatives – professional traders operating an economic (commercial) enterprise

Law No. 1/2005 on the organization and functioning of cooperatives, republished¹², regulates the general framework for the organization and functioning of cooperatives, namely producer and consumer cooperatives. The agricultural cooperative is organized based on Law No. 1/2005 and Law No. 566/2004 - Agricultural Cooperative Law¹³, and the credit cooperative is organized based on Law No. 200/2002¹⁴ supplemented by Government Emergency Ordinance No. 99/2006 on credit institutions and capital adequacy¹⁵. According to Article 2 of Law No. 1/2005, the cooperative system is a specific sector of the economy that operates through cooperative businesses and other forms of association at territorial and national level. **A cooperative is defined in accordance with the provisions of Article 7 para (1) as an autonomous association of natural persons and/or legal entities, as appropriate, established based on their freely expressed consent, for the purpose of promoting the economic, social and cultural interests of the cooperative members, jointly owned and democratically controlled by its members, according to the cooperative principles.** A cooperative business is an economic operator with private capital. Cooperatives are classified into primary cooperatives and secondary cooperatives. The primary cooperative is a legal entity consisting of natural persons and the secondary cooperative is a legal entity consisting of a majority of primary cooperatives and other natural persons or legal entities for the purpose of horizontal or vertical integration of the economic activities carried out by them and registered in accordance with the provisions of Law No. 1/2005.

The cooperative principles, which the legal definition of the cooperatives refers to, are set out in Article 7 para 3 of the law, being a reflection of the principles/guidelines defined in the Statement on the Cooperative Identity. These are:

- a) **Principle of voluntary and open association**, according to which cooperatives are voluntary organizations, established based on free consent and are open to all persons able to use their services and willing to accept the responsibilities of cooperative membership, without discrimination on criteria of nationality, ethnical origin, religion, political affiliation, social origin or gender;
- b) **Principle of democratic cooperative member control**, according to which cooperatives are democratic organizations controlled by their members, who actively participate in setting their policies and making decisions. The persons who serve as elected representatives are accountable to the cooperative members. In the primary cooperatives members have equal voting rights, each member having one vote regardless of the number of shares held;
- c) **Principle of member economic participation**, according to which members contribute equitably to the establishment of the property of the cooperative, exercising a democratic control over it. At least part of that property is indivisible. The cooperative members

¹² Law No. 1/2005 on the organization and functioning of cooperatives was republished in the Official Gazette no. 368 of 20 March 2014.

¹³ Law No. 566 of 2004 on the agricultural cooperatives published in the Official Gazette No. 1236 of 22 December 2004 as successively amended and supplemented including by Law No. 164 of 2016 published in the Official Gazette No. 564 of 26 July 2016.

¹⁴ Law No. 200 of 2002 for the approval of the GEO No. 97 of 2000 on credit cooperative organizations, published in the Official Gazette No. 300 of 8 May 2002.

¹⁵ GEO No. 99 of 2006 on credit institutions and capital adequacy, published in the Official Gazette No. 1027 of 27 December 2006 approved as amended by Law No. 227 of 2007 as further amended and supplemented.

usually receive a limited allowance in cash or in kind from the profit set based on the annual financial statement and the profit and loss account, proportionally to their share in the capital subscribed. The cooperative members allocate from the net profit of the cooperative the amounts necessary for achieving the following purposes: development of the cooperative, rewarding the cooperative members in relation to their participation in the business of the cooperative or supporting other activities approved by the cooperative members;

- d) **Principle of autonomy and independence of cooperatives**, according to which cooperatives are autonomous, self-help organizations controlled by their members. They enter into agreements with other natural persons or legal entities, including the government, or raise capital from external sources on terms that ensure democratic control by the cooperative members and maintain their cooperative autonomy;
- e) **Principle of education, training and information of cooperative members**, according to which cooperatives provide education and training for their members, elected representatives, executives and employees so that they can contribute effectively to the development of their cooperative. The cooperatives inform the general public, particularly young people and opinion leaders, about the nature and benefits of the cooperative system;
- f) **Principle of cooperation among cooperatives**, according to which cooperatives serve their own members and strengthen the cooperative movement by working together through local, national, regional, and international structures;
- g) **Principle of concern for community**, according to which cooperatives work for the sustainable development of their communities through policies approved by their members.

Primary cooperatives may be established according to the provisions of Article 4 of the Law in one of the following forms:

- a) **Producer cooperatives** - associations of natural persons jointly engaged in the production, marketing of goods, execution of works and provision of services, which contribute, directly or indirectly, to the development of the crafts activities of their cooperative members;
- b) **Consumer cooperatives** - associations of natural persons which jointly carry out activities of supplying cooperative members and third parties with products which they buy or produce and of providing services to their cooperative members and third parties;
- c) **Seller cooperatives** – associations of natural persons established for the purpose of selling their own products or products purchased through direct distribution or through processing and direct distribution;
- d) **Agricultural cooperatives** - associations of natural persons established for the purpose of jointly exploiting the agricultural areas owned by the cooperative members, jointly carrying out land improvement works, jointly using machinery and plant and jointly exploiting agricultural products;
- e) **Housing cooperatives** – associations of natural persons established for the purpose of building, purchasing, preserving, renovating and managing housing for their members;
- f) **Fishing cooperatives** - associations of natural persons established for the purpose of establishing fish and aquaculture farms, producing, repairing, maintaining and purchasing

equipment, machinery, installations, fishing boats, as well as fishing, processing and distributing fish products;

- g) **Transport cooperatives** - associations of natural persons established for the purpose of carrying out transport and related activities for cooperative members and third parties, for the technical and economic improvement of the transport activities carried out by the cooperative members;
- h) **Forest cooperatives** – associations of natural persons established for the purpose of developing, exploiting, regenerating and protecting the forests owned by the cooperative members, taking into account the conditions imposed by the forestry fund;
- i) **Other forms of cooperatives**, which will be established in accordance with the provisions of this law.

From the perspective of the subject of this paper, the qualification of cooperatives as legal entities that are professional traders operating an economic/commercial enterprise is based on the provisions of the Civil Code¹⁶, the Law implementing the Civil Code¹⁷ in conjunction with the provisions of Law No. 265/2002. According to Article 3 para 2 of the Civil Code, a professional trader is a natural person or legal entity operating an economic/commercial enterprise under the terms of the law. The status of professional trader is related to the form of organisation and carrying out of the activity (economic enterprise) and the formal criterion of registration in the Trade Register¹⁸. Article 8 of Law No 71/2011 sets out that the concept of “professional” stipulated in Article 3 of the Civil Code includes the categories of trader, entrepreneur, economic operator and other persons authorised to carry out economic or professional activities, as these concepts are set out in the law on the date of entry into force, and the phrases “acts of trade” and “facts of trade” respectively are replaced by the phrase “production, trade or service provision activities”. Article 6 para 1 of the same law stipulates that references to traders shall be deemed to be made to natural persons or, as appropriate, to legal entities subject to registration in the Trade Register, in accordance with the provisions of Article 1 of Law No. 26/1990 on the Trade Register¹⁹. With reference to the above-mentioned legal provisions, the judicial practice has held that the concept of ‘trader’ has not been removed from the legislation, but has been replaced in terminology by that of ‘professional’ without changing the legal content.²⁰

Cooperatives are legal entities that are professional traders, with the following arguments being relevant to this end²¹:

¹⁶ Law No. 287/2009 on the Civil Code, republished, based on Article 218 of Law No. 71/2011 for the implementation of Law No. 287/2009 on the Civil Code, published in the Official Gazette No. 505 of 15 July 2011, as further amended and supplemented.

¹⁷ Law No. 71/2011 for the implementation of Law No. 287/2009 on the Civil Code, published in the Official Gazette No. 505 of 15 July 2011, as further amended and supplemented.

¹⁸ Law No. 265 of 22 July 2022 on the Trade Register and for amending and supplementing other normative acts with an impact on the registration in the Trade Register.

¹⁹ Law No. 26/1990 on the Trade Register republished in the Official Gazette of Romania Part I No. 49 of 4 February 1998 as further amended and supplemented, repealed by Article 140 para 1 a) of Law No. 265 of 22 July 2022 on the Trade Register and for amending and supplementing other normative acts with an impact on the registration in the Trade Register.

²⁰ High Court of Cassation and Justice, Administrative and Tax Disputes Division Decision No. 3456 of 10 July 2020

²¹ Regarding the concept of the professional see also C. Gheorghe Concepte ale noului drept comercial. *Profesionistul* (Concepts of the new commercial law. The professional) in *Curierul Judiciar* No. 4/2012, p. 214.

A. Țuțuianu Mai există drept comercial? Concepte ale noului Drept comercial – *Profesionistul și întreprinderea* (Does commercial law still exist? Concepts of the new commercial law – The professional and the enterprise) in *Wallachia University Law Study XXIV Issue 2 Biblioteca Târgoviște Publishing House* 2014, pp. 83-100

- a) A cooperative is an economic operator with private capital, and the cooperative system is a specific sector of the national economy.

The activities carried out by the cooperative are production, trade or service provision activities. The economic activity is organized and systematic, is carried out on its own behalf with the aim of making a profit. The peculiarity of cooperatives is that their property is partly indivisible and part of the net profit is allocated for the development of the cooperative, rewarding cooperative members for their participation in the business of the cooperative or supporting other activities approved by the cooperative members, in accordance with the cooperative principles which are used in the interpretation and application of the law²², although according to Article 7 para 4 of Law No. 1/2005 are not of a normative nature.

Cooperatives are obliged to carry out production, trade or service provision activities exclusively with cooperative members, unless otherwise stipulated in the Articles of association. (Article 16 para (2) of Law No. 1/2005)

- b) Cooperatives have the obligations set out in the law as professional obligations of traders; registration in the Trade Register and registration in the same register of any entries concerning the acts and facts required by law, organisation and bookkeeping and running the business under the terms of lawful competition.²³
- c) Cooperatives fulfil the formal criterion of registration in the Trade Register. According to Article 4 para 1 of Law No. 265/2022, the legal persons that have the obligation of registration and disclosure in the Trade Register are the professionals of the enterprise, European enterprises, **cooperatives**, European cooperatives, credit cooperative organisations, economic interest groups and European economic interest groups with their head office in Romania, their branches and the branches of the legal entities listed with their head office abroad.

The regulation of the cooperatives is similar to that of the companies regulated by the Companies Law No. 31/1990, and that is why, in this paper, we will mainly elaborate on specific aspects, which differentiate the cooperative from the commercial company.

Cooperatives are established by a memorandum of association and bylaws, which may be concluded in the form of a single document called articles of association. The articles of association shall be concluded under private signature and shall be signed by all founding members. The authentic form of the articles of association shall be mandatory where the assets subscribed as a contribution to the share capital include immovable property. The cooperative acquires legal personality at the date of registration in the Trade Register.

The articles of association of the cooperative shall contain the clauses set out in Article 16 para 1 of Law No. 1/2005, the following statutory clauses, with particularities subject to review, such as:

²² C. Stoica Aspecte privind funcționarea societăților cooperative (Aspects on the operation of the cooperatives) in Revista de Contabilitate și Informatica de gestiune (Journal of Accounting and Management Informatics) - supplement 2006, pp. 325-329.

²³ Stanciu D. Carpenaru, Op. cit. pp. 66-90.

Angheni, Smaranda. Drept comercial. Tratat (Commercial Law. Treatise) 2nd Edition, C.H. Beck Publishing House 2022, pp. 80-81

Nemeș, Vasile. Drept comercial (Commercial Law) 5th Edition, Revised and Annotated, Editura Hamangiu Publishing House, 2023, pp. 37-38

- **Name**. According to the provisions of Article 62 of Law no. 265/2022, the trade name of the cooperative shall consist of its own name and shall be accompanied by the phrase ‘cooperative’. The trade name of the cooperative must fulfil the conditions set out in the law, i.e. it must be available, new, different from the existing ones and lawful.²⁴ The name ‘cooperative’ and the particle ‘coop’ may only be used by cooperatives established in accordance with Law No. 1/2005;
- **Members**. The primary cooperatives shall be comprised only of associates-natural persons who are cooperative members, i.e. a natural person who submits an application for membership and subscribes to the share capital of the cooperative the contribution set forth in the articles of association. The secondary cooperatives shall be comprised of a majority of primary cooperatives and other individuals or legal entities for the purpose of horizontal or vertical integration of the economic activities carried out by them. The aggregate shareholding of the primary cooperatives in the share capital of the secondary cooperative cannot be less than 67%. The cooperative business shall be established with a minimum number of members to be stipulated in the memorandum of association, but it may not be less than 5, a criterion applicable to the primary and secondary cooperatives.

Any natural person who has reached the age of 16 may be a cooperative member, i.e. a cooperative associate, a legal provision which calls into question the capacity required to conclude the articles of association. In our opinion the provisions of Article 42 of the Civil Code shall apply, as a 16-year old minor may conclude the legal act with the consent of his/her parents or legal guardian.²⁵

The legal entities participating in the establishment of the secondary cooperatives shall be considered cooperative members of these cooperatives.

The signatories of the articles of association as well as the persons who have a determining role in the establishment of the enterprise shall be considered founders. Founders may not be persons who, according to the law, are incapacitated or who have been prohibited by a final court decision from being founders as a complementary punishment for conviction for offenses against property by disregard of trust, corruption offences, embezzlement, forgery of documents, tax evasion, offenses set forth in the Law No. 129/2019 for preventing and fighting money laundering and terrorism financing, as well as for amending and supplementing certain normative acts, as amended and supplemented, or for offenses set forth in this law.

The articles of association of the cooperative may stipulate whether the cooperative member, a natural person or a legal entity, must reside or have the head office within the territory where the cooperative operates, a legal provision that emphasizes the social dimension of the cooperative. Natural persons and legal entities may become members of the cooperative enterprise if they submit an application for membership which must contain the data set out in Article 22 of the law, which is approved (resolved) at the first general meeting of the cooperative members held after the date of registration of the application. The rule set out in Article 23 of the law aims at maintaining the *intuitu personae* nature of the cooperative, with the personal skills of the members and mutual trust being relevant elements.

²⁴ St D Carpenaru, Op. cit., pp. 97-100

Băcanu I. Firma și emblema comercială (The company name and logo), Lumina lex Publishing House 1998, p. 57 et seq.

²⁵ Article 41 of the Civil Code.

According to Article 33 of the law, the following categories of relations may exist between the cooperative and its members:

- a) property-related, materialized by the obligation of the cooperative member to deposit shares and/or contributions in kind;
- b) labour-related in the case of cooperative members associated in labour and capital based on the individual employment agreement or individual employment contract, as appropriate, concluded with the cooperative to which he/she is a member;
- c) cooperative commercial for supply of products and provision of services carried out by the cooperative member for the cooperative business as an independent economic operator.

The legal rule is poorly worded. The property-related relations refer to the payment of contributions in cash and in kind, which have been subscribed through the application for membership in the cooperative and are not required to deposit the shares.

The cooperative members may not simultaneously be cooperative members in competing cooperatives and may not carry out the same trade or a competing trade on their own account and on behalf of another person.

A cooperative member may hold shares up to the limit and under the terms set out in the articles of association, without exceeding 20% of the share capital. As the share capital of the cooperative is variable, in our opinion, the limit of 20% should be related to the share capital existing at the date of the application for membership in the cooperative, the argument being that according to Article 22 para 1, the application must contain the number and total value of the shares that the member wishes to subscribe.

- **Share capital.** The share capital of the cooperative is variable and may not be less than 500 lei. It must be fully subscribed and paid up at the date of the setting up of the cooperative. The share capital shall be divided into equal shares, the nominal value of which shall be established by the articles of association and may not be less than 10 lei.

The shares are nominative, issued in material form, indivisible, non-negotiable. The corroborated provisions of Article 9 and Article 24 of the Law show that the minimum share capital of 500 lei must be fully subscribed and paid up at the date of the setting up of the cooperative.

At the date of membership in the cooperative business, each cooperative member must pay a minimum of 30% of the value of the subscribed shares, with the remaining amount to be paid within 12 months from the date of membership under the terms set out in the articles of association. It is specific for the cooperatives that until the payments have been made in full, the dividends due to the cooperative member will be withheld on account of the payments due.

- **Contributions of the members.** The articles of association must set out the subscribed and paid-up share capital, mentioning the contribution of each cooperative member in cash or in kind, the amount of the contribution in kind and the method of evaluation. Claims are not admitted as a contribution to the share capital. Although there are no express legal provisions, the benefits in labour and services cannot constitute contributions to the cooperative business.
- **General meeting.** The rules governing the general meeting of cooperative members are similar to the rules applicable to commercial companies, with the voting rights and the representation at general meetings having particular aspects.

According to Article 37 of Law 1/2005, in the primary cooperative, **each cooperative member shall be entitled to one vote, irrespective of the number of shares held**, a rule reflecting the principle of democratic control of the cooperative members, ignoring the principle of the voting right proportional to the shareholding applicable to companies.

In the secondary cooperatives, the rule is the same, each cooperative member having one vote, irrespective of the number of shares held. The articles of association may stipulate that each cooperative member shall be entitled to a limited multiple voting right proportional to its shareholding in the secondary cooperative.

According to Article 39 of the law, a cooperative member may be represented in the general meetings only by another cooperative member, according to the provisions of the articles of association. In cooperative businesses which have more than 200 cooperative members, the articles of association may stipulate that cooperative members shall be represented in the general meeting based on a representation rule, by other cooperative members authorized for this purpose. The rule set out for cooperatives is different from the rules applicable to commercial companies, which provide for the right of members/shareholders to participate and vote in the general meeting by proxy without any legal restriction concerning the person of the proxy. The cooperative members who do not have full legal capacity (16-18 years of age) participate in the general meeting through their legal representatives. In the secondary cooperatives, the members of the primary cooperative participate in the general meeting through their legal representatives, who in turn may give other persons who are cooperative members a proxy for the general meeting. In all cases the proxy is not transferable.

The legal regime of the resolutions of the general meeting is identical to that of the resolutions of the joint stock company, most of the applicable legal texts being taken over. Although there is no express legal provision, in our opinion, in cases where grounds of absolute nullity are invoked, the right of action is imprescriptible and the request for annulment may be filed by any person concerned. The members of the board of directors may not challenge the resolution of the general meeting concerning their removal from office. The request for annulment shall be filed against the cooperative, represented by the board of directors, and the case shall be heard by the Court, the Professional Disputes Division, in the territory where the cooperative has its registered office.

Management of the cooperative business

The cooperative shall be managed by a sole director or a board of directors consisting of an odd number of members, elected by secret ballot for a period of 4 years, set out in the articles of association, depending on the complexity of the business of the cooperative and the number of cooperative members. The number of members of the board of directors may not exceed 11. The first directors of the cooperative shall be appointed through the article of association by the founding members, and subsequently they shall be appointed and dismissed (“replaced” in the terminology of the law - Article 45 para 4) by the general meeting.

The legal regime of the directors of the cooperative is similar to that of the directors of the joint stock company, managed in a one-tier system, with the Law No. 1/2005 adding special conditions for the persons who are appointed as directors. Thus:

- Only an individual may be a director, legal entities being excluded as directors.

- Only an individual who is a cooperative member may be a director if he/she is fit and proper according to the conditions set out in the Article 15 of the law²⁶. If individuals who are not cooperative members and are not fit and proper are elected as directors, they shall be removed from office/deprived of rights through a resolution of the general meeting which finds that the legal provisions have been violated.
- The spouse, relatives and in-laws of the directors up to and including the third degree may not be members of the same board of directors and may not be executives of that cooperative business.
- The members of the board of directors may not be associates, shareholders, directors, executives or auditors in companies regulated by Law 31/1990, which have the same object of activity as that of the cooperative business. The breach of the prohibition shall be sanctioned with removal of the member from the board of directors and may constitute grounds for exclusion from the cooperative, incurring civil liability for the damage caused.
- The directors of the cooperative shall be entitled to a remuneration consisting of a fixed allowance set by the resolution of the general meeting, in addition to the entitlements arising from cooperative membership, excluding variable allowances rewarding performance in the management of the cooperative.
- The members of the board of directors/sole director shall begin their term of office only after they have signed the management agreement setting out the performance criteria approved by the general meeting.
- The directors of the cooperative may not hold the position of executive manager.
- The chair of the cooperative shall rightfully be the chair of the board of directors or the sole director, as appropriate. He/she is elected from among the cooperative members who have managerial skills and relevant experience in the field and represents the cooperative in relations with third parties.

The regulation of the management of the cooperative introduces some specific rules of corporate governance, namely: higher number of board members, separation of the position of chair of the board from the position of director, contracts of mandate with performance indicators, mechanisms to avoid conflicts of interest and incompatibilities, requirements on managerial skills and experience in the field of activity of the cooperative etc. On the other hand, the members of the board of directors do not meet the criterion of independence, as they are cooperative members who have material interests in the enterprise other than the fixed allowance, and do not have the relevant skills and qualifications, authority and objectivity necessary to achieve economic performance. Such aspects arise from the 'hybrid' legal nature of the cooperative, which seeks not only to make a profit, but also to promote the economic, social and cultural interests of its members, based on the principle of mutuality.

²⁶ According to Article 15 of Law No. 1/2005, “The founding members may not be persons who, according to the law, are incapacitated or have been convicted of offences against property by breach of trust, corruption offences, embezzlement, forgery of documents, tax evasion, offences stipulated in Law No. 656/2002 on the prevention and fighting of money laundering, as well as for the establishment of measures to prevent and fight the financing of terrorism, republished, as further amended, or for offences laid down in this law.” The text partly reproduces the provisions of Article 6 para 2 of the Companies Law No. 31/1990 republished as further amended and supplemented.

The management of the cooperative, with the approval of the general meeting, may be entrusted to an executive manager appointed by the board of directors following a competition under the terms set out in the articles of association. A management agreement (mandate contract) which will include performance criteria shall be concluded by the cooperative and the executive manager. The executive manager may not be a cooperative member.

Financial reviewers/auditors

The legal regime applicable to the financial reviewers/auditors of the cooperative business is similar to the one applicable to the financial reviewers/auditors of the companies regulated by Law 31/1990. The cooperatives that have up to 50 cooperative members shall have one auditor and one alternate auditor. The cooperatives that have more than 50 members shall have 3 auditors and the same number of alternates, unless the articles of association provide for a higher number. At least one auditor must be a chartered or certified accountant. The auditors shall be elected by the general meeting for a term of 3 financial years.

The financial statements of the cooperatives subject to the accounting regulations harmonized with the European Directives and international accounting standards shall be audited by financial auditors.

Transfer of shares

The articles of association of the cooperative business shall set out the number and nominal value of the shares, as well as the number of shares allocated to each cooperative member for his/her contribution. The shares shall be issued in physical form, on paper and must contain the data set out in Article 59 para 1 of the Law, similarly to the provisions applicable to the content of shares according to Article 93 para 2 of Law 31/1990, which is an anachronistic legal provision in the context of digitalization because corporate securities are issued in dematerialized form by book entry. The shares may be transferred only to members of the same cooperative at nominal value. This restrictive condition aims at preserving the *intuitu personae* nature of the cooperative business. Upon termination of cooperative membership, he/she or his/her successors shall be entitled to the payment of the equivalent value of the shares and dividends due in accordance with the annual financial statement closed at the end of the financial year of the year in which the event of termination occurred. The cooperative must pay the equivalent value of the shares within the period set out in the articles of association, which may not be more than 2 years from the date on which the entitlement arose. In the event of withdrawal from the cooperative, the right to the payment of the equivalent value of the shares shall arise at the date of notification of withdrawal in accordance with Article 27 of the law. In the case of exclusion, this right shall arise at the date of the resolution of the ordinary general meeting according to Article 28 para 2 in conjunction with Article 40 para 2 i) of the law. The shares may not be the subject of a security mortgage agreement under Article 2387 and subsequent of the Civil Code (pledge), are not negotiable securities, are not interest-bearing and may not be used to pay the personal debts of the cooperative members towards the cooperative business or third parties.

4. Cooperative bonds

The cooperative business may issue, according to the law, nominative cooperative bonds for an amount not exceeding 33% of the subscribed and paid-up share capital, as set out in the latest

annual financial statement approved by the general meeting. The phrase “according to the law” generates difficulties of interpretation. In our opinion, the law maker had in mind the issuance of bonds by public offering defined as such by the capital market legislation, namely Law 24/2017 on issuers of financial instruments and market operations, as further amended and supplemented.²⁷ From the analysis of the provisions of Article 63 para 2 of the law, it results that the issuing cooperative draws up a “subscription prospectus”, but the legal terminology in Romanian language is confusing, in reality it is a prospectus for the issue and subscription of bonds.

Cooperative bonds of the same issue must have equal nominal value and shall be issued in physical form, on paper, which is an anachronistic legal provision in the context of digitalization, the rule being that of issuing corporate securities in dematerialized form by book entry.

According to Article 63 para 2 of the law, the annual interest rate payable by the cooperative business is capped. It is established in the prospectus for the issue and may not exceed by more than 10% the reference interest rate set by the National Bank of Romania.²⁸

5. The legal regime of assets owned by the cooperative. Particularities of the liquidation of the cooperative

According to the provisions of Article 64 of Law no. 1/2005, the ownership of the cooperative is private. The property of the cooperative is composed of **divisible and indivisible parts**. According to the legal definitions set out in Article 6 para i) and j) of the law, the **divisible part** - the part of the assets of the cooperative that includes the value of the shares issued in exchange for the contribution of the cooperative members to the share capital, as well as the dividends due to the cooperative members, and the **indivisible part** - part of the assets of the cooperative, accumulated by the cooperative in the course of its business, except for the divisible part which cannot be distributed or acquired among the cooperative members.

The legal regime for the liquidation of a cooperative is similar to that of a commercial company, with important particularities regarding the distribution of net assets. According to Article 87 para 2, the assets remaining after the payment of the amounts due for the loans of the cooperative and the part divided to the cooperative members shall be transferred, based on the resolution of the general meeting of the cooperative members, to another cooperative business, according to the provisions of the articles of association. In the absence of a resolution of the general meeting, the remaining assets shall be allocated by the competent court to a cooperative business of the same form in the locality in which the head office of the cooperative is situated or in the nearest locality by an irrevocable court decision (Final court ruling according to Article 8 in conjunction with Article 81 of Law No. 76/312)²⁹.

²⁷ Law No. 24 of 21 March 2017 on issuers of financial instruments and market operations, republished in the Official Gazette No. 772 of 10 August 2021.

²⁸ Regulated by GD No. 13/2011 on statutory interest and penalty interest on monetary obligations as well as for regulating financial-tax measures in the banking sector, published in the Official Gazette No. 607 of 29 August 2011. According to Article 3 para 1 “The statutory interest rate shall be set at the reference interest rate of the National Bank of Romania, which is the monetary policy interest rate established by decision of the Board of Directors of the National Bank of Romania”.

²⁹ Law No. 76/2012 for the implementation of the Code of Civil Procedure as further amended and supplemented, published in the Official Gazette No. 365 of 30 May 2012.

The provisions of Article 6 para i) and j), Article 64 para 2, Article 87 para 2 and Article 101 of Law No. 1/2005 were subject to a constitutionality review³⁰, the authors of the exception of unconstitutionality considering that the provisions violate the private ownership rights of the cooperative members over all the assets of the association, representing in fact a measure of expropriation. The court hearing the case held that the exception of unconstitutionality was well-founded, holding that the setting of the equivalent value of the shares to which the authors of the exception of unconstitutionality are entitled following withdrawal must be related to the real value of the net assets of the cooperative and not to the nominal value of the shares, as there are no legal grounds to limit the prerogatives of the right of disposal, namely the right to divide the undivided part of the assets of the cooperative in the event of withdrawal of the members or liquidation. The setting of an indivisible part of the total assets of the cooperative is equivalent to a limitation of the right of ownership which is not permitted by the rules governing the private ownership regime, a legal regime which must be equal irrespective of the holder of the right.

The exception of unconstitutionality was dismissed, the arguments from the Decision of the Constitutional Court of Romania No. 184/2014 being essentially the following:

- Cooperative businesses are associations of natural persons jointly engaged in production, marketing of goods, execution of works and provision of services, which contribute directly or indirectly to the development of the craft activities of the cooperative members.
- With reference to the legal status of the assets owned by the cooperative, the court held that by Law No. 1/2005 the law maker has made a fundamental distinction from a commercial company in that the assets of a cooperative consist of a divisible part and an indivisible part, with the latter not being distributable among the cooperative members. It is the sovereign right of the law maker to establish different legal statutes for different legal persons.³¹
- The indivisible part is that part of the total assets of the cooperative accumulated by it in the course of its business less the divisible part, which cannot be subject to distribution or acquisition among the cooperative members. The rights of the cooperative members shall not extend to that part of the assets, which represent an accumulation from the past that belongs to the cooperative and is intended for the future development of the organization. Therefore, upon his/her withdrawal from the cooperative, the cooperative member may not receive the market value of the shares because the value of the new assets and, consequently, of the shares is given by the indivisible part of the total assets of the cooperative which most often comes from the past, being an added value determined by those who have brought a contribution to the cooperative over time.
- The ownership of the producer organizations is indivisible in relation to the cooperative members, as they are entitled only to the shares, nominative securities or stock and to their corresponding profit rates, and the movable and immovable property forming the

³⁰ Decision of the Constitutional Court of Romania No. 184 of 3rd April 2014 on the exception of unconstitutionality of the provisions of Article 6 para i) and j), Article 64 para 2, Article 87 para 2 and Article 101 of Law No. 1/2005 on the organization and functioning of cooperatives published in the Official Gazette No. 458 of 23 June 2014.

³¹ In this regard, the Constitutional Court issued the Decision No. 13 of 19 January 2005, published in the Official Gazette of Romania, Part I No. 172 of 28 February 2005; Decision No. 822 of 16 November 2006 published in the Official Gazette of Romania No. 39 of 18 January 2007.

assets of each cooperative organization is its private property. Thus, the ownership right belongs to the legal entity and is determined by the method of setting up, organization and liquidation specific to the organizers of the producer cooperative.

- The rationale of such a regulation is aimed at guaranteeing the protection of functioning and continuity of the cooperative organization, protecting the interests of the cooperative members and the assets of the cooperative business. In fact, the essence of the cooperative system is the possibility to carry on the business and not the “enrichment” of the cooperative members.

6. Conclusions

Cooperatives are professional traders-legal entities operating an economic (commercial) enterprise. From an economic perspective, cooperatives are small and medium-sized enterprises which, in addition to their economic interest, aim to meet the needs of their members through common action and mutual assistance. Cooperatives acquire the status of social enterprise if they carry out activities in the field of social economy and hold a social enterprise certificate.

Bibliography

Manuals/Books

1. Angheni, Smaranda. Drept comercial. Tratat. (Commercial Law. Treatise) 2nd Edition, C.H. Beck Publishing House, 2022.
2. Băcanu, Ion. Firma și emblema comercială (The company name and logo) Lumina lex Publishing House, 1998.
3. Borzaga, C., Spear, R., eds., Trends and challenges for co-operatives and social enterprises in developed and transition countries, Trento, Edizioni 31, 2004.
4. Cărpenaru, Stanciu D. Tratat de drept comercial român. (Treatise of Romanian Commercial Law) 6th Edition – Updated, Universul juridic Publishing House, 2019.
5. Nemeș, Vasile. Drept comercial (Commercial Law), 5th Edition, Revised and Annotated, Hamangiu Publishing House, 2023.

Articles

1. Borzaga, C., Depedri, S., Ermanno, T., The role of cooperative and social enterprises: a multifaceted approach for an economic pluralism, in „Euricse Working Papers”, No. 000/09, 2009.
2. Ciochină-Barbu, Ioan. Perspective istorico-juridice privind evoluția cooperăției în România, (Historical-legal perspectives on the evolution of the cooperatives in Romania) – article published in Dezvoltarea inovativă, colaborativă, incluzivă a cooperativelor: teorie, practică, perspective (Innovative, collaborative and inclusive development of cooperatives: theory, practice, perspectives); Vol. 1, 2018, pp. 163-187.
3. Gheorghe, C. Concepte ale noului drept comercial. Profesionistul (Concepts of the new commercial law. The professional) in Curierul Judiciar no. 4/2012.
4. Levi, Y., Davis, P., Cooperatives as the “enfants terribles” of economics: Some implications for the social economy, in “The Journal of Socio-Economics”, no. 37, 2008, pp. 2178–2188.
5. Novkovic, S., Co-operative business: the role of co-operative principles and values in “Journal of Co-operative Studies”, Vol. 39, No 1, 2006, pp. 5–16.
6. Petrescu, Claudia. Cooperativa în România – actor al economiei sociale (The Cooperative in Romania – actor of social economy) in Calitatea vieții, Vol. 22, No 4, 2011, p. 409-430.
7. Săulean, D., Defining the Cooperative Sector in Romania, Bucharest, FDSC, 1998, available online at www.fdsc.ro.
8. Stoica, C. Aspecte privind funcționarea societăților cooperative în Revista de Contabilitate și Informatica de gestiune-supliment (Aspects on the operation of the cooperatives) in Revista de Contabilitate și Informatica de gestiune (Journal of Accounting and Management Informatics)-supplement 2006, pp. 325-329.
9. Țuțuianu, A. Mai există drept comercial? Concepte ale noului drept comercial – Profesionistul și întreprinderea (Does commercial law still exist? Concepts of the new commercial law – The professional and the enterprise) in Wallachia University Law Study XXIV Issue 2 Biblioteca Târgoviște Publishing House 2014, pp. 83-100.

Normative acts

1. International Cooperative Alliance Statement on the Cooperative Identity, ICA, 1995, available online at <https://ica.coop/en/cooperatives/cooperative-identity>.

2. Guidance Notes to the Cooperative Principles adopted by the Principles Committee of ICA in 2016, available online at <https://ica.coop/en/media/library/the-guidance-notes-on-the-co-operative-principles>.
3. Law No. 219/2015 on the social economy, published in the Official Gazette No. 561 of 28 July 2015, as further amended and supplemented by GEO No. 33 of 30 March 2022 amending and supplementing the Law No. 219/2015 on the social economy, published in the Official Gazette No. 323 of 1st April 2022, approved by Law No. 240 of 20 July 2022 for the approval of the GEO No. 33 of 2022 amending and supplementing Law No. 219/ 2015 on the social economy, published in the Official Gazette No. 736 of 21 July 2022.
4. Law No. 1/2005 on the organization and operation of cooperatives was republished in the Official Gazette no. 368 of 20 March 2014.
5. Law No. 566 of 2004 on the agricultural cooperatives published in the Official Gazette No. 1236 of 22 December 2004 as successively amended and supplemented including by Law No. 164 of 2016 published in the Official Gazette No. 564 of 26 July 2016.
6. Law No. 200 of 2002 for the approval of the GEO No. 97 of 2000 on credit cooperative organizations, published in the Official Gazette No. 300 of 8 May 2002.
7. Government Emergency Ordinance No. 99 of 2006 on credit institutions and capital adequacy published in the Official Gazette No. 1027 of 27 December 2006 approved as amended by Law No. 227 of 2007 as further amended and supplemented.
8. Law No. 287/2009 on the Civil Code, republished, based on Article 218 of Law No. 71/2011 for the implementation of Law No. 287/2009 on the Civil Code, published in the Official Gazette No. 505 of 15 July 2011, as further amended and supplemented.
9. Law No. 71/2011 for the implementation of Law No. 287/2009 on the Civil Code, published in the Official Gazette No. 505 of 15 July 2011, as further amended and supplemented.
10. Law No. 265 of 22 July 2022 on the Trade Register and for amending and supplementing other normative acts with an impact on the registration in the Trade Register.
11. Law No. 26/1990 on the Trade Register republished in the Official Gazette of Romania Part I No. 49 of 4 February 1998 as further amended and supplemented, repealed by Article 140 para 1 a) of Law No. 265 of 22 July 2022 on the Trade Register and for amending and supplementing other normative acts with an impact on the registration in the Trade Register.
12. High Court of Cassation and Justice, Administrative and Tax Disputes Division Decision No. 3456 of 5 July 2020.
13. Law No. 24 of 21 March 2017 on issuers of financial instruments and market operations, republished in the Official Gazette No. 772 of 10 August 2021.
14. GD No. 13/2011 on statutory interest and penalty interest on monetary obligations as well as for regulating financial-tax measures in the banking sector, published in the Official Gazette No. 607 of 29 August 2011.
15. Law No. 76/2012 for the implementation of the Code of Civil Procedure as further amended and supplemented, published in the Official Gazette No. 365 of 30 May 2012.
16. Decision of the Constitutional Court of Romania No. 184 of 3rd April 2014 on the exception of unconstitutionality of the provisions of Article 6 para i) and j), Article 64 para 2, Article 87 para 2 and Article 101 of Law No. 1/2005 on the organization and functioning of cooperatives published in the Official Gazette No. 458 of 23 June 2014.
17. Decision of the Constitutional Court No. 13 of 19 January 2005, published in the Official Gazette of Romania, Part I No. 172 of 28 February 2005.
18. Decision of the Constitutional Court No. 822 of 16 November 2006 published in the Official Gazette of Romania No. 39 of 18 January 2007.

TAX EVASION: CAUSES, CONSEQUENCES FOR UKRAINE AND MEASURES FOR PREVENTION

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Abstract

Tax evasion is a serious problem for any country as it undermines the foundations of the fiscal system and hinders the effective financing of public programs and services. Taxes are an integral part of the functioning of the state and the provision of public goods for citizens. They are the primary source of revenue for the budget, which is used to fund education, healthcare, infrastructure, defense, and other important sectors. However, despite their importance, tax evasion remains a widespread issue in many countries around the world. Tax evasion can be defined as the deliberate concealment or reduction of tax liabilities, which is illegal and punishable by law. The aim of this study is to analyze the volume of lost tax revenues in the budget through various methods of tax evasion in Ukraine, summarize the main causes and mechanisms of tax evasion, highlight the socio-economic consequences for the national economy, and outline measures to combat tax evasion. Conclusions are drawn regarding the improvement of tax administration procedures and mandatory payments to ensure their transparency; enhancing the institutional capacity of tax authorities to ensure effective tax control; improving the quality of taxpayer services; creating favorable conditions for business activities; and strengthening requirements for compliance with tax legislation.

Keywords: taxes, tax evasion, causes and mechanisms of tax evasion, countermeasures against tax evasion

JEL: G29, H21, H22, H26

Introduction

Tax evasion is one of the most pressing economic challenges in Ukraine, significantly affecting the country's financial stability and development. Taxes play a crucial role in ensuring economic security, funding public services, and maintaining government operations. However, despite their importance, many businesses and individuals engage in tax evasion, reducing state revenues and exacerbating economic inequalities.

The issue of tax evasion in Ukraine is driven by a combination of economic, institutional, and social factors. High tax burdens, complex legislation, weak enforcement mechanisms, and corruption create an environment where tax avoidance becomes widespread. Additionally, globalization and digital technologies have enabled new methods of tax evasion, such as offshore schemes and hidden financial transactions. These practices undermine fair market competition, weaken public trust in government institutions, and contribute to the expansion of the shadow economy.

Results obtained and discussions

Tax evasion is a serious problem for every country, as it undermines the foundations of the fiscal system and prevents effective financing of public programs and services.

Taxes are an integral part of the functioning of the state and the provision of public goods to citizens. They are the main source of revenue for the budget, which is used to finance education, healthcare, infrastructure, defense and other important areas. However, despite their importance, tax evasion remains a widespread phenomenon in many countries around the world.

Tax evasion can be defined as the intentional concealment or understatement of tax liabilities, which is illegal and punishable by law.

The reasons for tax evasion are diverse and complex. The main reasons include the following.

1. Economic reasons:
 - High tax burden and complex taxation system.
 - Uneven distribution of the tax burden between different groups of taxpayers.

- Low income and profits caused by economic crises or weak economic development.
- 2. Institutional and legal factors:
 - Imperfect tax legislation and the existence of gaps and loopholes.
 - Weak tax administration system and lack of effective control mechanisms.
 - Corruption in government and tax authorities.
 - Insufficient transparency and accountability of state institutions.
- 3. Social and psychological factors:
 - Low level of tax culture and awareness of citizens.
 - Distrust of the government and the belief that the taxes paid do not bring the expected benefits.
 - Perception of taxes as an excessive burden rather than a civic duty.
 - Widespread negative stereotypes in society and a propensity for risky behavior.
- 4. Technological and globalization factors:
 - The development of information technology and the digital economy, which opens up new opportunities for evasion.
 - Globalization of financial markets and the proliferation of offshore jurisdictions.
 - Growth of cross-border transactions and complexity of their control.

A thorough understanding of the causes of tax evasion is important for developing effective strategies to counteract this negative phenomenon.

According to the official data of the State Tax Service, annual losses from tax evasion reach at least USD 7.7 billion or UAH 282 billion per year, while independent experts also estimate a similar range of UAH 200-300 billion per year.

The discrepancy in estimates can be partially explained by the fact that experts identify up to 10 common types of tax evasion in Ukraine (payroll evasion (shadow employment and envelope wages), minimization of corporate income tax, fraud, etc.). The problem itself can be divided into two broad categories: tax evasion by legal entities and individual entrepreneurs doing business in Ukraine, and the shortfall in the collection of taxes from undeclared personal income.

Businesses in Ukraine resort to such mechanisms as paying salaries in “envelopes”, “twists”, conversion centers, etc. The most significant damage in terms of the amount of taxes not paid to the budget is caused by such ways of evasion as gray imports – UAH 63-93 billion per year, salaries in “envelopes” – UAH 25-74 billion per year, and offshore schemes – UAH 22-36 billion per year (fig. 1) [1].

Tax evasion has significant social and economic consequences, namely:

- The budget does not receive tax payments
- Suspension of state programs.
- Non-payment of salaries to public sector employees.
- Reducing budget expenditures for social purposes.
- Violation of competition laws.
- Decrease in the country's investment attractiveness.
- Rising levels of economic crime and corruption.
- The withdrawal of significant amounts of capital from the country.
- Decrease in GDP.

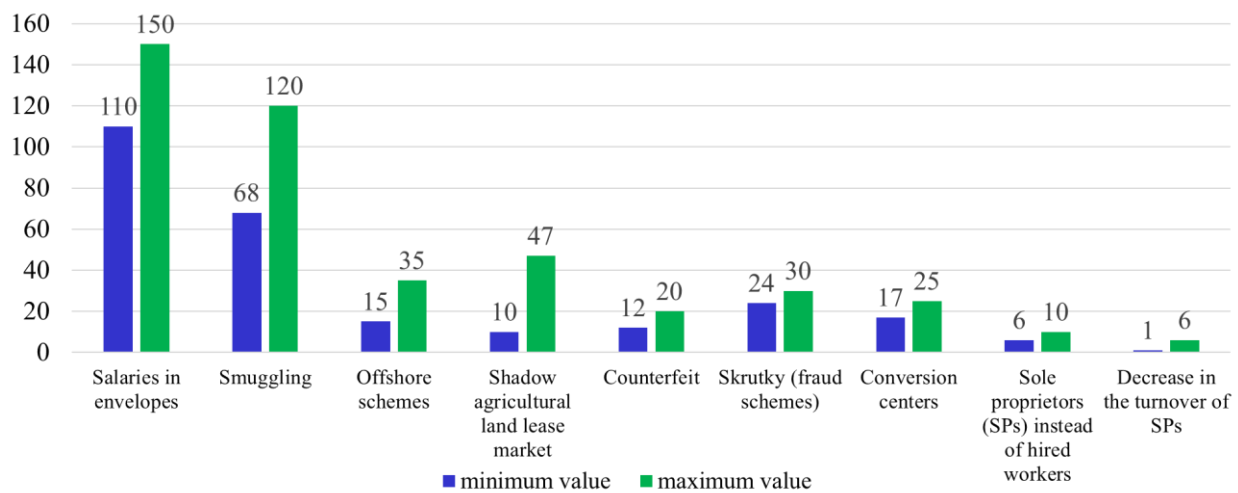


Figure 1. The amount of lost tax revenue in the budget due to tax evasion methods in Ukraine, billion uah per year

Source: developed by the authors based on [1]

Tax evasion directly leads to a significant loss of government revenue, limiting the ability to finance public services and infrastructure projects. To compensate for the lost revenue, governments may raise taxes on law-abiding citizens, which would place an unfair financial burden on compliant taxpayers. With lower incomes, the government may be forced to cut back on basic public services such as healthcare, education, and social security, which will negatively affect the quality of life.

Inaccurate tax data due to tax evasion can lead to erroneous economic policies and decisions, as the true economic picture is obscured. Tax evasion contributes to the expansion of the shadow economy, in which unregulated and untaxed businesses have an unfair competitive advantage.

Widespread tax evasion can lead to a loss of public trust in the government and its institutions, weakening the social contract. This helps to create conditions conducive to corruption and other illegal activities, as tax evaders often commit additional illegal acts.

Undoubtedly, tax evasion poses a significant threat to economic and social phenomena and processes and significantly destabilizes the development of the tax sphere, which requires the development of a set of effective countermeasures.

Preventing tax evasion is a critical priority for Ukraine's fiscal sustainability and integration into the global economy. In recent years, the government has adopted a range of coordinated measures combining digital technologies, regulatory reforms, and social initiatives to strengthen tax compliance and reduce shadow economic activity. Key directions include:

- **Modernization of tax administration.** Ukraine has significantly upgraded its tax system as part of the National Revenue Strategy 2030. Key reforms focus on digitalization, transparency, and international standards. Automated, risk-based tax audits and the introduction of e-audit platforms, including the SAF-T audit file, improve the targeting and efficiency of fiscal inspections.
- **Digitalization of financial data exchange.** Since July 2024, Ukraine has implemented the automatic exchange of tax information under CRS and Country-by-Country Reporting (CbCR) standards. These are integrated into the AOPI subsystem to enhance the detection

of cross-border profit shifting and strengthen compliance with global anti-evasion protocols.

- Control of the simplified tax system. Researchers have identified frequent misuse of Ukraine's simplified tax regime. To address this, experts propose enhanced electronic transaction monitoring, real-time tax registries, and strict verification of KVED codes. These measures reduce opportunities for income concealment and increase system transparency.
- Development of tax culture and morality. Socio-economic studies show a strong link between low trust in government and higher rates of tax evasion. Preventive measures include regular sociological surveys, educational programs on tax literacy, and public campaigns to promote responsible fiscal behavior and build long-term taxpayer compliance.

Thus, tax evasion causes significant damage to the economic and social spheres, violating the principles of fairness, undermining the competitive environment, hindering economic growth and increasing social inequality [2, p. 78]. Therefore, overcoming this phenomenon is a priority for governments around the world and requires a comprehensive approach that includes improving legislation, strengthening tax administration, increasing transparency and accountability of the authorities, and creating a culture of voluntary tax payment among citizens.

Conclusions

Tax evasion remains a critical issue in Ukraine, destabilizing the economy and limiting the government's ability to fund essential services. The main drivers of tax evasion include high tax burdens, weak enforcement, corruption, and low trust in institutions, while globalization and digital technologies have introduced more complex challenges. The consequences of tax evasion are severe, contributing to budget deficits, a weakened investment climate, and an expanding shadow economy. These issues perpetuate economic inequality, erode public trust in state institutions, and fuel corruption.

Addressing tax evasion requires urgent reforms to strengthen tax administration, improve legislation, and enhance transparency. Digitalization of tax reporting, stricter penalties for non-compliance, and effective enforcement mechanisms are essential steps toward reducing evasion. Public awareness campaigns and incentives for businesses to comply voluntarily can also foster a culture of compliance. By implementing these reforms, Ukraine can create a more stable and transparent financial environment, ensuring long-term economic security and development for both the state and its citizens.

References

1. Analytical note Application of indirect methods of tax control in Ukraine. <https://ces.org.ua/wp-content/uploads/2023/05/nepryami-metodi-podatkovogo-kontrolyu.pdf>. (vized 03.03.2025).
2. GOLOVAI, N. & BEY, S. Harmonization of the Tax Policy of Ukraine in the Terms of European Integration: Challenges, Opportunities and Prospects. *Emperio*. 2024, no 1(2), pp.76-83. ISSN (3041-1718). DOI:10.18523/3041-1718.2024.1.2.76-83/

THE FIGHT AGAINST TAX EVASION IN THE REPUBLIC OF MOLDOVA: ANALYSIS AND SOLUTIONS

LUPTA ÎMPOTRIVA EVAZIUNII FISCALE ÎN REPUBLICA MOLDOVA: ANALIZĂ ȘI SOLUȚII

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Abstract

Tax evasion is a complex problem that raises essential questions about fairness and its impact on the economy. In the Republic of Moldova, it represents a significant threat to economic stability, contributing to the weakening of the state budget and the growth of the informal economy. The analysis of this phenomenon in the national context emphasizes the use of schemes such as shell companies, offshoring and falsification of financial reports, which undermine transparency and legality. The informal economy, concentrated in key sectors such as agriculture and construction, accounts for about 23% of the country's GDP.

To effectively combat tax evasion, comprehensive measures are needed, including digitalization of tax administration, fighting corruption and creating a more transparent business environment. Compared to other regions, such as the European Union and the United States, Moldova could benefit from the introduction of automatic exchange of financial information and strict transfer pricing rules to reduce opportunities for tax evasion.

In conclusion, combating tax evasion in Moldova requires a holistic approach that includes not only domestic measures but also international cooperation. Only by strengthening fiscal discipline, increasing transparency and creating a fair tax system will Moldova reduce the shadow economy and ensure long-term sustainable economic growth.

Keywords: tax evasion, tax schemes, taxation, economy, offshore, shell companies, informal economy

JEL: H26, H30, K34

1. Introducere

Evaziunea fiscală este unul dintre cele mai complexe și actuale subiecte ale societății moderne, având un impact profund asupra economiei și stabilității sociale a fiecărei țări. În mod special, în Moldova, acest fenomen rămâne o provocare majoră, afectând veniturile statului și echitatea sistemului fiscal. Pierderile cauzate de evaziunea fiscală reduc resursele disponibile pentru investiții publice esențiale, cum ar fi infrastructura, educația și sănătatea, amplificând astfel inegalitățile sociale și economice.

În acest articol, vom analiza amploarea și metodele utilizate pentru evaziunea fiscală în Moldova și le vom compara cu situația din alte regiuni. Vom explora principalele tactici de evitare a impozitelor,

impactul acestora asupra economiei și societății, precum și măsurile care pot fi luate pentru combaterea acestui fenomen. De asemenea, vom analiza modul în care politica fiscală, reglementările legale și mecanismele de supraveghere pot influența nivelul conformității fiscale și eficiența colectării taxelor.

Este esențial să identificăm soluții pentru îmbunătățirea conformității fiscale și să găsim modalități prin care sistemul de impozitare să devină mai echitabil, astfel încât să servească atât intereselor statului, cât și ale cetățenilor. În acest context, vom examina și rolul noilor tehnologii, al cooperării internaționale și al reformelor fiscale în prevenirea și reducerea evaziunii fiscale. Înțelegerea acestor aspecte nu doar că oferă o imagine clară asupra problemei, dar poate contribui și la implementarea unor măsuri eficiente pentru asigurarea unui sistem fiscal mai transparent și sustenabil.

2. Metodologia de cercetare: metode și materiale aplicate

În cadrul analizei problemei evaziunii fiscale în Republica Moldova, au fost aplicate următoarele metode de cercetare: **metoda analitică**: studierea publicațiilor științifice și a rapoartelor internaționale relevante, cu un accent special pe analiza măsurilor implementate în alte țări și impactul acestora asupra economiei Moldovei. Această metodă permite înțelegerea dinamicii globale a evaziunii fiscale și aplicarea unor soluții adecvate contextului moldovenesc; **analiza comparativă**: examinarea strategiilor de combatere a evaziunii fiscale în Uniunea Europeană și Statele Unite ale Americii, cu scopul de a propune implementarea unor practici similare în Republica Moldova. Această abordare ajută la identificarea celor mai eficiente politici și măsuri adoptate la nivel internațional și la evaluarea posibilității adaptării acestora în Moldova; **metoda statistică**: analiza dimensiunii economiei subterane și a impactului evaziunii fiscale asupra veniturilor fiscale ale statului, precum și asupra sectoarelor economice afectate de aceste practici ilegale. Datele statistice sunt esențiale pentru o evaluare exactă a pierderilor fiscale și pentru formularea unor strategii de combatere a acestora; **studiul de caz**: în articol sunt incluse exemple concrete de cazuri de evaziune fiscală investigate în Republica Moldova, ceea ce ilustrează aplicațiile teoretice ale metodelor utilizate. De asemenea, sunt prezentate măsurile guvernamentale implementate pentru prevenirea acestor infracțiuni. Studiile de caz reflectă impactul evaziunii fiscale asupra economiei și rolul autorităților în combaterea acestui fenomen.

Sursele de informare, precum: Ministerul Finanțelor al Republicii Moldova [20], Banca Națională a Moldovei [21], Banca Mondială [22], Fondul Monetar Internațional [23] și Organizația pentru Cooperare și Dezvoltare Economică (OCDE) [24], sunt aliniate cu abordarea internațională a subiectului și au fost utilizate pentru susținerea concluziilor articolului. Sursele furnizează date esențiale și rapoarte internaționale care susțin analiza fenomenului evaziunii fiscale în Moldova și ajută la identificarea celor mai bune practici de combatere a acestuia.

3. Gradul de abordare a subiectului în literatura științifică

Studiile privind evaziunea fiscală în Republica Moldova abordează o gamă variată de aspecte, de la impactul economic al acestui fenomen până la mecanismele legale de combatere a sa. Un subiect central în literatura de specialitate este analiza impactului evaziunii fiscale asupra economiei naționale, subliniind pierderile bugetare semnificative și efectele asupra dezvoltării economice durabile. De asemenea, compararea sistemului fiscal al Republicii Moldova cu cele din Uniunea Europeană și alte economii emergente este un subiect frecvent abordat, pentru a identifica atât punctele forte, cât și slăbiciunile acestuia. Eficiența măsurilor guvernamentale de combatere a evaziunii fiscale este un alt

punct de interes major. Studiile examinează diverse politici fiscale, strategii de monitorizare și control, precum și colaborarea cu organizațiile internaționale, cum ar fi OCDE și FMI, în vederea îmbunătățirii conformității fiscale. Literatura științifică discută, de asemenea, despre impactul acestor strategii asupra comportamentului contribuabililor și despre rolul acestora în reducerea economiei informale.

Printre sursele relevante de literatură științifică se numără rapoartele și analizele publicate de organizații internaționale, cum ar fi: Banca Mondială [22] și Fondul Monetar Internațional [23], rapoartele OCDE [24] referitoare la politica fiscală și evaziunea fiscală, rapoartele analitice ale Băncii Naționale a Moldovei [21] și Ministerului Finanțelor al Republicii Moldova [20]. Aceste surse oferă o bază solidă pentru evaluarea politicilor fiscale din Republica Moldova și pentru formularea unor recomandări privind îmbunătățirea strategiilor de combatere a evaziunii fiscale.

4. Cercetare. Rezultate cheie

Evaziunea fiscală reprezintă una dintre cele mai mari provocări ale economiei moldovenești, având un impact semnificativ asupra dezvoltării economice și a veniturilor fiscale ale statului. Economia subterană, care acoperă sectoare economice importante, afectează direct stabilitatea financiară și creșterea economică a țării. În acest bloc, vom analiza amploarea problemei evaziunii fiscale, vom examina datele referitoare la pierderile fiscale, vom compara povara fiscală din Moldova cu cea din țările vecine și vom identifica principalele industrii cu risc semnificativ de evaziune fiscală.

Date privind pierderile fiscale. Evaziunea fiscală reprezintă o problemă majoră a economiei moldovenești, având un impact direct asupra dezvoltării economice a țării, deoarece o parte semnificativă din activitățile economice se desfășoară în afaceri nelegale, ceea ce încetinește creșterea economică.

În timpul elaborării acestui articol, am constatat că informațiile exacte despre pierderile financiare cauzate de evaziunea fiscală în Moldova sunt greu de obținut, iar sursele disponibile nu le acoperă în mod adecvat. Totuși, din datele disponibile, am reușit să aflăm că aproximativ 23% din populația activă a țării este implicată în economia subterană. Cele mai afectate industrii sunt: agricultura (aproximativ 61% din volumul total al economiei subterane), construcțiile (aproximativ 22%) și afacerile hoteliere și de restaurare (aproximativ 7%) [1].

Guvernul Republicii Moldova subliniază că economia subterană utilizează forță de muncă și venituri care nu sunt oficializate, iar legalizarea acestora ar putea contribui semnificativ la creșterea veniturilor fiscale și a PIB-ului [1].

Studiind aceste date, devine evident că sectorul subteran al economiei moldovenești reprezintă o parte semnificativă din totalul economiei, iar impactul său asupra pierderilor fiscale nu poate fi ignorat. În acest context, legalizarea locurilor de muncă informale și a fluxurilor financiare ar putea nu doar să crească veniturile fiscale, ci și să creeze un mediu mai transparent pentru afaceri. Combaterea corupției și stimularea activității economice legale ar putea accelera procesul de soluționare a acestei probleme.

Comparație cu alte țări din regiune. Povara fiscală reprezintă un factor esențial care influențează mediul de afaceri și nivelul de evaziune fiscală. În această secțiune, am realizat o comparație a poverii fiscale din Moldova cu cea a altor țări din regiune și am observat următoarele diferențe (Figura 1) [2].

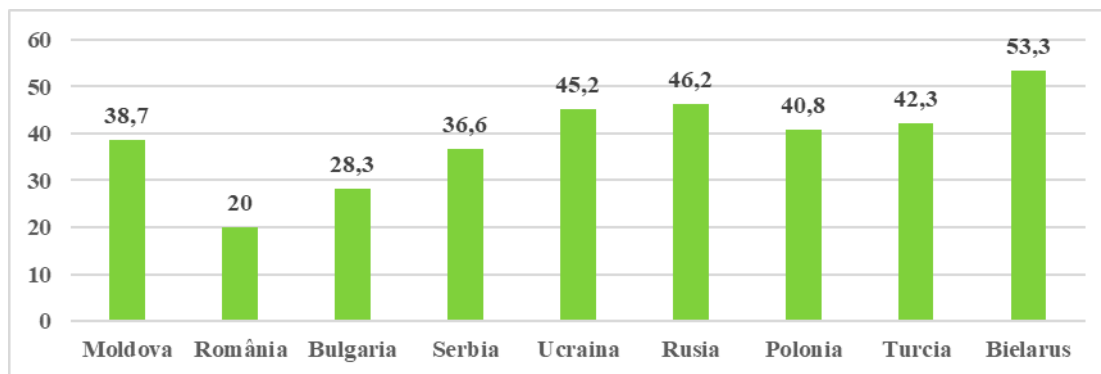


Figura 1. Compararea sarcinii fiscale în țările din regiune, %

Sursa: elaborată de autori pe baza surselor studiate

Pe baza acestor date, se poate concluziona că povara fiscală din Republica Moldova se încadrează în valorile medii comparativ cu alte țări, însă chiar și cu aceste valori, provocările legate de evaziunea fiscală rămân semnificative. Situația este agravată de un control fiscal slab și de corupția existentă [2].

Pentru a aborda eficient problema evaziunii fiscale în Moldova, este necesară o abordare cuprinzătoare. În primul rând, îmbunătățirea administrației fiscale prin implementarea tehnologiilor digitale și a unui sistem de control mai eficient este esențială. De asemenea, reducerea sarcinii fiscale asupra întreprinderilor mici și mijlocii, combaterea corupției și îmbunătățirea culturii fiscale vor contribui la diminuarea stimulentele pentru evaziune. Legalizarea locurilor de muncă informale și promovarea transparenței în afaceri vor juca un rol crucial în combaterea economiei subterane. Implementarea acestor măsuri va conduce la un sistem fiscal mai stabil și mai transparent, care va sprijini creșterea economică durabilă.

Zonele cele mai susceptibile la evaziune fiscală:

Mai jos sunt câteva dintre sectoarele economiei cele mai expuse riscului de evaziune fiscală:

- **Agricultură:** Sectorul cu cea mai mare pondere a ocupării forței de muncă informale, reprezentând aproximativ 61% [25].
- **Construcții:** Aproape 22% din forța de muncă este ocupată în economia subterană [25].
- **Sectorul hotelier și al restaurantelor:** Aproximativ 7% din forța de muncă din acest sector este neoficială [25].
- **Alte sectoare:** În jur de 10% din forța de muncă din alte sectoare operează în afaceri informale (Figura 2).

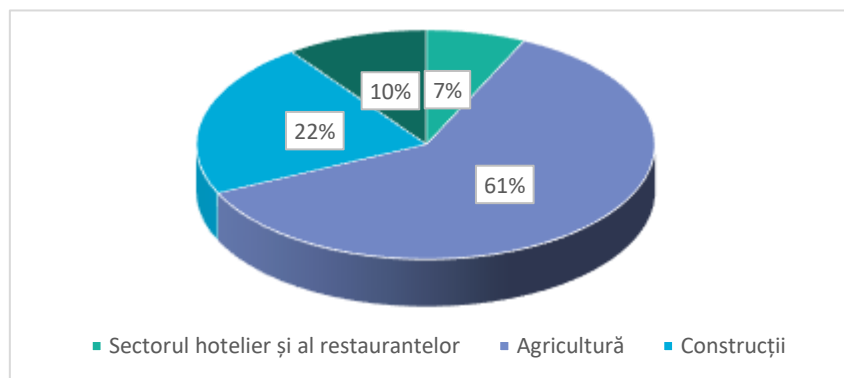


Figura 2. Sectoarele economiei cele mai vulnerabile la evaziune, %

Sursa: elaborată de autori pe baza surselor studiate

Deși nu toate sectoarele au un procentaj exact, voi integra informațiile care sunt disponibile și relevante pentru fiecare sector, pe baza studiilor și raporturilor publice.

1. **Agricultură.** Circa 61% din economia subterană provine din acest sector [26].
2. **Construcții.** 22% din economia subterană provine din acest sector [27], [28].
3. **Sectorul hotelier și al restaurantelor (HORECA):** 7% din economia subterană se află în acest sector [30], [29].
4. **Transport și logistică.** Deși nu există un procentaj fix, este un sector semnificativ expus la evaziune fiscală din cauza muncii informale (taxiuri, transport de marfă nereglementat) [31], [27].
5. **Comerțul cu amănuntul.** Pondere estimată a muncii informale în acest sector poate ajunge la aproximativ 10-15% din economia subterană, în special în piețele nereglementate și comerțul stradal [31], [27].
6. **Servicii de îngrijire personală.** Aproape 10-12% din sectorul serviciilor de frumusețe și sănătate sunt informale [29], [30].
7. **Industria divertismentului și a jocurilor de noroc.** Evaziunea fiscală în sectorul divertismentului este greu de estimat exact, dar se știe că sectorul are o pondere semnificativă în economia subterană, mai ales în ceea ce privește jocurile de noroc necontrolate [29], [26].
8. **Sectorul construcțiilor de locuințe private.** Acest sector poate reprezenta aproximativ 5-7% din economia subterană, având un număr semnificativ de lucrări neînregistrate fiscal, în special pentru construcții mici și renovări [28], [29].
9. **Sectorul medical privat.** Deși nu există statistici exacte, estimările sugerează că între 8% și 12% din veniturile acestui sector sunt nedeclarate, având în vedere că multe clinici private și cabinete medicale practică servicii în afacerea informală [29], [33].
10. **Turismul și serviciile de cazare neoficiale** Ponderea economiei subterane în acest sector poate ajunge la aproximativ 4-6%, cu cazările neînregistrate și activitățile turistice informale [32], [27].

Aceste date, deși sunt estimate în multe cazuri, reflectă provocările majore în combaterea evaziunii fiscale în sectoare esențiale din economia Moldovei. Reducerea economiei subterane în aceste domenii ar putea contribui semnificativ la creșterea veniturilor fiscale și la stimularea unui mediu de afaceri mai transparent

La următoarea concluzie am ajuns: pentru a corecta situația cu evaziunea fiscală în sectoarele-cheie ale economiei moldovenești, cum sunt agricultura, construcțiile și transporturile, este necesar să se introducă măsuri cuprinzătoare și specifice fiecărui domeniu. În agricultură, este recomandat să se ofere stimulente fiscale pentru producătorii legali și să se dezvolte un sistem de control eficient, bazat pe tehnologii digitale, pentru a reduce economia subterană. În construcții, consolidarea controlului prin digitalizarea aplicațiilor și oferirea de facilități fiscale pentru companiile oficiale ar putea reduce semnificativ evaziunea fiscală. În domeniul hotelier și al restaurantelor, implementarea sistemelor electronice de contabilitate și întărirea controalelor privind respectarea obligațiilor fiscale vor contribui la creșterea transparenței și reducerea practicilor ilegale.

Aceste măsuri sunt esențiale pentru a reduce economia subterană și pentru a spori eficiența sistemului fiscal al țării. În plus, lupta împotriva corupției și stimularea legalizării veniturilor informale și a relațiilor de muncă vor juca un rol central în crearea unui mediu de afaceri mai transparent și mai stabil. În acest fel, evaziunea fiscală poate fi combătută, iar veniturile fiscale vor crește, contribuind astfel la dezvoltarea durabilă a economiei Moldovei.

5. Scheme de bază de evaziune

Evaziunea fiscală continuă să reprezinte una dintre cele mai mari provocări pentru economia Republicii Moldova, având un impact negativ semnificativ asupra finanțelor publice și asupra mediului concurențial. Diverse metode sunt utilizate de către companii și persoane fizice pentru a ascunde veniturile, a reduce obligațiile fiscale și a înregistra ilegal venituri. În această secțiune, vom analiza cele mai frecvente scheme de evaziune fiscală întâlnite în Moldova, precum și consecințele acestora asupra economiei.

Companii fictive și "fly-by-night". Una dintre cele mai răspândite practici de evaziune fiscală în Moldova este utilizarea companiilor fictive sau "fly-by-night", care se înregistrează pentru scurt timp, doar pentru a înregistra tranzacții fictive și a înșela autoritățile fiscale. În special în sectorul agricol, aceste companii sunt utilizate pentru a ascunde volumele reale ale produselor produse și pentru a evita plata taxelor corespunzătoare [6]. De asemenea, companiile "fly-by-night" sunt implicate frecvent în rambursarea ilegală a TVA-ului și în realizarea de exporturi fictive, o practică care reprezintă o amenințare directă la adresa securității economice a țării [7]. În vederea combaterii acestor practici ilegale, Serviciul Fiscal din Moldova a introdus mecanisme de detectare timpurie a acestor scheme frauduloase [8].

Scheme de conversie. În cadrul acestui tip de evaziune, companiile utilizează contracte fictive pentru a direcționa fonduri prin intermediul unor entități care nu desfășoară activități economice reale. O practică deosebit de frecventă este implicarea companiilor care colectează fier vechi în astfel de scheme, ceea ce duce la o evaziune fiscală estimată la peste 6,5 milioane de lei [9]. Aceste practici duc la o subminare a sistemului fiscal și afectează negativ competitivitatea întreprinderilor care respectă reglementările fiscale.

Subestimarea veniturilor. Una dintre cele mai frecvente tehnici de evaziune fiscală este subestimarea veniturilor, prin ascunderea unei părți din profituri și plata salariilor "gri" (în plicuri), pentru a reduce baza impozabilă. Această practică are ca rezultat o scădere a veniturilor bugetare și distorsionarea datelor statistice privind veniturile populației [10]. Acest tip de evaziune fiscală nu doar că afectează veniturile statului, dar creează și un climat economic inechitabil, în care întreprinderile corecte sunt dezavantajate.

Utilizarea offshore-urilor. Retragera fondurilor în jurisdicții offshore, unde impozitele sunt semnificativ mai mici, reprezintă o altă schemă larg utilizată pentru a evita plata taxelor în Moldova. Utilizarea companiilor offshore pentru a transfera veniturile în afaceri externe reduce baza de impozitare a țării și împiedică dezvoltarea economiei naționale. Aceste practici reduc considerabil veniturile fiscale ale statului, împiedicând astfel implementarea de proiecte economice și sociale esențiale [11].

Frauda TVA. Frauda privind rambursarea TVA-ului este o problemă majoră pentru economia moldovenească, fiind larg răspândită în diverse sectoare ale economiei. În special în sectorul hotelier și al restaurantelor, au fost descoperite cazuri de evaziune fiscală legate de rambursarea ilegală a TVA-ului, care au dus la pierderi de peste 2 milioane de lei [12]. Aceste scheme frauduloase nu doar că afectează bugetul statului, dar afectează și competitivitatea întreprinderilor care respectă reglementările fiscale (Figura 3).

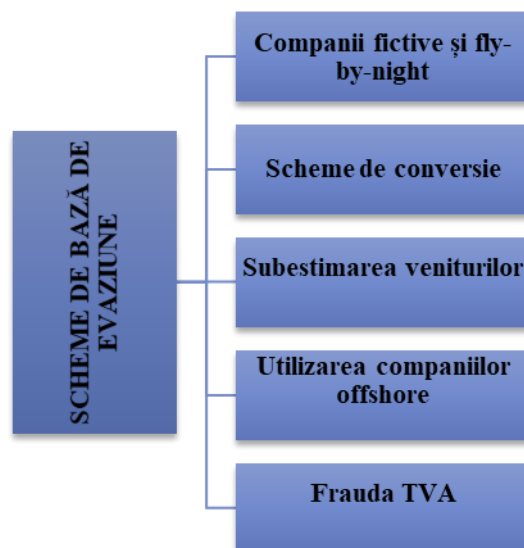


Figura 3. Principalele scheme de evitare a obligațiilor fiscale din Moldova

Sursa: elaborată de autori pe baza surselor studiate

O analiză a schemelor prezentate arată că evaziunea fiscală acoperă diferite sectoare ale economiei și este sistemică. Pentru a combate această problemă, considerăm că este necesar să consolidăm controlul fiscal, să introducem soluții digitale pentru urmărirea fluxurilor financiare, precum și să înăspriam responsabilitatea pentru schemele ilegale. În plus, transparența proceselor comerciale, simplificarea administrației fiscale și crearea de stimulente pentru activitățile juridice pot reduce amploarea economiei subterane.

Evaziunea fiscală în Moldova este alimentată de o serie de scheme sofisticate, care includ utilizarea companiilor fictive, subestimarea veniturilor, fraudă TVA și utilizarea offshore-urilor pentru a reduce impozitele. Aceste practici nu doar că subminează veniturile bugetare ale statului, dar creează și un mediu economic inechitabil, în care întreprinderile care respectă legislația fiscală sunt puse într-o poziție dezavantajată. Combaterea acestor scheme necesită o abordare integrată, care să includă măsuri precum consolidarea administrației fiscale, digitalizarea proceselor de raportare și implementarea unor controale mai riguroase pentru a descuraja astfel de practici ilegale.

6. Impactul asupra economiei și societății

Impactul evaziunii fiscale depășește cu mult fraudă financiară individuală și are un efect grav asupra economiei și societății în ansamblu. Bugetul de stat nu primește sume semnificative, ceea ce afectează direct finanțarea sectoarelor sociale esențiale. Creșterea economiei subterane creează un mediu nefavorabil pentru afaceri și complică planificarea macroeconomică, iar concurența neloială subminează reziliența întreprinderilor mici și mijlocii, erodând astfel un mediu de piață sănătos. În această secțiune, vom analiza consecințele evaziunii fiscale și măsurile care pot contribui la soluționarea acestei probleme.

În primul rând, este important să subliniem pierderile bugetare semnificative și finanțarea insuficientă a sectorului social. Neplata impozitelor reduce veniturile bugetare, limitând astfel capacitatea statului de a finanța domenii esențiale precum sănătatea, educația și aplicarea legii [13].

În numele autorilor, dorim să subliniem faptul că veniturile fiscale insuficiente afectează direct calitatea vieții cetățenilor. Fără finanțare stabilă, sectorul social se află într-o situație vulnerabilă:

instituțiile medicale nu dispun de fonduri suficiente pentru echipamente și medicamente, programele educaționale sunt restrânse, iar agențiile de aplicare a legii se confruntă cu lipsuri de resurse pentru a-și desfășura activitatea eficient. Aceste deficiențe creează un cerc vicios în care scăderea veniturilor fiscale conduce la o deteriorare a serviciilor publice, ceea ce, la rândul său, poate împinge întreprinderile și cetățenii mai adânc în economia subterană. Prin urmare, considerăm că este esențial nu doar să combatem evaziunea fiscală, ci și să creăm condiții clare, transparente și echitabile pentru a desfășura activități economice, stimulând astfel plata voluntară a impozitelor.

Mai mult, este important de subliniat răspândirea progresivă a economiei subterane. Evaziunea fiscală joacă un rol semnificativ în creșterea acestei economii ascunse, în care entitățile economice își disimulează activitățile pentru a evita povara fiscală. Această practică duce la denaturarea datelor oficiale și face imposibilă implementarea unor politici economice eficiente [10].

Dorim să evidențiem faptul că expansiunea economiei subterane reprezintă o provocare majoră atât pentru stat, cât și pentru societate. Atunci când o parte considerabilă a activităților economice este ascunsă, nu doar că se pierd venituri fiscale, dar se și distorsionează datele oficiale. Drept rezultat, guvernul nu poate evalua corect starea economică și nu poate lua măsuri eficiente. În plus, economia subterană creează condiții inechitabile pe piață: companiile care plătesc impozite în mod corect se confruntă cu o concurență neloială, iar lucrătorii din sectorul informal sunt privați de protecțiile și beneficiile sociale. Considerăm că pentru a combate acest fenomen, este esențial să consolidăm controlul fiscal, să implementăm soluții digitale pentru urmărirea fluxurilor financiare și, nu în ultimul rând, să dezvoltăm stimulente care să încurajeze afacerile să iasă din zona gri a economiei.

Ultimul aspect din această secțiune se referă la concurența neloială. Întreprinderile care se sustrag de la plata impozitelor beneficiază de avantaje neloiale față de cele care respectă legea, ceea ce subminează principiile unei competiții loiale. Acest fenomen are un impact negativ deosebit asupra întreprinderilor mici și mijlocii, care nu au resursele necesare pentru a concura cu actorii economici care profită de aceste practici neloiale [14].

Considerăm că problema concurenței neloiale generate de evaziunea fiscală are implicații semnificative. Atunci când anumite companii reduc deliberat obligațiile fiscale, iar altele respectă cu onestitate cerințele legale, se creează condiții inegale pe piață. Drept urmare, întreprinderile de bunăcredință, în special cele mici și mijlocii, se află într-o poziție defavorizată, având costuri mai mari și mai puține oportunități de a concura prin prețuri.

Pentru a aborda această problemă, considerăm că este necesar un set de măsuri cuprinzătoare: consolidarea controlului fiscal, implementarea unor sisteme automatizate pentru monitorizarea fluxurilor financiare și crearea de stimulente care să încurajeze afacerile să își desfășoare activitatea în cadrul legal. Pe termen lung, aceste măsuri vor contribui nu doar la restabilirea echilibrului pe piață, dar și la crearea unui mediu concurențial sănătos, care să sprijine inovarea și dezvoltarea economică.

Evaziunea fiscală afectează grav sistemul bugetar, economia și mediul concurențial. Aceasta conduce la scăderea calității serviciilor publice, creșterea economiei subterane și crearea unor condiții inegale pentru întreprinderi. Pentru a soluționa această problemă, propunem aplicarea unor măsuri integrative, inclusiv consolidarea controlului fiscal, digitalizarea proceselor și încurajarea plății voluntare a impozitelor. Doar prin norme de afaceri echitabile și transparente vom putea asigura o dezvoltare economică sustenabilă și îmbunătățirea calității vieții cetățenilor.

Lupta împotriva evaziunii fiscale reprezintă una dintre prioritățile principale ale politicii fiscale a Republicii Moldova. În contextul globalizării și al complexității tot mai mari a tranzacțiilor financiare, este esențial să se țină cont de standardele internaționale și de bunele practici pentru a construi un sistem

capabil să facă față infracțiunilor fiscale. În această direcție, aderarea Republicii Moldova la Cadrul Incluziv BEPS și măsurile active implementate de autoritățile fiscale pentru identificarea evaziunii fiscale au constituit pași semnificativi. În acest fragment, vor fi analizate atât eforturile interne, cât și exemplele internaționale în combaterea infracțiunilor fiscale, subliniindu-se, totodată, necesitatea unei abordări integrate și cuprinzătoare în lupta împotriva evaziunii fiscale.

Măsuri guvernamentale. În Republica Moldova, sunt implementate măsuri active pentru consolidarea controlului fiscal și creșterea transparenței tranzacțiilor financiare. Unul dintre pașii semnificativi a fost aderarea țării la Cadrul Incluziv BEPS (Erodarea bazei impozabile și transferul profiturilor) [15], care permite adoptarea standardelor internaționale în domeniul impozitării și lupta împotriva evaziunii fiscale la nivel global [16].

În numele autorilor, dorim să subliniem importanța aderării Republicii Moldova la Cadrul Incluziv BEPS [15]. Acest pas deschide noi oportunități pentru țară, nu doar în combaterea evaziunii fiscale, dar și în îmbunătățirea transparenței tranzacțiilor financiare. Implementarea standardelor internaționale contribuie nu doar la creșterea încrederii în sistemul fiscal local, dar și la o cooperare mai eficientă cu alte state în domeniul fiscal.

Totuși, este important de menționat că, în ciuda realizărilor semnificative, persistă provocări legate de corupție și de capacitatea instituțională insuficientă a autorităților fiscale. Prin urmare, pe lângă inițiativele internaționale, este esențial să continuăm îmbunătățirea mecanismelor interne de control fiscal, consolidarea structurii instituționale și implementarea reformelor care vizează combaterea infracțiunilor fiscale la nivel național.

Numai o abordare cuprinzătoare, care să includă atât cooperarea internațională, cât și eforturile interne, poate asigura succesul pe termen lung în combaterea evaziunii fiscale în Republica Moldova.

Exemple de diagrame extinse. În Republica Moldova, autoritățile fiscale identifică în mod regulat cazuri de utilizare a companiilor fictive și a persoanelor nominalizate pentru evaziune fiscală. Aceste scheme cauzează daune semnificative bugetului de stat și subminează încrederea în sistemul fiscal.

În 2023, Serviciul Fiscal de Stat (STS) a deschis 28 de cauze penale în temeiul articolului 244 "Evaziunea fiscală a întreprinderilor, instituțiilor și organizațiilor". În aceste cazuri, au fost puse sub sechestru bunuri în valoare totală de 13.335.398 lei [17].

De asemenea, în 2025, Procuratura pentru Combaterea Criminalității Organizate și Serviciul Fiscal de Stat au lansat o anchetă împotriva a patru administratori ai unor companii implicate în colectarea fierului vechi, suspectați de evaziune fiscală în valoare de peste 6,5 milioane de lei. În urma perchezițiilor, au fost confiscate sume mari de numerar, documente contabile și mijloace electronice [9].

Dorim să subliniem că aceste cazuri de evaziune fiscală, inclusiv utilizarea companiilor fantomă și a persoanelor nominalizate, reflectă gravitatea problemei în Republica Moldova. În ciuda eforturilor autorităților fiscale, astfel de scheme continuă să afecteze bugetul de stat și să erodeze încrederea cetățenilor în sistemul fiscal.

Exemplele din 2023 și 2025 arată că evaziunea fiscală rămâne o provocare majoră pentru stabilitatea economică a țării. Cauzele penale și confiscările de bunuri pentru sume semnificative evidențiază intensificarea luptei împotriva infracțiunilor fiscale, însă persistă întrebări privind eficiența și complexitatea acțiunilor întreprinse.

Pentru a face progrese reale în combaterea evaziunii fiscale, considerăm că este esențial să consolidăm controalele, să îmbunătățim mecanismele de detectare a acestor scheme și să introducem măsuri suplimentare pentru a asigura transparența în mediul de afaceri. În paralel, cooperarea dintre

diverse agenții guvernamentale, precum Parchetul și Serviciul Fiscal, ar trebui întărită pentru a combate mai eficient astfel de infracțiuni.

Experiență internațională. Uniunea Europeană pune în aplicare în mod activ schimbul automat de informații financiare între țări, ceea ce permite urmărirea fluxurilor financiare transfrontaliere și identificarea cazurilor de evaziune fiscală [18]. Statele Unite ale Americii aplică măsuri stricte pentru a reglementa prețurile de transfer și impozitarea societăților străine controlate. Aceste măsuri vizează prevenirea transferului de profituri către jurisdicții cu impozitare redusă și asigurarea unei impozitări echitabile.

Totodată, dorim să subliniem că experiența internațională în lupta împotriva evaziunii fiscale oferă instrumente și abordări eficiente care pot fi aplicate și în contextul Moldovei. În Uniunea Europeană, introducerea schimbului automat de informații financiare între țări s-a dovedit deja eficientă în urmărirea fluxurilor financiare transfrontaliere, reducând semnificativ oportunitățile de evaziune fiscală. Acest mecanism este deosebit de relevant în contextul globalizării, când companiile pot ascunde veniturile în jurisdicții externe cu regimuri fiscale favorabile.

De asemenea, în Statele Unite, măsurile stricte de reglementare a prețurilor de transfer și a impozitării companiilor străine controlate, care vizează prevenirea transferului de profituri către paradisuri fiscale, reprezintă un exemplu important pentru alte țări. Această abordare asigură o distribuție mai echitabilă a obligațiilor fiscale și previne abuzul de prețuri de transfer.

Considerăm că Moldova ar putea beneficia semnificativ de adaptarea unor astfel de practici în politica sa fiscală. Implementarea schimbului automat de informații financiare și înăsprirea controalelor privind prețurile de transfer ar ajuta țara să combată mai eficient evaziunea fiscală, îmbunătățind transparența și stimulând impozitarea echitabilă.

Astfel, lupta împotriva evaziunii fiscale în Moldova necesită o abordare cuprinzătoare, care să includă atât cooperarea internațională, cât și măsuri interne active. Aderarea la Cadrul Incluziv BEPS și introducerea schimbului automat de informații financiare deschid noi orizonturi pentru creșterea transparenței și combaterea infracțiunilor fiscale. Cu toate acestea, pentru un succes real, este necesar nu doar să îmbunătățim controlul, ci și să creăm stimulente pentru transparență în mediul de afaceri, să consolidăm structurile instituționale și să întărim cooperarea între diferitele agenții guvernamentale. Introducerea unor practici internaționale, cum ar fi reglementarea prețurilor de transfer și combaterea transferului de profituri către paradisurile fiscale, va contribui la îmbunătățirea impozitării în țară și la asigurarea unei concurențe loiale.

În plus, multe țări au implementat măsuri de reglementare a raportării fiscale transfrontaliere, cum ar fi Directiva UE privind raportarea publică a impozitelor, care contribuie la transparența activităților economice ale multinaționalelor. Aceste inițiative, alături de reglementările privind transferul de profituri, oferă un cadru puternic pentru combaterea evaziunii fiscale, care poate fi adoptat și adaptat la nevoile Moldovei pentru a consolida stabilitatea fiscală și economică.

Studiu de caz: Impactul evaziunii fiscale în sectorul construcțiilor din Republica Moldova

Sectorul construcțiilor din Republica Moldova este unul dintre cele mai afectate de fenomenul evaziunii fiscale, având un nivel ridicat de muncă informală și raportări inexacte ale veniturilor. Se estimează că aproximativ 22% din forța de muncă din acest domeniu activează în economia subterană, ceea ce duce la pierderi semnificative pentru bugetul de stat.

Un exemplu concret îl reprezintă cazul unei companii de construcții care a fost investigată de Serviciul Fiscal de Stat pentru neplata taxelor aferente salariilor angajaților. Ancheta a relevat că firma

înregistra doar o parte din venituri și plătea o mare parte a salariilor „în plic”, evitând astfel impozitele și contribuțiile sociale. În urma investigației, compania a fost obligată să achite impozitele restante și a fost sancționată conform legislației în vigoare.

Acest caz subliniază necesitatea intensificării controalelor fiscale și implementării unor măsuri de digitalizare a sistemului de raportare financiară pentru a reduce astfel de practici. De asemenea, stimulentele fiscale pentru conformitatea voluntară și campaniile de educație fiscală pot contribui la reducerea evaziunii în acest sector esențial pentru economia națională.

Pentru a completa studiul de caz privind evaziunea fiscală în Republica Moldova, vom analiza un exemplu semnificativ: cazul lui Ilan Shor și implicarea sa în fraudă bancară din 2014 [34].

Contextul cazului. În noiembrie 2014, trei bănci moldovenești – Banca de Economii, Banca Socială și Unibank – au fost implicate într-o schemă complexă de fraudă care a dus la dispariția a peste 750 de milioane de dolari, echivalentul a aproximativ 12% din PIB-ul țării la acea vreme. Ilan Shor, om de afaceri și politician moldovean, a fost identificat ca fiind principalul orchestrator al acestei scheme. Companiile afiliate lui Shor au preluat controlul asupra băncilor și au acordat împrumuturi masive unor entități asociate, fără garanții adecvate. Ulterior, aceste fonduri au fost transferate în conturi offshore, făcând dificilă urmărirea lor.

În rezultatul investigațiilor, un raport realizat de compania de audit Kroll a detaliat modul în care s-a desfășurat fraudă și a evidențiat implicarea directă a lui Ilan Shor. În martie 2015, Shor a fost reținut și plasat sub arest la domiciliu. În iunie 2017, a fost condamnat la 7,5 ani de închisoare pentru spălare de bani și fraudă. Totuși, fiind eliberat în așteptarea apelului, Shor a fugit în Israel. În aprilie 2023, Curtea de Apel a dublat sentința sa la 15 ani de închisoare și a dispus confiscarea tuturor activelor sale [35].

Impactul asupra economiei și măsurile ulterioare. Frauda bancară a avut un impact devastator asupra economiei Moldovei, ducând la o criză financiară și la pierderea încrederii publicului în instituțiile financiare. Guvernul a fost nevoit să intervină pentru a salva băncile afectate, ceea ce a pus o povară suplimentară asupra bugetului de stat. Ca răspuns, autoritățile moldovenești au implementat reforme menite să îmbunătățească transparența în sectorul bancar și să prevină astfel de incidente în viitor. De asemenea, au fost consolidate mecanismele de supraveghere și reglementare pentru a detecta și combate mai eficient evaziunea fiscală și spălarea banilor.

Acest caz subliniază importanța unei supravegheri riguroase și a unor mecanisme eficiente de control în sectorul financiar. De asemenea, evidențiază necesitatea cooperării internaționale în investigarea și recuperarea activelor provenite din activități ilegale. Pentru Republica Moldova, experiența a condus la o reevaluare a politicilor fiscale și la adoptarea unor măsuri mai stricte împotriva evaziunii fiscale și corupției.

Sectorul construcțiilor reprezintă una dintre cele mai vulnerabile industrii la fenomenul evaziunii fiscale în Republica Moldova. Acesta este caracterizat de o pondere semnificativă a muncii la negru, subdeclararea veniturilor și utilizarea schemelor frauduloase pentru evitarea obligațiilor fiscale. Un exemplu relevant îl constituie cazul investigat de Serviciul Fiscal de Stat în 2022, când mai multe companii din domeniul construcțiilor au fost implicate într-un circuit de facturi fictive cu scopul de a reduce baza impozabilă și de a evita plata TVA și a impozitului pe profit.

Investigațiile au scos la iveală că firmele respective utilizau companii fantomă pentru a emite facturi false, raportând cheltuieli inexistente. Această schemă a permis firmelor de construcții să reducă artificial impozitele datorate statului, generând pierderi fiscale de milioane de lei. Potrivit raportului Serviciului Fiscal de Stat, prejudiciul estimat a depășit suma de 50 de milioane de lei, iar în urma

acțiunilor de control, mai multe firme au fost sancționate, iar administratorii acestora – trimiși în fața instanței.

Acest caz reflectă amploarea evaziunii fiscale din sectorul construcțiilor și evidențiază necesitatea unor măsuri mai stricte de supraveghere și digitalizare a proceselor fiscale. Implementarea unor sisteme electronice avansate pentru monitorizarea tranzacțiilor și sporirea controalelor ar putea reduce semnificativ astfel de practici ilegale, contribuind la creșterea veniturilor bugetare și la stabilitatea economică a țării.

Un alt exemplu semnificativ este cazul unei companii de construcții care, în perioada 2020-2021, a fost descoperită angajând muncitori fără contracte legale și plătindu-i „la negru”. Aceasta a dus la pierderi semnificative pentru bugetul de stat, în special prin neplata contribuțiilor sociale și a impozitului pe venit. Investigația a demonstrat că peste 40% dintre angajații companiei lucrau informal, iar amenzi aplicate au depășit 10 milioane de lei.

În urma verificărilor, nu am identificat o sursă publică specifică care să confirme cazul menționat al unei companii de construcții din Republica Moldova, în perioada 2020-2021, cu peste 40% dintre angajați lucrând informal și amenzi de peste 10 milioane de lei. Totuși, există exemple relevante care evidențiază probleme similare în sectorul construcțiilor:

- **Amenzi pentru munca nedeclarată.** În 2018, angajatorii din Moldova au fost amendați cu 42 de milioane de lei pentru utilizarea muncii la negru, conform Serviciului Fiscal de Stat [36].
- **Depistarea muncii informale.** În 2024, Inspectoratul de Stat al Muncii a identificat peste 3.000 de persoane lucrând fără contracte legale, reprezentând 7% din totalul muncii nedeclarate în țară [37].
- **Impactul economic al muncii la negru.** În 2022, s-a estimat că Republica Moldova pierde anual peste 15 miliarde de lei la buget din cauza salariilor în plic și a muncii nedeclarate [38].

Aceste exemple subliniază amploarea fenomenului muncii nedeclarate în sectorul construcțiilor și necesitatea unor măsuri stricte pentru combaterea evaziunii fiscale.

7. Concluzie

În concluzie, evaziunea fiscală rămâne una dintre cele mai grave amenințări la adresa stabilității economiei și dezvoltării societății din Moldova. O analiză a modelelor de evitare existente și a impactului lor asupra diferitelor aspecte ale vieții ne permite să înțelegem mai bine amploarea problemei și importanța luării de măsuri eficiente pentru combaterea acestui fenomen. Comparăția cu alte regiuni arată că este necesară o abordare cuprinzătoare pentru a îmbunătăți disciplina fiscală, inclusiv îmbunătățirea legislației, consolidarea controlului și sensibilizarea cetățenilor cu privire la consecințele evaziunii fiscale. În cele din urmă, numai prin eforturile comune ale statului și societății putem crea un sistem care să distribuie în mod corect și eficient povara fiscală, contribuind la creșterea economică durabilă și la justiție socială.

Evaziunea fiscală rămâne o problemă semnificativă pentru economia Moldovei, afectând dezvoltarea acesteia și reducând veniturile fiscale. Economia subterană, estimată a reprezenta aproximativ 23% din totalul economiei țării, se concentrează în principal în sectoare precum agricultura, construcțiile și sectorul hotelier și al restaurantelor. Aceste practici nu doar că fragilizează stabilitatea financiară a statului, dar creează și un mediu de afaceri nereglementat, în care transparența și legalitatea sunt adesea ignorate.

Din datele disponibile, este evident că o mare parte a economiei informale se află în sectoare-cheie ale economiei moldovenești, iar legalizarea locurilor de muncă informale și a fluxurilor financiare ar putea avea un impact semnificativ asupra creșterii veniturilor fiscale și stimulării economiei. De asemenea, îmbunătățirea administrării fiscale și reducerea corupției sunt factori esențiali pentru a reduce stimulentele pentru evaziunea fiscală.

În plus, analiza altor sectoare vulnerabile la evaziune fiscală, precum transporturile, comerțul cu amănuntul, sectorul medical privat și turismul, subliniază amploarea fenomenului în diverse domenii. Se estimează că aceste sectoare contribuie, de asemenea, semnificativ la economia subterană, cu procente care variază de la 4% până la 61%, în funcție de sector. În mod particular, agricultura și construcțiile rămân cele mai expuse riscurilor de evaziune fiscală, iar în aceste domenii, aproximativ 61% și respectiv 22% din forța de muncă sunt implicate în activități informale.

Astfel, pentru a combate eficient evaziunea fiscală și a reduce economia subterană, sunt necesare măsuri cuprinzătoare, precum modernizarea administrației fiscale prin digitalizare, stimularea culturii fiscale, combaterea corupției și crearea unui mediu de afaceri transparent. Această abordare holistică va ajuta la consolidarea economiei naționale și va contribui la creșterea stabilității fiscale pe termen lung. În plus, experiența internațională, inclusiv schimbul automat de informații financiare și reglementările stricte privind prețurile de transfer, oferă instrumente valoroase care pot fi adaptate pentru a întări combaterea evaziunii fiscale în Moldova. Implementarea unor astfel de măsuri va îmbunătăți transparența, va stimula impozitarea echitabilă și va contribui la o concurență loială, având un impact semnificativ asupra economiei și stabilității fiscale ale țării.

Referințe

1. Economia subterană în Moldova: amploare și planuri de reformă. 2024. Disponibil: <https://vesti24.md/2950/> Accesat: 17.03.2025.
2. Ce taxe plătesc moldovenii? TUK. 2022. Disponibil: https://tuk.md/novosti/socium/kakie-nalogi-platjat-zhiteli-moldovy-objasnjaet-tuk/?utm_source Accesat: 17.03.2025.
3. Economia Moldovei. 2024. Disponibil: https://ru.wikipedia.org/wiki/%D0%AD%D0%BA%D0%BE%D0%BD%D0%BE%D0%BC%D0%B8%D0%BA%D0%B0_%D0%9C%D0%BE%D0%BB%D0%B4%D0%BE%D0%B2%D1%8B Accesat: 17.03.2025.
4. Se va construi mai puțin în Moldova. Disponibil: <https://noi.md/ru/obshhestvo/v-moldove-budut-menishe-stroiti-777769> Accesat: 17.03.2025.
5. Vitaly Gaidarzhii. 2025. Economie. Comerțul internațional al Moldovei în 2024: creștere a importurilor și deficit record. Disponibil: <https://laf.md/2025/01/15/%D0%BC%D0%B5%D0%B6%D0%B4%D1%83%D0%BD%D0%B0%D1%80%D0%BE%D0%B4%D0%BD%D0%B0%D1%8F-%D1%82%D0%BE%D1%80%D0%B3%D0%BE%D0%B2%D0%BB%D1%8F-%D0%BC%D0%BE%D0%BB%D0%B4%D0%BE%D0%B2%D1%8B-%D0%B2-2024-%D0%B3%D0%BE/> Accesat: 17.03.2025.
6. Pentru a evita taxele, producătorii agricoli și exportatorii folosesc suflete moarte. 2013. Disponibil: https://www.ipn.md/index.php/ru/dlya-ukhoda-ot-nalogov-selkhozproizvoditeli-i-eksportery-ispolzuyut-mertvye-dush-7966_1008068.html?utm_source=chatgpt.com Accesat: 18.03.2025.
7. Amenințare la adresa securității economice. 2008. Disponibil: <https://point.md/ru/novosti/ekonomika/ugroza-ekonomicheskoy-bezopasnosti/> Accesat: 18.03.2025.
8. Yuri LYKIY. Contabilitate si audit. 2019. Disponibil: <https://contabilitate.md/article/1268?cHash=85f6f3ce2d0f6ea93576a1a4595be012&> Accesat: 18.03.2025.
9. Anna Vypritskikh. În Moldova, companiile implicate în colectarea fierului vechi sunt suspectate de evaziune fiscală pentru 6,5 milioane de lei. 2025. Disponibil: <https://newsmaker.md/ru/v-moldove-kompanii-zanimayushiesya-sborom-metallolom-podozrevayut-v-uklonenii-ot-uplaty-nalogov-na-65-mln-leev> Accesat: 18.03.2025.
10. Aguzarova L.A., Aguzarova F.S., Burnatseva O.O. Evaziune fiscală. Revista "Economie teoretică" Nr.2, 2019 www.theoreticaleconomy.ru Disponibil: <https://cyberleninka.ru/article/n/uklonenie-ot-uplaty-nalogov-1?> Accesat: 19.03.2025.
11. Pimenov Nikolay, Rodionov Dmitry. Optimizarea plăților fiscale folosind offshore-uri: probleme și riscuri. Managementul fiscal. Disponibil: https://studme.org/100093/buhgalterskiy_uchet_i_audit/optimizatsiya_nalogovyh_platezhey_ispolzovaniem_ofshorov_problem

- y_riski Accesat: 19.03.2025.
12. În sectorul HoReCa, a fost dezvăluită evaziune fiscală în valoare de peste 2 milioane de lei. 2024. Disponibil: <https://noi.md/ru/obshhestvo/v-sfere-horeca-vyyavleno-uklonenie-ot-uplaty-nalogov-na-summu-bolee-2-mln-leev> Accesat: 19.03.2025.
 13. Sanina A.G. Evaziunea fiscală ca problemă de management social Disertație. 2007. Disponibil: <https://www.dissercat.com/content/uklonenie-ot-uplaty-nalogov-kak-problema-sotsialnogo-upravleniya> Accesat: 20.03.2025.
 14. Konnykh Marina Yurievna. Evaziunea fiscală ca factor în dezvoltarea economiei subterane și o amenințare la adresa securității economice a statului. Revista științifică internațională "Știința prin prisma timpului" nr.4 (25) 2019 Disponibil: <https://www.naupri.ru/journal/1830.php> accesat: 20.03.2025.
 15. BEPS. Erodarea bazei impozabile și transferul profitului (BEPS) Disponibil: <https://www.oecd.org/en/topics/base-erosion-and-profit-shifting-beps.html> Accesat: 20.03.2025.
 16. Serviciul Fiscal de Stat se va alătura BEPS. 2024. Disponibil: <https://www.contabilitate.md/news/1575?cHash=ea9a75dd8e0da9f515623a916ed94bbd> Accesat: 20.03.2025.
 17. Evaziunea fiscală este cea mai frecventă încălcare. Raport al Serviciului Fiscal de Stat. 2024. Disponibil: <https://noi.md/ru/obshhestvo/uklonenie-ot-uplaty-nalogov-samoe-chastoe-narushenie-otchet-gns> Accesat: 20.03.2025.
 18. Experții recomandă introducerea unei taxe globale de 2% pentru miliardari. Disponibil: <https://internationalwealth.info/offshore-tax/kak-borotsja-s-ukloneniem-ot-nalogov-otchet-european-union-tax-observatory> Accesat: 21.03.2025.
 19. E.S. Vylkova "Contracarea evaziunii fiscale: experiența Statelor Unite". 2015. Vol. 25, nr 4, pp. 651-656. Doi 10.17150/1993-3541.2015.25(4).651-656. Izvestiya de la Academia de Economie din Irkutsk. Disponibil: <https://cyberleninka.ru/article/n/protivodeystvie-ukloneniyu-ot-nalogooblozheniya-opyt-ssha> Accesat: 21.03.2025.
 20. Ministerul Finanțelor al Republicii Moldova. Aspecte fiscale și vamale – soluții 2025. Disponibil: <https://www.mf.gov.md/ru> Accesat: 21.03.2025.
 21. Banca Națională a Moldovei. Disponibil: <https://www.bnm.md/ru> Accesat: 21.03.2025.
 22. Banca Mondială. Global Digital Summit 2025 Disponibil: <https://www.vsemirnyjbank.org/ext/ru/home> Accesat: 21.03.2025.
 23. Fondul Monetar Internațional. Disponibil: <https://www.imf.org/ru/Home> Accesat: 21.03.2025.
 24. OECD susține Republica Moldova în modernizarea administrației publice și fortificarea capacităților administrative. 2024. Disponibil: <https://mf.gov.md/ro/content/oecd-sus%C8%9Bine-republica-moldova-%C3%AEn-modernizarea-administra%C8%9Biei-publice-%C8%99i-fortificarea> Accesat: 21.03.2025.
 25. Agricultură rămâne sectorul cu cea mai mare pondere a ocupării forței de muncă din umbră. 2024. Disponibil: <https://noi.md/ru/jekonomika/seliskoe-hozyajstvo-ostayotsya-sektorom-s-naibolishej-dolej-tenevoj-zanyatosti> Accesat: 21.03.2025.
 26. Valorile mobiliare de stat vor fi emise lunar prin platforma eVMS.md, Ministerul Finanțelor al Republicii Moldova, 2021. Disponibil: <https://www.mf.gov.md/ro> Accesat: 21.03.2025.
 27. Banca Națională a Moldovei, 2021. „Studiu asupra economiei subterane din Republica Moldova.” Disponibil: <https://www.bnm.md/ro>. Accesat: 21.03.2025.
 28. Ministerul Finanțelor al Republicii Moldova, 2021. „Raport anual privind fiscalitatea și combaterea evaziunii fiscale.” Disponibil: <https://www.mf.gov.md/ro>. Accesat: 21.03.2025.
 29. Banca Mondială, 2020. „Economia subterană și impactul fiscal în Republica Moldova.” Disponibil: <https://www.worldbank.org/en/country/moldova>. Accesat: 21.03.2025.
 30. OCDE, 2019. „Raport privind evaziunea fiscală în sectoare economice din Republica Moldova.” Disponibil: <https://www.oecd.org>. Accesat: 21.03.2025.
 31. Ministerul Transporturilor și Infrastructurii Drumurilor al Republicii Moldova, 2020. „Raport anual privind transportul și logistică în Republica Moldova.” Disponibil: <https://www.mtid.gov.md>. Accesat: 21.03.2025.
 32. Ministerul Economiei și Infrastructurii, 2020. „Evaluarea impactului muncii informale asupra economiei naționale.” Disponibil: <https://www.mei.gov.md>. Accesat: 21.03.2025.
 33. Ministerul Sănătății al Republicii Moldova, 2021. „Studiu privind sectorul privat medical și economia informală.” Disponibil: <https://www.ms.gov.md>. Accesat: 21.03.2025.
 34. Cazul Ilan Shor și fraudă bancară din 2014”, Wikipedia. Disponibil: https://ro.wikipedia.org/wiki/Ilan_Shor. Accesat: 02.04.2025.
 35. Curtea de Apel a dublat sentința lui Ilan Shor la 15 ani de închisoare și a dispus confiscarea activelor sale, Wikipedia. Disponibil: https://ro.wikipedia.org/wiki/Ilan_Shor. Accesat: 02.04.2025.
 36. Amenzi pentru munca nedeclarată: În 2018, angajatorii din Moldova au fost amendați cu 42 de milioane de lei pentru utilizarea muncii la negru, conform Serviciului Fiscal de Stat, Observatorul de Nord. Disponibil: <https://observatorul.md>. Accesat: 02.04.2025.
 37. Depistarea muncii informale: În 2024, Inspectoratul de Stat al Muncii a identificat peste 3.000 de persoane lucrând fără contracte legale, reprezentând 7% din totalul muncii nedeclarate în țară, Pro TV, 1TV, 8TV. Disponibil: <https://protv.md>, <https://1tv.md>, <https://8tv.md>. Accesat: 02.04.2025.
 38. Impactul economic al muncii la negru: În 2022, s-a estimat că Republica Moldova pierde anual peste 15 miliarde de lei la buget din cauza salariilor în plic și a muncii nedeclarate, BizLaw, 2TV, Observatorul de Nord. Disponibil: <https://bizlaw.md>, <https://2tv.md>, <https://observatorul.md>. Accesat: 02.04.2025.

THE ASPECTS FOR APPLICATION OF COUNTABLE ACCOUNTS IN THE CONTEXT OF NATIONAL STANDARDS

ASPECTE DE APLICARE A CONTURILOR CONTABILE IN CONTEXTUL STANDARDELOR NAȚIONALE

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Abstract

The accountant in the organization, who is responsible for conducting accounting in accordance with the principles established by current legislation and regulatory framework, should demonstrate professional competence, relevant knowledge, objectivity, as well as creativity and good professional judgment in organizing accounting processes. This professional judgment includes both the interpretation and application of legal standards and the accurate compilation of financial statements, including a consolidation of the company's economic and financial results.

One of the fundamental cycles in the organization of accounting is the cycle of reflecting information within accounting records, which follows the principle of double-entry accounting, also known as accounting digraphism. National accounting standards in their regulations describe the recognition and measurement of accounting elements, mentioning digraphism only through terms such as “increase” and “decrease”, without establishing a direct relationship with specific accounts. The purpose of this paper is to interpret these demonstrations of circulation through the analysis and application of synthetic and analytical accounts within the framework of the National Accounting Standard “Intangible and Tangible Fixed Assets”, demonstrating their correspondence to the specific business operations of the organization.

Keywords: accounting, accounts, account correspondence, double-entry bookkeeping, accounting standards

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„Contabilitatea este oglinda trecutului,
conducătorul viitorului,
ordine în diferite sfere gospodărești,
statistica și istoria întreprinderii”
V. Djitti

1. Introducere

Dubla înregistrare a apărut ca un procedeu formal, ca urmare a evoluției metodelor de înregistrare, devenind fundamentul pe care s-a construit sistemul contabilității moderne [6, p. 61], viabil și epoca inteligenței artificiale.

Standardele Naționale de Contabilitate (SNC), ca acte normative fundamentale în reglementarea contabilității în sectorul corporativ, clarifică principiile de recunoaștere și evaluare a elementelor contabile, inclusiv activele pe termen lung (imobilizări necorporale și corporale), activele circulante (creanțe, stocuri și numerar), precum și capitalul propriu, datoriile, veniturile și cheltuielile.

Actele de contabilitate numite ilustrează, prin exemple textuale, schimbările elementelor contabile menționate anterior, actualizând majorarea și diminuarea acestora ca rezultat al faptelor economice, fără a specifica explicit utilizarea conturilor contabile ale Planului general de conturi. Se va menționa că absența unei corelări clare între majorarea și diminuarea acestor elemente

contabile și reflectarea lor în conturi și subconturi contabile generează dificultăți în aplicarea practică a standardelor contabile. Totodată și Planul general de conturi contabile în ultima variantă nu reduce problema dificultății ținerii contabilității mișcării elementelor contabile.

În prezenta lucrare, autorul își propune să evidențieze aplicarea prevederilor standardelor contabile prin corelarea acestora cu conturile utilizate în cadrul operațiunilor economico-financiare, având în vedere că, în literatura didactică, manualele și alte lucrări de studiu ale contabilității, aceste aplicări directe, de la standarde la conturi contabile, sunt de obicei insuficient tratate.

Conform Legii contabilității și raportării financiare (Legea nr. 287/2017), în articolul 5 privind „Modul de ținere a contabilității și de aplicare a standardelor de contabilitate”, se stipulează că entitățile din categoria micro și persoanele fizice care desfășoară activități economice, după înregistrarea acestora ca plătitori ai taxei pe valoarea adăugată, sunt obligate să țină contabilitatea în partida dublă și să întocmească situații financiare conform Standardelor Naționale de Contabilitate (SNC). Aceleași cerințe se aplică și entităților mici, mijlocii și mari, în conformitate cu alineatele 2 și 3 din articolul menționat [1].

Legea contabilității și raportării financiare (nr. 287/2017), prin articolul 3 intitulat „Noțiuni de bază”, definește noțiunea de „contabilitate în partida dublă” ca reflectarea faptelor economice prin înregistrarea acestora în două conturi contabile, utilizând principiul dublei înregistrări, și întocmirea situațiilor financiare corespunzătoare. Noțiunea de „dublă înregistrare” este detaliată ca procedeu contabil ce presupune înregistrarea unui fapt economic atât în debitul unui cont, cât și în creditul altui cont, cu aceeași sumă [1, art. 3].

2. Nivelul de cercetare a problemei și obiectivul cercetării

Reformarea contabilității și a auditului în contextul cerințelor și prevederilor standardelor naționale și internaționale, precum și al factorilor specifici dezvoltării economiei naționale, impune adoptarea unei abordări aprofundate din punct de vedere științific. În acest context, se pune accent pe utilizarea digrafismului sau, mai concret, pe aplicarea principiului dublei înregistrări în conturi. Rolul și caracteristicile conturilor în cadrul sistemului contabil au fost studiate de specialiști, teoreticieni și practicieni, atât în trecut, cât și în prezent. În acest sens, necesitatea cercetării utilizării conturilor și a corespondenței lor în baza Standardelor Naționale de Contabilitate (SNC) a devenit evidentă în ultima perioadă, după abrogarea comentariilor anterioare la standarde, care explicau conținutul contabil al operațiunilor economice prin formalizarea corespondenței conturilor.

În contextul lucrărilor științifice referitoare la corespondența conturilor, atât în sens teoretic, cât și practic, mai mulți savanți și cercetători au contribuit la dezvoltarea teoriei și practicii în domeniul contabilității, economiei și managementului financiar. Printre aceștia se numără: Bucur V., Nederița A., Grabarovschi L., Bajeran E., Zlatina N., Manoli M., (Moldova), Socolov Ia., Palii V., Sinițina T., Nicolaeva S., Șapoșnicov A. (Rusia), Igorina N., Melnic I., Storojuc T., și alții (Ucraina).

Raționamentul profesional contabil este, într-adevăr, un proces esențial în înțelegerea și aplicarea principiilor contabile, iar conturile, așa cum sunt prezentate în acest context, joacă un rol fundamental în redarea existenței și mișcării elementelor contabile. În acest sens, conturile pot fi comparate cu o „limbă” a contabilității, deoarece prin intermediul lor se transmit informațiile financiare esențiale care reflectă starea și evoluția economică a unei entități. Contabilitatea devine

astfel un sistem de semne și simboluri, la fel ca o limbă, care permite înțelegerea și interpretarea realității economico-financiare.

De asemenea, afirmația lui V. Djitti că „contabilitatea este oglinda trecutului, conducătorul viitorului, ordine în diferite sfere gospodărești, statistica și istoria întreprinderii” subliniază rolul dual al contabilității: atât de a reflecta realitatea trecută (prin rapoartele financiare și înregistrările contabile), cât și de a ghida deciziile viitoare, oferind informații esențiale pentru planificarea și prognoza activităților economice. Contabilitatea ajută, astfel, la menținerea unei ordini economice și financiare și poate fi văzută ca o „istorie” a unei întreprinderi, înregistrând atât evoluțiile trecute, cât și semnalele pentru viitor [6, p. 1].

3. Metode de cercetare și materiale utilizate

Cercetările aferente prezentei lucrări se bazează pe cercetări științifice riguroase, abordând concepte fundamentale din domeniul contabilității, cum ar fi clasificarea, evaluarea și recunoașterea elementelor economice și contabile. S-a abordat o metodologie aprofundată pentru a analiza și înțelege procesele și regulile fundamentale ale contabilității, incluzând principiile de ținere a evidenței contabile și prezentarea situațiilor financiare.

În același timp, se observă utilizarea metodei dialectice de cunoaștere, care este un cadru filozofic și științific eficient pentru a înțelege „mișcarea” și „evoluția” elementelor economice și contabile. Prin intermediul celor două principii fundamentale ale dialecticii: *inducția și deducția, analiza și sinteza, gruparea și clasificarea, selectarea și comparația* - se realizează o înțelegere aprofundată a fenomenelor economice și financiare.

Instrumentele esențiale ale cercetării se bazează pe respectarea cadrului normativ, în special pe Standardele Naționale de Contabilitate (SNC), care sunt esențiale în înțelegerea regulilor și procedurilor de înregistrare a operațiunilor economice. Prin aplicarea **digrafismului** (sistemul de dublă înregistrare) în contabilitate, lucrarea pune accent pe interacțiunea și „corespondența” dintre conturi, un concept-cheie în procesul contabil.

Concluzionând, putem menționa că, cercetarea se bazează pe o metodologie științifică solidă, integrând concepte fundamentale din teoria contabilității cu o aplicare practică detaliată a acestora, sprijinită de normele legale și experiența practicienilor din domeniu.

4. Rezultatele de cercetare și discuții

Contabilitatea ca funcție a managementului, asigură corectitudinea, oportunitatea și eficiența informațiilor financiare bazate pe fapte economice, reflectate prin metoda dublei înregistrări în sistemul conturilor. Conturile joacă un rol esențial în organizarea contabilității, fiind atât purtători de informație, cât și moduri de structurare a acesteia. Ele reflectă statica (starea resurselor și obligațiilor într-un moment dat) și dinamica (mișcarea acestora în timp) activității economico-financiare ale entității. Astfel, conturile permit o evidență corectă, transparentă și completă a tranzacțiilor, sprijinind luarea deciziilor financiare și gestionarea eficientă a resurselor.

Conform Legii contabilității și raportării financiare, capitolul III „Organizarea contabilității”, articolul 10, care reglementează „Ciclul contabil”, este subliniat procesul esențial de reflectare a informațiilor în conturile contabile, alături de ciclurile de documentare a faptelor

economice, recunoașterea și evaluarea elementelor contabile, întocmirea registrelor contabile, inventarierea și întocmirea situațiilor financiare. Acest proces este considerat ciclul de bază al contabilității, prin care se reflectă informațiile în conturi.

Astfel, expresia „Contabilitatea” poate fi înțeleasă ca un procedeu ce utilizează conturile pentru a reflecta faptele economice, iar ideea de a reflecta mișcările economice în conturi a fost formulată pentru prima dată de Luca Pacioli în lucrarea sa „Tratat despre conturi și înregistrări” (1494). În baza acestei lucrări, I. Socolov conchide că „contabilitatea se prezintă ca o metodă de sine stătătoare, bazată pe utilizarea dublei înregistrări, fiind rezultatul reflectării proceselor economice”.

În conformitate cu legea menționată, în Capitolul III „Organizarea contabilității”, art. 10 „Ciclul contabil” se subliniază că, alături de ciclurile de documentare a faptelor economice, recunoașterea și evaluarea elementelor contabile, întocmirea registrelor contabile, inventarierea și întocmirea situațiilor financiare, există și un ciclu esențial care se referă la procesul de reflectare a informațiilor în conturile contabile.

Aceasta explică semnificația termenului „contabilitate” ca metodă de utilizare a conturilor. Ideea de a utiliza conturi pentru a reflecta faptele economice și de a înregistra mișcările acestora a fost deja prezentă în lucrarea lui Luca Paciolo „Tratat despre conturi și înregistrări” (1494). Pe baza acestei lucrări fundamentale, I. Socolov concluzionează că „contabilitatea reprezintă o metodă autonomă, bazată pe utilizarea dublei înregistrări, fiind rezultatul reflectării proceselor economice” [3, p. 120].

În acest context, „Numele lui Luca Paciolo va rămâne mare și va rezista peste secole, pentru că a știut să prezinte cu înțelepciune și genialitate principiile raționale ale contabilității în partida dublă” [5, p. 247].

Fără utilizarea conturilor contabile, sensul digrafismului în filosofia dialecticii contabile ar dispărea. Referindu-se la rolul conturilor în sistemul contabil, V. Palii și I. Socolov subliniază că „conturile contabile reprezintă modalitatea ideală de clasificare, reflectare și măsurare a informațiilor, având scopul de a obține indicatori generali ai activității economice” [4, p. 87].

În perioada sovietică, studiul cursului de contabilitate se baza pe manuale care explicau conținutul și caracteristicile conturilor contabile, precum și corespondența acestora în raport cu faptele economice. Printre manualele de contabilitate utilizate în cooperativa de consum, în anii '50 ai secolului XX, se remarcă lucrarea „**Характеристика счетов счѣтного плана организаций потребительской кооперации**”, publicată la Moscova în 1958. Ulterior, după modificarea planului de conturi contabile, a fost publicat un alt manual de contabilitate pentru sistemul cooperației de consum, „**Бухгалтерский учет в потребительской кооперации**”, изд., Центросоюза, М. 1963.

Conținutul ambelor lucrări se concentra pe utilizarea conturilor contabile, descriind corespondența acestora. Aceste lucruri subliniază importanța semnificativă a rolului conturilor în organizarea și gestionarea contabilității, fiind esențiale pentru obținerea unui control intern și extern eficient, pentru elaborarea situațiilor financiare, analiza rezultatelor financiare și luarea deciziilor cu privire la viitorul activității economice. Astfel, pentru a înțelege pe deplin și corect conținutul Sistemului Național de Contabilitate (SNC) în practica contabilă, este esențială studierea aplicării conturilor contabile prin analiza corespondenței acestora și a modificărilor elementelor contabile în cadrul sistemului dublei înregistrări, respectând principiile ciclului de reflectare a informațiilor în conturile contabile.

Revenind la SNC, modificările elementelor contabile sunt explicate prin exemple de fapte economice, iar utilizarea digrafismului se face doar prin „majorări” și „diminuări” ale grupurilor acestor elemente. Aceste aspecte sugerează o anumită neînțelegere între sensul „digrafismului” și „dubla înregistrare”, ceea ce poate crea confuzie atât în teorie, cât și în practica reală a contabilității. În acest context, este necesară o cercetare mai profundă pentru a îmbogăți înțelegerea realității contabilității. C.V. Peasnella și D.D. Williams (Austria) subliniau că cercetările teoretice, deși nu sunt influențate de interese economice directe, pot deveni greu de înțeles pentru practicienii contabili, iar universitățile tind să favorizeze cercetările fundamentale, adesea catalogate drept „știință liberă”, folosite în bibliotecile academice [6, p. 426]. Între teoreticieni și practicieni au existat întotdeauna diferențe și neînțelegeri, iar acest lucru s-a reflectat în elaborarea documentelor legislative și normative, cum ar fi Codul contabil (SUA), Legea contabilității și raportării financiare și Standardele naționale de contabilitate din Republica Moldova.

Până la apariția ultimelor modificări în Sistemul național de contabilitate, conform Ordinului nr. 48 din 12 mai 2019 al Ministerului Finanțelor din Republica Moldova, pentru a evita dificultățile legate de utilizarea standardelor vechi, au fost elaborate comentarii care caracterizau conținutul acestora. Aceste comentarii explicau, prin exemple de fapte economice și corespondența conturilor, cum se aplica digrafismul în practica contabilă.

În prezent, situația în contabilitate, având în vedere conținutul actualizat al standardelor, necesită o clarificare a prevederilor privind recunoașterea și evaluarea elementelor contabile. Aceasta se face prin caracterizarea formularelor contabile, utilizând conturile din sistemul planului de conturi aprobat de Ministerul Finanțelor al Republicii Moldova prin Ordinul nr. 100 din 28 iunie 2019.

Pentru a diminua volumul lucrării și a economisi spațiu, dar în același timp a maximiza eficiența și claritatea conținutului transmis prin formulele contabile, vom prezenta conturile contabile doar în forma lor numerică și cod simbolic, fără a menționa denumirea acestora, utilizând planul general de conturi sau planul de conturi de lucru aprobat conform politicilor contabile ale entităților.

Correspondența conturilor va fi explicată prin detalierea acestora în ordinea articolelor din SNC, cu menționarea sumelor utilizate din exemple, acolo unde este cazul.

Conform SNC „Imobilizări necorporale și corporale”, în baza articolului 8, la formarea costului de intrare a imobilizărilor corporale și necorporale aflate în curs de execuție, se pot înregistra următoarele formule:

- Debit conturile 111, 121, 131 Credit conturile 544.3, 213, 211

La trecerea obiectelor procurate în exploatare:

- Debit conturile 112, 122, 123, 125, 132 Credit conturile 111, 121, 131.

Articolul 11 prevede cazul creării imobilizărilor în regie proprie, iar acest lucru se va reflecta prin următoarele formule contabile:

- Debit conturile 121, 131 Credit conturile 211, 214, 213, 544, 531, 533.

În cazul primirii imobilizărilor prin schimb cu alte active nemonetare, se vor înregistra două operații: una pentru procurare și alta pentru vânzare. Presupunem că o instalație, cu valoare de 110.000 lei, este transmisă în schimbul unui strung cu valoarea contractuală de 140.000 lei. Valoarea de vânzare a instalației este de 120.000 lei, iar entitatea achită, pe lângă valoarea

instalației, suma de 20.000 lei, fără a lua în calcul și suma TVA. Diferența de TVA de la intrare și vânzare va fi de 24.000 lei (TVA calculată din suma de 140.000 lei).

Formulele contabile se vor înregistra astfel:

La procurare:

- Debit contul 123 Credit contul 544.3 – 140.000 lei (valoarea de procurare)
- Debit conturile 534.4 Credit contul 544.3 – 28.000 lei (la suma TVA)

La vânzare în schimb:

- Debit contul 234.1 Credit conturile 621.2 – 120.000 lei (valoarea de vânzare, fără TVA)
- Debit contul 234.1 Credit contul 534.4 – 24.000 lei (TVA)
- Debit contul 721.2 Credit contul 123 – 110.000 lei (costul obiectului schimbat)

La acoperirea datoriei cu suma creanței:

- Debit contul 544.3 Credit contul 234.1 – 144.000 lei (suma mai mică a creanței)

La achitarea diferenței:

- Debit contul 544.3 Credit contul 242 – 24.000 lei (diferența dintre creanță și datorie)

Imobilizările primite ca aport în capitalul social se vor înregistra conform art. 13 din SNC în felul următor:

- Debit conturile 112, 122, 123, 125, 132 Credit conturile 313, 314

Dacă valoarea acestor imobilizări depășește cota stabilită de aport în capitalul social, diferența va fi înregistrată la debitul conturilor de imobilizări și la creditul contului 536.2. Conform art. 14 din SNC, imobilizările primite cu titlu gratuit (ca donație) se vor înregistra conform documentelor primare, utilizând următoarele formule contabile:

- Debit conturile 112, 123, 122, 125, 132 Credit contul 535.2 (pentru donații primite).

Pe măsură ce aceste imobilizări sunt utilizate, amortizarea acestora se va înregistra astfel:

- Debit contul 535 Credit contul 621.7 (pentru amortizarea imobilizărilor primite ca donație).

Conform politicilor contabile ale entității, există posibilitatea ca primirea imobilizărilor cu titlu gratuit să fie reflectată direct la creditul contului 621.7, fără a utiliza contul 535.2 „Venituri anticipate”.

Costurile de intrare a imobilizărilor deținute de un locatar conform unui contract de leasing financiar se vor contabiliza conform SNC „Contracte de leasing”.

Costul de intrare al imobilizărilor poate fi ajustat prin capitalizarea costurilor ulterioare și prin reevaluare.

Reevaluarea reprezintă procesul de ajustare a valorii contabile a imobilizărilor în conformitate cu valoarea lor justă la data raportării. Înregistrarea contabilă a reevaluării depinde de efectul acesteia, fie prin surplusul de reevaluare, fie prin reducerea de reevaluare.

Surplusul de reevaluare se înregistrează în capitalul propriu și se reflectă prin următoarele formule contabile:

- Debit contul 112, 122, 123, 125, 132 Credit contul 343 „Rezerve din reevaluare”

Dacă anterior a avut loc o *reducere a valorii obiectului*, iar acum valoarea de reevaluare prevalează, diferența se va înregistra astfel:

- Debit contul 112, 122, 123, 125, 132 Credit contul 621.7 (pentru suma reducerii anterioare)
- Credit contul 343 – la suma diferenței (pentru surplusul de reevaluare).

Conform aceluiași articol 18⁶, în cazul *reducerii de reevaluare*, aceasta se trece la cheltuieli:

- Debit contul 721.8 Credit contul 112, 122, 123, 125, 132 (pentru reducerea valorii imobilizării).

Dacă anterior a avut loc un surplus de reevaluare, suma reducerii se va înregistra astfel:

- Debit contul 343 Credit contul 112, 122, 123, 125, 132 (pentru suma reducerii, trecerea la contul de rezerve din reevaluare).

La ieșirea unui obiect reevaluat, surplusul de reevaluare se decontează prin transferul acestuia direct la *profitul nerepartizat*, folosind următoarea formulă contabilă:

- Debit contul 343 Credit contul 333 (în conformitate cu Art. 18⁷ din SNC).

În cazul în care un obiect de imobilizări (mijloc fix) s-a amortizat pe deplin, dar încă poate fi utilizat în viitor, conform evaluării făcute de comisie sau evaluator independent, cu aprecierea unei noi valori, operațiile se vor reflecta prin următoarele formule contabile:

- Debit conturile 124, 126, 133 Credit conturile 123, 125, 132 (pentru suma amortizată)
- Debit conturile 123, 125, 133 Credit contul 343 (pentru suma valorii determinate nouă).

Aceste operațiuni se bazează pe Art. 18⁹ din standard.

Amortizarea imobilizărilor reprezintă repartizarea sistematică a valorii amortizabile a unei imobilizări pe durata de utilizare, având în vedere perioadele de gestiune. Calculul amortizării se efectuează aplicând diferite metode, cum ar fi: liniară, bazată pe unitățile de producție, de diminuare a soldului.

Metoda de amortizare este aleasă de entitate conform politicilor contabile interne, conform Art. 21 și 22 din SNC.

Amortizarea calculată pentru un obiect se va înregistra prin următoarele formule contabile:

- Debit conturile 712.2, 713.2 Credit conturile 113, 124, 126, 133.1, 152.1 (pentru amortizarea obiectelor utilizate în comerț și administrarea entității).

Deprecierea imobilizărilor (art.29) se contabilizează în conformitate cu SNC „Deprecierea activelor”. Deprecierea activelor la data raportării are loc, dacă există motive (indici) externi sau interni pentru depreciere.

Pierderile din depreciere se înregistrează astfel:

- Debit contul 721.5 Credit conturile 127, 128, 129, 133.2, 143, 152.2 – pentru suma deprecierei.

Dacă obiectul de imobilizări a fost anterior reevaluat, suma deprecierei se va trece la debitul contului 343, utilizând suma surplusului (ecartului) din reevaluare.

De exemplu: În urma unui incendiu, o clădire a fost parțial distrusă. S-a recunoscut o pierdere din depreciere de 50.000 lei. Compania de asigurare va plăti despăgubiri de 45.000 lei, iar costul efectiv pentru restaurarea obiectului prestat de terți a fost de 58.000 lei. Operațiunile se vor înregistra astfel:

1. Debit contul 721.5 Credit contul 129 – 50.000 lei (pierdere din depreciere)
2. Debit contul 121 Credit contul 544.3 – 58.000 lei (restaurarea obiectului)
3. Debit contul 234.7 Credit contul 621.5 – 45.000 lei (despăgubiri de la compania de asigurare).

Derecunoașterea imobilizărilor are loc atunci când acestea sunt lichidate, vândute sau lipsite de inventar. Pentru suma amortizării obiectelor lichidate, vândute sau lipsă, se va contabiliza astfel:

- Debit conturile 113, 124, 126, 133, 152 Credit conturile 112, 123, 125, 132, 151 (pentru suma amortizării).

Pentru suma neamortizată a obiectului și pierderile din depreciere, se va înregistra astfel:

- Debit contul 721 Credit conturile 114, 127, 128, 129, 133.2, 152.2.

Dacă s-a constituit un provizion pentru costurile semnificative care se aşteaptă în urma ieşirii imobilizării corporale, se va înregistra astfel:

- Debit contul 426 Credit conturile 544.3, 211, 213, 531, 533

Activele utilizabile obţinute din lichidarea unui activ se vor înregistra în limita valorii reziduale a activului, conform următoarei formule:

- Debit contul 211 Credit conturile 123, 125, 132, 151.

Dacă valoarea obţinută depăşeşte limita reziduală, aceasta se va înregistra astfel:

- Debit contul 211 Credit contul 621 (pentru suma diferenţei).

Imobilizările necorporale reprezintă active care nu au o formă materială, dar pot fi identificate şi controlate. Acestea sunt imobilizări ce au valoare economică, dar nu sunt tangibile.

Pentru *imobilizările necorporale* (de exemplu, produse, drepturi de utilizare a tehnologiei de fabricaţie, programe informatice, documentaţie juridică pentru licenţe, şi alte drepturi de utilizare), operaţiile economice se vor înregistra în conturi după cum urmează:

1. La procurarea imobilizării necorporale:

Debit contul 111 Credit contul 544.3 – la suma de procurare.

2. La utilizarea imobilizărilor necorporale:

Debit contul 112 Credit contul 111 – la suma utilizării imobilizărilor necorporale.

Ieşirea imobilizărilor necorporale poate să apară în urma cedării dreptului exclusiv de utilizare al acestora. În acest caz, se înregistrează următoarele operaţii contabile:

1. La ieşirea imobilizării necorporale (suma amortizării acumulate):

Debit contul 113 Credit contul 112 – la suma amortizării acumulate.

2. La ieşirea imobilizării necorporale (suma deprecierii calculate):

Debit contul 114 Credit contul 621 – la suma deprecierii calculate.

3. La ieşirea imobilizării necorporale (pentru suma neamortizată):

Debit contul 721 Credit contul 112 – la suma neamortizată (în cazul în care obiectul a ieşit din funcţie înainte de expirarea termenului stabilit) (art. 6, 7, 38, 40, 41).

Calcularea amortizării imobilizărilor necorporale se va efectua conform politicii contabile şi se va înregistra în conturi şi subconturi corespunzătoare:

- Debit contul 712.2, 713.2 Credit contul 113 – la sumele calculate de amortizare (art. 44-46).

În componenţa imobilizărilor corporale, sunt incluse mai multe tipuri de active care au caracteristicile unui bun de capital utilizat în scopuri economice pe termen lung. Structura conturilor contabile utilizate pentru imobilizările corporale se regăseşte în Planul general de conturi contabile şi include următoarele conturi:

Contul 121 „Imobilizări corporale în curs de execuţie”

Contul 122 „Terenuuri”

Contul 123 „Mijloace fixe”

Contul 125 „Resurse minerale”

Contul 131 „Active biologice imobilizate în curs de execuţie”

Contul 132 „Active biologice imobilizate în exploatare”

Contul 151 „Investiţii imobiliare”

Este important de menţionat că multe operaţii economice care implică modificări ale valorii imobilizărilor corporale şi necorporale se reflectă în conturile contabile menţionate anterior. Totodată, aceste conturi se corelează şi cu alte conturi contabile din cadrul altor standarde naţionale, cum ar fi cele referitoare la *stocuri, capital propriu, creanţe, datorii, venituri şi cheltuieli*. Această

corelare va necesita o atenție suplimentară în procesul de studiere a corespondenței conturilor și de integrare a acestora în cadrul fiecărui standard în parte.

Astfel, procesul de contabilizare a imobilizărilor nu se limitează doar la evaluarea și înregistrarea inițială a acestora, ci și la interacțiunile cu alte elemente contabile esențiale în cadrul activităților economice. Aceste interconexiuni între conturi vor fi un subiect de studiu esențial pentru aprofundarea teoriei și practicii contabile [2].

Concluzii

1. Contabilitatea în dublă înregistrare asigură o evidență detaliată și echilibrată a tranzacțiilor economice, fiind esențială pentru întreprinderile mai complexe, în timp ce contabilitatea în partida simplă este utilizată pentru activități mai mici și mai puțin complexe, fără a oferi o imagine completă a situației financiare.
2. Standardele Naționale de Contabilitate nu oferă o explicație detaliată a corespondenței conturilor din Planul de conturi, ceea ce complică aplicarea dublei înregistrări, iar acest lucru impune o cercetare aprofundată pentru a clarifica utilizarea termenilor „majorare” și „diminuare” în cadrul corespondenței contabile, prevăzut în fiecare SNC.
3. Lucrarea a evidențiat aplicarea conturilor în contextul Standardului Național de Contabilitate „Imobilizări necorporale și corporale”, subliniind complexitatea structurii acestora și impactul diverselor elemente analitice asupra operațiunilor economice și formulării corespondenței contabile prin conturi și subconturi.
4. Deoarece fiecare entitate se concentrează pe o ramură specifică a economiei, iar standardele naționale reglementează contabilitatea la un nivel general, aplicarea conturilor sintetice și determinarea valorilor acestora devin procese complicate, care afectează corectitudinea corespondenței contabile.

Bibliografia

1. Legea Contabilității și raportării financiare, nr. 287 din 15.12.2017. Monitor oficial nr. 1 - 6, din 05.01.2018.
2. Standardele Naționale de Contabilitate, Ordinul Ministerului Finanțelor, nr. 48 din 12.03.2019., M.O. nr. 101-107 din 22 martie 2019. Intrat în Vigoare la 01 ianuarie 2020.
3. Лука Пачиоли «Трактат о счетах и записях», издание подготовил Ярослав Соколов, Изд-во «Статистика» М., 1974.
4. Палий В.Ф., Соколов Я.В. «Теория бухгалтерского учёта», М., «Финансы и статистика», 1984.
5. Luca Paciolo, „Tratat de contabilitate în partida dublă”, Editura junimea, Iași, România, 1981. Versiunea românească de Dumitru Rusu și Ștefan Cuciureanu.
6. Я.В. Соколов «Бухгалтерский учёт: от истоков до наших дней» М., «Аудит», «ЮНИТИ», 1986.

S5

INTER-COOPERATION, COMMUNITY WELL-BEING, AND SOCIAL RESPONSIBILITY

INTER-COOPERARE, PREOCUPARE PENTRU COMUNITATE ȘI BUNĂSTARE

INTER-COOPERATION AND COMMUNITY WELL-BEING THROUGH SUSTAINABLE COOPERATIVE MANAGEMENT

INTERCOOPERAREA ȘI BUNĂSTAREA COMUNITĂȚII PRIN MANAGEMENT COOPERATIV DURABIL

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Abstract

In the current context of sustainable development, cooperation between cooperatives plays a crucial role in ensuring community well-being. This article explores the importance of effective and sustainable management within cooperatives, highlighting how inter-cooperation strategies can contribute to increasing their economic and social impact. Through an integrated approach that combines principles of participatory governance, social responsibility, and innovation, cooperatives can become key players in the development of local communities.

Sustainable management of inter-cooperation involves strengthening relationships between cooperatives, optimizing resource use, and promoting common policies aimed at equitable development. Additionally, the active involvement of members and adaptation to new economic and social challenges are essential factors for the success of this process. Effective inter-cooperation strategies can enhance the competitiveness of cooperatives, increase economic autonomy, and improve living conditions in the communities where they operate.

The conclusions emphasize the need for continuous collaboration between cooperatives, favorable public policies, and a sustainable vision for economic development. Thus, inter-cooperation can become a key factor in building an equitable and resilient economic model.

Keywords: inter-cooperation, sustainable management, cooperatives, community development, social responsibility

JEL: Q01, L31, P13, R11, O35

Introducere

Contextul actual al economiei globale este profund marcat de suprapunerea unor crize sistemice interdependente: criza climatică, inegalitățile sociale în creștere și instabilitatea economică. Aceste fenomene subliniază limitele modelelor economice dominante, bazate pe creștere nelimitată, competitivitate exacerbată și externalizarea costurilor sociale și ecologice. În acest context, tot mai multe voci din mediul academic, civic și instituțional susțin necesitatea unor

structuri economice alternative, capabile să integreze echitatea, sustenabilitatea și reziliența ca valori fundamentale.

Cooperativele, ca forme asociative democratice, dețin un potențial semnificativ în promovarea unei economii sociale și solidare. Ele sunt orientate spre satisfacerea nevoilor reale ale membrilor și ale comunităților locale, punând accent pe participare, solidaritate și reinvestirea surplusului în scopuri comunitare. Capacitatea acestora de a genera valoare economică și socială în mod simultan le conferă un rol strategic în tranziția către un model economic mai echitabil și durabil.

În interiorul acestei paradigme, inter-cooperarea – adică parteneriatul strategic între cooperative – devine un instrument cheie. Aceasta permite consolidarea capacității de acțiune colectivă, extinderea impactului economic și social, precum și dezvoltarea unor rețele mutuale de sprijin. Inter-cooperarea favorizează schimbul de bune practici, dezvoltarea de proiecte comune și promovarea unor politici unitare de dezvoltare locală și regională.

Lucrarea de față explorează importanța unui management sustenabil aplicat inter-cooperării, cu scopul de a evidenția modul în care aceasta poate contribui la bunăstarea comunitară. Abordarea propusă integrează concepte-cheie precum guvernanta participativă, responsabilitate socială și inovație organizațională. Premisa de bază este că doar printr-un model de management participativ și orientat spre dezvoltare sustenabilă, cooperativele pot deveni actori centrali ai unei economii reziliente, echitabile și ancorate în realitățile locale.

Discuții și rezultate

1. Fundamente teoretice și conceptuale

Cooperativele reprezintă organizații autonome, constituite voluntar de un grup de persoane unite pentru a satisface nevoi și aspirații economice, sociale și culturale comune. Această satisfacere se realizează prin intermediul unei entități deținută și controlată democratic de către membri săi, principiul „o persoană – un vot” fiind un element definitoriu al guvernantei cooperatiste. Modelul cooperativ s-a dezvoltat ca răspuns la provocările sociale și economice generate de industrializarea rapidă și capitalismul necontrolat din secolul al XIX-lea. Mișcările sociale și economice din acea perioadă, precum cele inițiate de Robert Owen în Regatul Unit sau de Friedrich Wilhelm Raiffeisen în Germania, au pus bazele unui sistem alternativ, centrat pe solidaritate, echitate și auto-susținere.

Aceste structuri au dovedit o capacitate remarcabilă de adaptare și reziliență în fața schimbărilor istorice, politice și geografice, răspunzând unor nevoi diverse: de la protecția economică a membrilor în fața fluctuațiilor pieței, la dezvoltarea de servicii sociale sau culturale. Conceptul de cooperativă este adesea însoțit de un set clar de principii și valori, cum ar fi voluntariatul, caracterul democratic, educația cooperatistă, cooperarea între cooperative, responsabilitatea socială și interesul pentru comunitate.

Inter-cooperarea poate fi privită ca o extensie naturală și logică a principiului cooperării, aplicată între cooperative. Aceasta reprezintă forme variate de colaborare instituționalizată între cooperative individuale, care pot lua forma federațiilor, uniunilor, consorțiilor, alianțelor tematice sau teritoriale. Această cooperare între cooperative urmărește consolidarea capacităților economice, sociale și manageriale, precum și sporirea impactului comunitar.

Din perspectivă teoretică, inter-cooperarea poate fi analizată prin mai multe cadre conceptuale interdisciplinare:

- **Teoria rețelelor sociale și organizaționale** oferă o înțelegere a modului în care relațiile dintre cooperative (noduri) creează structuri complexe ce facilitează schimbul de resurse, informații și suport reciproc. Aceste rețele permit o distribuție mai eficientă a riscurilor și oportunităților, construind capital social și încredere între membri.
- **Economia instituțională** subliniază importanța regulilor, normelor și instituțiilor care guvernează comportamentul actorilor economici. În contextul inter-cooperării, reglementările juridice și normele interne sunt cruciale pentru funcționarea eficientă și transparentă a rețelelor cooperative, precum și pentru reducerea costurilor de tranzacție.
- **Paradigma economiei sociale și solidare** încadrează cooperativele și inter-cooperarea în cadrul unui model economic alternativ, centrat pe prioritizarea binelui comun și al dezvoltării durabile, mai degrabă decât pe maximizarea profitului individual. Acest model promovează echitatea, solidaritatea și participarea democratică, oferind o alternativă viabilă la modelele capitaliste dominante.

Obiectivele inter-cooperării sunt multiple și interconectate. Pe de o parte, inter-cooperarea urmărește maximizarea eficienței economice prin utilizarea în comun a resurselor materiale, financiare și umane. Prin cooperarea la nivelul achizițiilor, marketingului sau distribuției, cooperativele pot reduce costurile și crește competitivitatea pe piață.

Pe de altă parte, colaborarea între cooperative crește capacitatea de negociere în raport cu piețele, furnizorii și instituțiile financiare sau publice, sporind astfel accesul la finanțare și la oportunități comerciale avantajoase. De asemenea, inter-cooperarea stimulează inovarea, prin combinarea cunoștințelor și expertizei diferitelor entități, generând sinergii și soluții noi adaptate la nevoile membrilor.

Managementul sustenabil aplicat cooperativei și, mai ales, inter-cooperării între cooperative presupune o integrare complexă a unor practici și principii care asigură longevitatea organizațională, echilibrul economic și impactul social pozitiv pe termen lung.

Principalele componente ale unui astfel de management includ:

- **Planificarea strategică participativă**, care implică toți membrii și actorii relevanți în definirea direcțiilor organizației și alocarea resurselor, pentru a asigura o viziune comună și angajament.
- **Evaluarea continuă a impactului economic, social și ecologic**, prin monitorizarea indicatorilor relevanți, care să permită ajustarea rapidă a strategiilor și proceselor în funcție de context.
- **Transparența decizională și comunicarea deschisă**, esențiale pentru consolidarea încrederii membrilor și pentru asigurarea unei guvernante democratice eficiente.
- **Flexibilitatea și capacitatea de adaptare** la schimbările de mediu, sociale și economice, care pot afecta condițiile de funcționare ale cooperativei.

În acest context, noțiunea de sustenabilitate este mult mai amplă decât simpla protecție a mediului. Ea include și sustenabilitatea economică – prin menținerea echilibrului financiar și dezvoltarea durabilă a activităților – cea socială, prin promovarea incluziunii și coeziunii comunitare, dar și cea instituțională, prin întărirea capacității organizaționale și a rezilienței în fața provocărilor.

2. Practici și strategii de inter-cooperare sustenabilă

Implementarea eficientă a inter-cooperării necesită o abordare structurată și strategică. Printre modelele de succes se numără rețelele de cooperative agricole, consorțiile de producători locali, platformele de servicii mutuale sau hub-urile de inovație socială. Strategiile adoptate variază în funcție de sectorul de activitate, dimensiunea cooperativelor și contextul juridic și economic național sau regional.

Un exemplu notabil de rețea cooperatistă este **Oromia Coffee Farmers Cooperative Union (OCFCU) din Etiopia**. Fondată în 1999, această uniune reunește peste 400 de cooperative primare și reprezintă interesele a peste 400.000 de fermieri mici, majoritatea dintre aceștia cultivatori de cafea ecologică certificată. OCFCU este specializată în exportul de cafea de specialitate și se remarcă printr-un model economic circular: profitul generat este reinvestit în comunități, prin construcția de școli, clinici, drumuri, sisteme de alimentare cu apă și alte infrastructuri publice. Uniunea funcționează pe principii democratice (fiecare cooperativă membră are un vot) și practică transparența financiară, constituind astfel un exemplu de inter-cooperare cu impact social sistemic, care întărește reziliența economică a unor comunități agricole din sudul global. OCFCU aplică un management participativ și democratic, în care membrii sunt implicați activ în luarea deciziilor prin adunările generale și structuri reprezentative. Managementul combină tradiția cooperatistă cu practici moderne de guvernanta corporativă, acordând o atenție deosebită transparenței și responsabilității sociale. De asemenea, OCFCU investește în formarea continuă a managerilor locali pentru a crește competențele în domeniul comercializării și exportului.

În **Estonia**, rețeaua **Coop Eesti** ilustrează un model eficient de integrare verticală a cooperativelor de consum. Rețeaua cuprinde 19 cooperative regionale care operează împreună peste 300 de magazine de retail la nivel național, reprezentând aproximativ 1 din 3 estonieni ca membri-cooperatori. Coop Eesti a dezvoltat propriul său sistem bancar – Coop Pank – care furnizează servicii financiare adaptate nevoilor locale și consolidează autonomia economică a rețelei (Coop Pank este un brand 100% estonian, listat la Bursa din Tallinn și orientat spre servicii bancare în special pentru populația rurală și semiurbană). Standardizarea proceselor comerciale printr-o platformă digitală unitară și capacitatea de a inova în servicii (inclusiv plăți mobile în zone rurale) fac din Coop Eesti un exemplu convingător de inter-cooperare între retail, servicii bancare și comunități locale, menținând totodată valorile cooperatiste. Coop Eesti utilizează un model de management corporativ integrat, care combină autonomia regională a cooperativei cu un sistem centralizat de coordonare. Acest sistem se bazează pe standardizarea proceselor, digitalizarea serviciilor și controlul riguros al calității. Deciziile strategice sunt luate de consilii de administrație cu membri aleși democratic, iar managementul este orientat spre eficiență operațională și inovație tehnologică. În plus, modelul bancar propriu (Coop Pank) este gestionat printr-un cadru profesional, care asigură stabilitate financiară și transparență.

În **Grecia**, cooperativa **THESgi**, înființată în 2011 în regiunea Larisa, este specializată în cultura de lucernă, porumb și alte furaje, iar cooperativa **KISSAVOS** care activează în proximitatea masivului Kissavos (sau Ossa) este axată pe producerea și valorificarea unor produse montane, în conformitate cu reglementările europene privind „produsele din zone montane”. Conform Regulamentului (UE) nr. 665/2014, „produs montan” este o mențiune facultativă de calitate, care poate fi aplicată doar produselor agricole sau alimentare:

- obținute de la animale crescute în zone montane,

- sau care au fost cultivate și procesate în aceste zone.

Zonele montane sunt definite de altitudine (peste 600 m) sau de condiții naturale dificile. Cooperativa KISSAVOS valorifică o gamă de produse montane, inclusiv brânzeturi din lapte de capră și oaie, miere montană, plante aromatice și produse derivate din fructe de pădure. Etichetarea ca „produs montan” conferă un avantaj competitiv pe piețele interne și externe, susținând totodată activitatea economică în zone defavorizate geografic.

Aceste două cooperative au colaborat pentru a crea lanțuri scurte de aprovizionare și parteneriate directe cu retailerii, reducând astfel dependența de intermediari și fluctuațiile de preț. Prin dezvoltarea unui brand comun și strategii de marketing integrat, au reușit să acceseze piețe externe, să stabilizeze veniturile membrilor și să susțină o agricultură mai sustenabilă în zonele defavorizate geografic.

Aceste cooperative agricole adoptă un management bazat pe colaborare și parteneriate. Conducerea este colectivă, iar deciziile majore se iau în mod democratic în cadrul adunărilor membrilor. Managerii sunt adesea membri ai comunității locale, ceea ce facilitează o mai bună înțelegere a contextului agricol și social. Accentul este pus pe managementul durabil al resurselor naturale și pe crearea unor relații de parteneriat pe termen lung cu retailerii.

În **Statele Unite ale Americii**, cooperativa **Organic Valley**, fondată în 1988, este unul dintre cele mai mari exemple de succes ale agriculturii ecologice în regim cooperatist. Cu peste 1.600 de ferme membre din SUA, Canada, Australia și Regatul Unit, Organic Valley a creat un model hibrid de inter-cooperare între ferme, cooperative de credit și rețele logistice specializate. Prin investiții continue în energie regenerabilă, infrastructură de distribuție și guvernanta democratică participativă, cooperativa susține veniturile micilor fermieri și promovează un model de producție agricolă cu impact redus asupra mediului. Contractele sunt clare și stabile, iar fermierii beneficiază de sprijin tehnic și financiar continuu. Organic Valley aplică un model de management colaborativ și descentralizat, în care fermierii membri au un cuvânt direct în guvernanta cooperativei. Structura organizațională include comitete de membru și un consiliu de administrație ales, iar deciziile sunt luate prin consens sau vot democratic. Managementul integrează principii de sustenabilitate ecologică, investiții în tehnologii verzi și colaborări strânse cu cooperativele de credit și rețelele logistice pentru a optimiza distribuția.

Tot în **Statele Unite ale Americii**, **Pachamama Coffee Cooperative** reprezintă un exemplu unic de inter-cooperare transnațională, funcționând ca o cooperativă de „al doilea grad” care reunește cooperative de fermieri din Peru, Nicaragua, Guatemala, Mexic și Etiopia. Fermierii sunt acționari direcți ai rețelei, iar cafeaua este vândută direct în SUA prin magazine proprii, comerț online și parteneriate locale. Modelul permite păstrarea valorii adăugate la nivelul producătorilor, promovează comerțul echitabil și relația directă cu consumatorii, iar profitul este reinvestit în comunitățile de origine. Acest tip de cooperativă globală redefinește rolul cooperativelor în comerțul internațional, promovând echitate, transparență și autonomie economică pentru producători. Această rețea internațională adoptă un management participativ și intercultural, care pune accent pe transparență, echitate și responsabilitate socială. Fiind o rețea extinsă, coordonarea se face prin platforme digitale și întâlniri periodice ale reprezentanților cooperativelor membre. Se pune accent pe parteneriate echitabile și pe respectarea principiilor comerțului echitabil (fair trade), ceea ce influențează și stilul de management centrat pe echitate și sustenabilitate.

Un exemplu **românesc** de inter-cooperare inovatoare este **Hubrica** din Iași, un hub de antreprenoriat cultural și creativ care funcționează ca un spațiu colaborativ inter-disciplinar. Artiști,

arhitecți, designeri și dezvoltatori urbani lucrează împreună pentru a genera proiecte comune, accesând resurse partajate (spații, echipamente, know-how). Hubrica este un model de cooperativă urbană emergentă, care aduce în prim-plan rolul cooperativelor culturale în regenerarea urbană și în dezvoltarea unor economii locale bazate pe creativitate, colaborare și incluziune socială. Managementul este unul flexibil, orientat spre facilitarea colaborării și inovării. Deciziile se iau colectiv, iar procesul managerial are caracter participativ și experimental, specific mediului creativ. Accentul este pus pe sprijinirea membrilor prin infrastructură, mentorat și promovarea proiectelor comune, într-un cadru deschis și inclusiv.

În plan **European**, proiectul **Erasmus+ GGPAC** (Governance and Gender Participation in Agricultural Cooperatives) a facilitat colaborarea transnațională între cooperative din România, Grecia, Franța și Estonia. Proiectul a vizat îmbunătățirea managementului participativ și consolidarea guvernantei în cooperative prin: dezvoltarea unui curriculum de formare profesională; realizarea unei platforme digitale de resurse comune; organizarea de vizite de studiu și schimburi de bune practice. Aceste activități au contribuit la întărirea capacității instituționale a cooperativelor implicate și la promovarea egalității de gen și leadership-ului participativ în mediul rural.

Un exemplu elocvent de cooperativă agricolă în Europa de Est este **C.Î. Agrostoc** din **Republica Moldova**, fondată în 2001. Aceasta reunește peste 150 de membri – fermieri, întreprinderi agricole și prestatori de servicii – și operează o rețea extinsă de magazine agricole. Agrostoc investește constant în infrastructură modernă (silozuri, depozite, centre logistice) și oferă membrilor servicii integrate: aprovizionare cu inputuri agricole, consultanță tehnică, instruire, promovare și acces la piețe. Prin aceste activități, Agrostoc contribuie semnificativ la dezvoltarea rurală durabilă, susținând tranziția către o agricultură mai eficientă, competitivă și rezilientă. practică un model de management profesionist, axat pe dezvoltarea economică sustenabilă și pe creșterea capacității competitive a membrilor săi. Managementul cooperativei combină guvernanta democratică, în care membrii participă activ la deciziile strategice, cu implementarea unor practici moderne de management agricol și financiar. Structura de conducere include un consiliu administrativ ales de adunarea generală a membrilor, care supraveghează activitatea executivă și asigură respectarea principiilor cooperatiste. Echipa managerială este formată din specialiști în agricultură, economie și management, care implementează strategii orientate spre inovare, optimizarea producției și diversificarea serviciilor oferite membrilor. Managementul cooperativei integrează principii de sustenabilitate, promovând practici agricole responsabile, care să protejeze resursele naturale și să asigure continuitatea producției pe termen lung. Astfel, modelul de management al C.Î. Agrostoc reprezintă un echilibru între tradiția cooperatistă și dinamica unui sector agricol modern, contribuind la consolidarea economiei rurale din Republica Moldova și la creșterea bunăstării comunităților agricole.

Aceste bune practici demonstrează că inter-cooperarea – fie între cooperative din același sector, fie între cooperative din sectoare diferite sau din țări diferite – nu doar că este viabilă economic, dar are potențialul de a genera transformări structurale la nivel de comunitate. Inter-cooperarea poate contribui la: democratizarea economiei; reducerea inegalităților; resiliența în fața crizelor economice și climatice; acces echitabil la resurse și piețe.

Modelul cooperatist, susținut prin rețele solide de colaborare și schimb de cunoștințe, reprezintă un pilon esențial pentru o dezvoltare durabilă, echitabilă și participativă în secolul XXI.

Managementul în cooperative este esențial pentru asigurarea funcționării eficiente și durabile a acestor organizații, fiind caracterizat printr-un echilibru între guvernanta democratică a

membrilor și profesionalismul în administrarea resurselor. Modelele de management aplicate în cooperative variază de la forme participative și descentralizate, care promovează implicarea directă a membrilor, până la structuri mai integrate și profesionalizate, capabile să răspundă provocărilor pieței și să stimuleze inovarea.

Succesul managementului cooperativ depinde de capacitatea acestuia de a integra principiile cooperatiste — transparența, echitatea și responsabilitatea socială — cu strategii moderne de planificare, coordonare și evaluare a performanței. Astfel, un management sustenabil nu doar optimizează funcționarea economică, ci și consolidează coeziunea socială, susține dezvoltarea comunitară și promovează practici ecologice.

Prin urmare, managementul cooperativ trebuie să rămână flexibil și adaptabil, asigurând participarea membrilor în procesele decizionale, în timp ce valorifică expertiza tehnică și managerială pentru a transforma cooperativele în actori relevanți și rezilienți pe termen lung.

Tabelul 1. Tabel comparativ care rezumă bunele practici de inter-cooperare

Inițiativa	Tip inter-cooperare	Impact principal
Oromia Coffee Farmers Cooperative Union (OCFCU) - Etiopia	Uniune de cooperative agricole	Investiții în infrastructură comunitară
Coop Eesti - Estonia	Rețea națională de retail și bancă cooperatistă	Autonomie financiară și digitalizare
THESgi & KISSAVOS - Grecia	Parteneriat agricol regional	Acces la piețe și stabilitate economică
Organic Valley - SUA	Rețea de producători ecologici	Logistică sustenabilă și energie verde
Pachamama Coffee Cooperative	Rețea internațională de cafea	Acces direct la piețe și control al valorii
Hubrica - România	Hub creativ urban	Regenerare urbană și colaborare interdisciplinară
C.Î. „Agrostoc” – Republica Moldova	Cooperativă agricolă integrată, cu rețea națională	Acces la inputuri moderne, investiții în infrastructură, creștere economică regională
Proiectul Erasmus+ GGPAC - UE	Platformă europeană de formare și schimb de experiență	Dezvoltare managerială și guvernanta participativă

3. Impactul inter-cooperării asupra bunăstării comunitare

Inter-cooperarea reprezintă procesul prin care cooperative independente, fie ele agricole, de consum, financiare sau culturale, stabilesc relații de colaborare pe termen lung pentru a-și consolida capacitățile economice, sociale și ecologice. Această formă de colaborare între cooperative aduce un impact complex și profund asupra bunăstării comunitare, care se manifestă în mai multe dimensiuni: economică, socială și ecologică.

3.1 Impactul economic al inter-cooperării

Pe plan economic, inter-cooperarea contribuie semnificativ la dezvoltarea durabilă a comunităților locale. Prin colaborarea între cooperative, acestea pot crea lanțuri scurte și eficiente

de aprovizionare, reducând astfel dependența de intermediari și fluctuațiile pieței. Această relație directă între producători și consumatori stimulează circulația capitalului în interiorul comunității, ceea ce generează un efect multiplicator pentru economia locală.

De exemplu, cooperativele agricole care colaborează în rețele pot negocia împreună contracte mai avantajoase, obținând prețuri echitabile pentru produsele lor. Acest lucru se traduce în venituri mai stabile și predictibile pentru membrii cooperativelor, reducând vulnerabilitatea economică a fermierilor mici și mijlocii. Mai mult, prin achiziții comune de inputuri (semințe, îngrășăminte, utilaje), cooperativele reduc costurile operaționale și optimizează resursele disponibile.

Inter-cooperarea facilitează și accesul la piețe noi, inclusiv la exporturi, prin formarea unor branduri comune și implementarea unor standarde unitare de calitate. În acest fel, cooperativele nu mai operează izolat, ci devin actori relevanți în lanțurile valorice globale, cu o putere de negociere sporită.

În plus, crearea de locuri de muncă stabile și bine remunerate este un alt efect important al inter-cooperării. Prin extinderea activităților și diversificarea serviciilor, cooperativele pot angaja membri din comunitate, contribuind astfel la reducerea șomajului și la stabilitatea socială.

3.2. Impactul social al inter-cooperării

Dimensiunea socială a impactului inter-cooperării este la fel de semnificativă. Cooperativele funcționează pe baza unor principii democratice și participative, care încurajează implicarea membrilor în luarea deciziilor. Atunci când aceste entități se interconectează, se creează un spațiu propice pentru dezvoltarea capitalului social – adică încrederea, rețelele de sprijin și normele comunitare.

Această coeziune socială sporită reduce marginalizarea unor grupuri vulnerabile, precum femeile, tinerii sau comunitățile rurale izolate. Cooperativele oferă servicii și bunuri esențiale care adesea nu sunt furnizate de stat sau piață, cum ar fi accesul la apă potabilă, educație, servicii medicale sau culturale.

Mai mult, surplusul generat prin activitatea cooperativelor este frecvent reinvestit în inițiative care susțin dezvoltarea holistică a comunităților: construirea de școli și clinici, programe de formare profesională, proiecte culturale sau de mediu. Astfel, inter-cooperarea devine un vector al incluziunii sociale și al dezvoltării locale, întărind simțul apartenenței și responsabilitatea colectivă.

3.3. Impactul ecologic al inter-cooperării

Într-un context global marcat de schimbări climatice și degradare a mediului, rolul cooperativelor ca actori ai tranziției către sustenabilitate este esențial. Multe cooperative membre ale unor rețele inter-cooperatiste adoptă practici agricole și de producție prietenoase cu mediul, cum ar fi agricultura ecologică, agroecologia, utilizarea energiei regenerabile sau gestionarea responsabilă a resurselor naturale.

Inter-cooperarea facilitează transferul de bune practici ecologice și tehnologie verde între membrii rețelei, accelerând astfel adoptarea unor modele de producție durabile. În plus, cooperativele pot negocia împreună condiții favorabile pentru comercializarea produselor ecologice și pot atrage finanțări dedicate protecției mediului.

Prin aceste mecanisme, rețelele de cooperative devin parteneri importanți în realizarea obiectivelor naționale și internaționale privind dezvoltarea durabilă, inclusiv combaterea sărăciei, protecția biodiversității și reducerea emisiilor de carbon.

3.4. Provocări în dezvoltarea inter-cooperării

Cu toate avantajele evidente, inter-cooperarea nu este lipsită de obstacole. Printre cele mai frecvente dificultăți se numără divergențele de viziune și interese între cooperative, care pot genera conflicte sau lipsa unei direcții strategice comune. Lipsa unei culturi organizaționale unitare și a unor mecanisme clare de guvernare la nivelul rețelei poate afecta coeziunea și eficiența colaborării. Aspectele juridice reprezintă o altă provocare importantă, mai ales în cazul rețelelor transnaționale, unde legislațiile diferite pot complica relațiile contractuale, drepturile de proprietate sau protecția datelor. De asemenea, sprijinul politic și financiar insuficient din partea autorităților poate limita capacitatea cooperativelor de a investi în infrastructură, formare și inovare.

Concluzii și recomandări

Această lucrare a evidențiat faptul că inter-cooperarea sustenabilă constituie o strategie esențială și fezabilă pentru promovarea bunăstării comunitare pe multiple dimensiuni — economică, socială și ecologică. Cooperativele, prin natura lor participativă, democratică și orientată către nevoile reale ale membrilor și comunităților pe care le deservește, se pot transforma în actori-cheie pentru construirea unui model economic echitabil, solidar și durabil, care depășește limitele pieței tradiționale și ale intervenției exclusive a statului.

De-a lungul analizei, s-a constatat că inter-cooperarea oferă o platformă prin care resursele, cunoștințele și capacitățile diferitelor cooperative se pot reuni pentru a genera sinergii semnificative. Aceasta conduce la consolidarea lanțurilor de aprovizionare locale, crearea de locuri de muncă stabile, accesul mai facil la piețe și tehnologii, precum și la o gestionare responsabilă și sustenabilă a resurselor naturale. Mai mult, impactul social, inclusiv creșterea incluziunii, reducerea marginalizării și întărirea capitalului social, precum și sprijinul pentru dezvoltarea educației și culturii locale, confirmă rolul cooperativelor ca piloni ai dezvoltării durabile.

Pentru a valorifica pe deplin potențialul inter-cooperării și a depăși provocările identificate, se impun o serie de măsuri concrete, strategice și sistemice:

- **Crearea unui cadru legislativ și instituțional favorabil cooperării inter-cooperative:** Este necesară adoptarea unor reglementări clare care să recunoască și să susțină rolul federațiilor și uniunilor de cooperative ca entități cu un puternic impact social și economic, inclusiv prin încadrarea lor ca actori de interes public. Acest lucru poate stimula încrederea membrilor și a partenerilor externi, facilitând accesul la finanțări și sprijin instituțional.
- **Investiții în infrastructura de sprijin:** Pentru a asigura dezvoltarea durabilă a cooperativelor și a rețelelor inter-cooperatiste, este esențială dezvoltarea unor centre specializate de formare profesională, platforme digitale integrate pentru comunicare și management, precum și rețele de consultanță care să ofere expertiză tehnică, juridică și managerială. Aceste facilități vor crește profesionalismul și eficiența cooperativelor.
- **Promovarea educației economice alternative:** Integrarea principiilor cooperatiste, a modelelor economice sustenabile și a educației civice în curriculum-ul școlar și universitar, dar și în programele de formare pentru decidenți politici, va contribui la o mai bună

înțelegere și acceptare a cooperativelor ca instrumente viabile de dezvoltare economică și socială. Educația joacă un rol esențial în schimbarea paradigmelor economice și în construirea unei culturi a cooperării.

- **Stimularea inovației sociale și tehnologice:** Acordarea de granturi, susținerea parteneriatelor public-private și promovarea unor modele inovative de colaborare și digitalizare în interiorul cooperativelor pot accelera procesul de modernizare și adaptare la cerințele economiei contemporane. Inovația este un factor-cheie în asigurarea competitivității și relevanței pe termen lung.
- **Crearea mecanismelor de monitorizare și evaluare:** Dezvoltarea unor sisteme transparente și riguroase de urmărire a impactului inter-cooperării asupra dezvoltării locale va permite identificarea celor mai bune practici, ajustarea strategiilor și optimizarea resurselor. Aceste mecanisme trebuie să includă indicatori economici, sociali și ecologici, reflectând complexitatea și multidimensionalitatea proceselor implicate.

Prin implementarea acestor măsuri, inter-cooperarea sustenabilă nu doar că va eficientiza activitățile economice ale cooperativelor, ci va deveni un vector de transformare structurală la nivel comunitar și regional. Aceasta va reda comunităților controlul asupra propriului destin economic și social, sprijinind o dezvoltare care să fie în același timp incluzivă, echitabilă și prietenoasă cu mediul.

Referințe

1. Borz, M., & Manolescu, I.T. (2015). „The Implication of International Cooperation in the Sustainable Valorisation of Rural Touristic Heritage”. *Procedia – Social and Behavioral Sciences*, 188, 222–229. <https://doi.org/10.1016/j.sbspro.2015.03.377>
2. Dumitru, E.A., Micu, M.M., & Sterie, C.M. (2023). „The key to the development of agricultural cooperatives in Romania from the perspective of those who run them”. *Romanian Journal of Economic Forecasting*, 26(1), 118–137. <https://doi.org/10.1177/00307270221138118>
3. Etxezarreta, E., Villalba-Eguiluz, U., Arrillaga, P., & Mendieta, R. (2025). „How to Grow Without Getting Bigger: Inter-Cooperation as a Scaling Strategy for Social and Solidarity Economy Organizations”. *American Behavioral Scientist*. <https://doi.org/10.1177/00076503251315466>
5. Săgeată, R. (2015). „Inter-communal cooperation and regional development: The case of Romania”. *Academia.edu*. <https://doi.org/10.2478/V10117-012>
6. Schill, C., Wijermans, N., Schlüter, M., & Lindahl, T. (2016). „Cooperation Is Not Enough—Exploring Social-Ecological Micro-Foundations for Sustainable Common-Pool Resource Use”. *PLoS One*, 11(8). <https://doi.org/10.1371/journal.pone.0165009>
7. Suchek, N., & Franco, M. (2023). „Inter-organisational Cooperation Oriented Towards Sustainability Involving SMEs: a Systematic Literature Review”. *Journal of Knowledge Economy*. <https://doi.org/10.1007/s13132-023-01196-x>
8. Suchek, N., & Franco, M. (2023). „Inter-organisational Cooperation Oriented Towards Sustainability Involving SMEs: a Systematic Literature Review”. *Journal of Knowledge Economy*. <https://doi.org/10.1007/s13132-023-01196-x>
9. <https://www.ica.coop/en/cooperatives/cooperative-identity>
10. <https://oromiacoffeeunion.com/>
11. <https://www.coop.ee/>
12. <https://thesgi.gr/en/>
13. <https://www.organicvalley.coop/>
14. <https://pachamamacoffee.com/>
15. <https://hubrica.ro/>
16. <https://ggpac.eu/>
17. agrostoc.md

UKRAINIAN IT PRODUCT ON THE INTERNATIONAL MARKET: OPPORTUNITIES AND CHALLENGES

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Abstract

The information technology sector in Ukraine has become one of the key sectors of the economy, significantly integrated into the global market. The Ukrainian IT sector contributes approximately 4–5% of the country's GDP and accounts for more than 38–40% of all services exports, second only to the agricultural sector in the export structure. The global technological landscape is rapidly evolving: the widespread adoption of cloud services, growing demand for cybersecurity, and breakthroughs in artificial intelligence are creating new opportunities for IT businesses.

Ukraine currently holds a leading position on the global technological map in terms of human resources potential and company activity. The Ukrainian IT sector comprises over 2,000 active technology companies, of which approximately half focus on service outsourcing, and about a third develop their own products. The success of Ukrainian IT products largely depends on the country's level of integration into the global economic space.

The state is actively promoting Ukraine's "digital integration" with the world. Even during the war, Ukraine continues harmonizing its legislation with EU norms in digital trade and telecommunications.

Deeper integration into global markets - through regulatory convergence, physical presence, and marketing activities - is key to expanding Ukrainian IT product exports.

Keywords: IT sector, IT product, international market, export of services, government support

JEL: G31, G32, M21

Introduction

The information technology sector in Ukraine has become one of the key sectors of the economy, which is significantly integrated into the global market. The Ukrainian IT sector provides about 4–5% of the country's GDP and more than 38–40% of all service exports, second only to the agricultural sector in the export structure [1]. This indicates the relevance of the research topic: Ukrainian IT products and services have already become a significant component of the global technology market. Current trends demonstrate the growth of global demand for digital solutions – according to Gartner, in 2024 global IT spending will reach \$5.06 trillion (8% more than in 2023) [2]. In this context, Ukrainian companies have the opportunity to occupy their niche, given the high level of qualification of IT specialists and competitive advantages in a number of areas (from outsourcing to product development). At the same time, the war and its associated challenges require a rethinking of strategies for entering global markets and maintaining the sustainability of the industry [10].

The global technology landscape is dynamically evolving: the rapid adoption of cloud services, growing demand for cybersecurity, and breakthroughs in artificial intelligence are creating new opportunities for IT businesses [9]. At the same time, competition is intensifying: countries in Central and Eastern Europe, Asia, and Latin America are developing their own IT industries, and

the global “talent crisis” in the IT sector continues. For Ukraine, this means the need to follow global trends (for example, adapting to the AI boom or the growth of FinTech) in order to meet the expectations of international clients and users. Global economic fluctuations are also affecting the IT market: after the decline in investments in 2022–2023, the situation has begun to level out, but recessionary risks and geopolitical instability may restrain development. Thus, Ukrainian IT products need to take into account both the window of opportunity (expanding demand for digital solutions) and the challenges in the form of fierce competition and requirements for innovation.

Results obtained and discussions

Ukraine currently occupies one of the leading places on the world technological map in terms of human resources and company activity. According to Eurostat, Ukraine is in 2nd place in Central and Eastern Europe in terms of the number of IT specialists (~307 thousand people), second only to Poland [3]. In general, the Ukrainian IT sector has more than 2,000 active technology companies [1], of which about half are engaged in service outsourcing, and a third develop their own products. Over the past decade, the industry has shown explosive growth: its contribution to GDP increased 5–6 times from 2013 to 2023 [4]. Ukrainian IT specialists have gained a reputation as highly qualified engineers, 82% of whom have the level of “specialist” and above [1]. This contributed to the success of domestic products on the global market: a number of startups of Ukrainian origin have achieved “unicorn” status (capitalization of over \$1 billion) – in particular, the grammar checking service Grammarly and the platform for developers GitLab have become world-famous [4]. Domestic companies are firmly integrated into international technology supply chains: giants such as EPAM or SoftServe carry out projects for global corporations, and Ukrainian product companies (e.g. Genesis, Readdle, MacPaw) successfully sell software abroad. Ukrainian IT products cover various areas – from FinTech (a striking example is the mobile bank Monobank, which has become one of the leaders of fintech in Eastern Europe [6]) to the gaming industry and enterprise solutions. Thus, Ukrainian IT companies play a prominent role in the international tech giant landscape, offering competitive products and services.

The full-scale war unleashed by the aggressor (the Russian Federation) in 2022 became an unprecedented challenge for the Ukrainian IT industry. Despite the threats to life and infrastructure, the industry showed extraordinary resilience. In 2022, the IT sector became the only export industry of Ukraine that managed to grow in the conditions of war: the volume of exports of IT services reached a record \$7.3 billion (versus \$6.9 billion in 2021). This provided critically important foreign exchange earnings to the economy of the warring country. In 2023, the growth rate slowed down somewhat - according to estimates, exports of IT services decreased by 2–7%, to ~\$6.8–7.1 billion. The share of IT in the structure of services exports decreased from 45% to about 40% [7], which indicates the impact of the general decline in demand and disruptions related to the war. At the same time, the personnel aspect has undergone significant changes: more than 20% of Ukrainian IT specialists were forced to leave abroad, their number increased from ~50–57 thousand in 2022 to ~65 thousand in 2023. Despite this, the total number of IT specialists did not decrease, as some teams relocated to safer regions of Ukraine, and new specialists joined the industry. As of August 2023, ~242 thousand IT engineers worked in Ukraine (compared to 228 thousand in May 2022), which indicates the adaptability of the labor market. Companies quickly switched to remote work

modes, dispersed offices and infrastructure, and provided employees with backup power and communications (including through generators and Starlink). It is important that 97% of IT companies actively support the country's defense financially, and two-thirds have mobilized employees in the ranks of the Armed Forces of Ukraine [1], which emphasizes the industry's contribution to the approaching victory. The labor market has seen a revival after the shock of 2022: already in 2024, the number of vacancies for IT specialists increased by 31% (the first increase in three years) [8], with hiring most actively resumed in product companies. The war also stimulated the emergence of new defense products (UAVs, situational awareness programs, etc.) - this segment may become a breakthrough for Ukrainian IT in the future. So, despite significant losses and risks, the Ukrainian tech industry survived and continues to develop, adapting to the conditions of war.

The role of state policy in the development of the IT sector has increased significantly in recent years. Even before the war, the Ukrainian government identified the digital economy as a priority sector, and since 2019 it has begun to implement special regimes and incentive programs. A key initiative was the “Diya City” platform – a legal and tax space for IT, launched in early 2022. It provides for special taxation conditions: a reduced rate of the Unified State Tax, a 5% personal income tax for gig contractors, as well as an alternative to income tax – a tax on withdrawn capital (rate 9%). Many large companies have become residents of “Diya City”, which has allowed them to optimize costs. In particular, some IT giants (for example, GlobalLogic) have switched to paying a tax on withdrawn capital and paid only ~\$350 thousand of such tax in 2023, which is significantly less than traditional income tax [6].

In addition to tax benefits, state support is manifested in maintaining a favorable regulatory environment: even during the war, the government did not impose additional fiscal burdens on the IT business, understanding its critical role for the economy. An important factor is also the preservation of human resources: despite mobilization, the authorities have introduced a mechanism for reserving specialists for strategically important IT companies, and also promote training programs for new specialists (IT Generation initiative and grants from the Ukrainian Startup Fund). State institutions and specialized associations (such as the IT Ukraine Association) cooperate with international donors (USAID, EU4Digital, etc.) to support startups, in particular by providing grant funding to the most promising projects. As part of the post-war recovery, it is planned to involve the IT sector in the digitalization of public services and the "smart" reconstruction of infrastructure, which will also require state support for innovations. Therefore, a balanced tax policy and active state support remain necessary conditions for increasing the competitiveness of the Ukrainian IT product.

The success of Ukrainian IT products largely depends on the level of integration of the country into the global economic space. On the one hand, Ukrainian companies are independently internationalizing: more than half of IT businesses plan to open offices abroad (most often in EU countries, in particular in Poland) [1], which allows them to be closer to customers and reduce country risks. On the other hand, the state is promoting the “digital integration” of Ukraine with the world. Even during the war, Ukraine continues to harmonize legislation with EU norms in the field of digital trade and telecommunications. The priority direction is entry into the EU Digital Single Market: the Ukrainian government aims to actually join it even before formal membership in the European Union. Specific steps include an agreement on a common roaming space with the EU (so

that Ukrainian IT specialists and entrepreneurs can freely use communications abroad) and the signing of the ACAA agreement on mutual recognition of technical standards, which will simplify the export of IT equipment and high-tech products. Ukraine has also joined European innovation support programs (Horizon Europe, Digital Europe), gaining access to grants and cooperation platforms with European partners. An important component of integration is international cooperation of companies: Ukrainian IT firms participate in global exhibitions (CES, Web Summit), establish partnerships with transnational corporations. In addition, the diaspora and IT clusters contribute to the promotion of the Made in Ukraine brand abroad, increasing the recognition of Ukrainian products. Therefore, deeper integration into global markets – through regulatory convergence, physical presence and marketing activity – is the key to expanding the export of Ukrainian IT products.

To increase the competitiveness of Ukrainian IT products in the international arena, it is necessary to implement a number of strategic steps.

First, focus on products with high added value: Ukrainian companies should invest in creating their own products and intellectual property, and not only in service outsourcing. The development of the startup ecosystem should become a priority - the state and venture funds should support startups at the early stages. In particular, solving the problem of access to financing is critically important, because currently the lack of investment capital is the main obstacle to the development of Ukrainian startups [5, 10]. It is advisable to expand grant programs, preferential lending and attracting foreign venture investors in cooperation with state guarantee funds.

Second, improving state policy: consolidate the stability of tax conditions for IT (preserve the attractive “Diya City” regime without worsening conditions), simplify regulations on currency settlements and technology transfer. It is necessary to continue training programs for IT talents - support IT education, retraining courses for veterans and internally displaced persons in technological specialties in order to expand the human resource potential.

Third, international cooperation: the government should more actively promote the Ukrainian IT sector abroad through trade missions, participation in international technical alliances and exhibitions. It is worth concluding bilateral agreements on mutual recognition of qualifications of IT specialists, cooperating in the areas of cybersecurity and digital transformation with partner countries. Ukrainian companies, in turn, can look for strategic partners or mentorship in mature markets (USA, EU, Asia) to enter new territories with their products. Another promising direction is participation in projects for the post-war reconstruction of Ukraine: by demonstrating successful case studies of digital reconstruction, Ukrainian IT products will be able to gain the trust of other countries that will need such solutions.

In general, the synergy of the efforts of the state and business - investments in innovation, favorable tax policy, integration into global networks - will lay the foundation for strengthening Ukraine's positions in the global IT market.

Conclusions

The analysis showed that the Ukrainian IT product has significant potential in the international market, but its implementation depends on the ability to overcome a number of internal and external challenges. The strengths include a large pool of talented specialists, successful experience in creating

global products, and state support for the development of the industry. Challenges include the consequences of the war (human resource outflow, reduced demand), competition from other countries, and limited access to financial resources. In the near future, various development scenarios are possible:

The optimistic scenario assumes a rapid de-escalation of the war and the beginning of large-scale reconstruction: in this case, the Ukrainian IT sector can become an engine of economic revival, receiving new orders and the return of some specialists home. The volume of exports of IT services can exceed pre-war indicators and reach a new maximum.

The moderate scenario - the continuation of the state of protracted conflict for some time - will mean maintaining the current level of activity with gradual slow growth due to integration into the EU and expanding its presence in other markets.

A negative scenario (escalation of war, deepening global recession) may lead to a temporary decline in the industry, but even then a complete collapse will not occur due to the critical importance of IT for the global economy.

In general, the forecast estimates indicate that the growth trend of the Ukrainian IT sector will continue in the long term. Provided that the recommended measures are implemented and current challenges are successfully overcome, Ukrainian IT products will be able not only to gain a foothold, but also to increase their presence in the global market, contributing to technological progress and economic development of the country.

References

1. Lviv IT Cluster. Ukrainian tech industry in the third year of the war: results of IT Research Ukraine 2024. Sustainability as a new reality [Electronic resource] // Lviv IT Cluster, 11/27/2024. – URL: <https://itcluster.lviv.ua/ukrayinska-tehgaluz-na-tretij-rik-vijny-rezultaty-it-research-ukraine-2024-stijkist-yak-nova-realist> (access date: 04/24/2025).
2. IT spending back on track in 2024 while talent crunch persists [Electronic resource] // CIO Dimension. – URL: <https://ciodimension.com/aiml/it-spending-back-on-track-in-2024-while-talent-crunch-persists> (access date: 05/25/2025).
3. Business. Censor. More than 20% of Ukrainian IT specialists are already abroad, their number is increasing, - research [Electronic resource] // Business Censor, 06/19/2024. - URL: <https://biz.censor.net/news/3495567/> (access date: 05/25/2025).
4. Kostanic A.-M. Top 10 Rounds for Ukrainian Startups in 2024 amounted to €286M [Electronic resource] // The Recursive, 01/30/2025. - URL: <https://therecursive.com/biggest-funding-rounds-investments-ukraine-startups-2024/> (access date: 04/24/2025).
5. Atanasova T. Ukraine: “The Ukrainian IT sector is one of the few industries remaining afloat” [Electronic resource] // The Recursive, 02/24/2025. – URL: <https://therecursive.com/ukraine-the-it-sector-is-one-of-the-few-industries-remaining-afloat/> (access date: 04/28/2025).
6. TOP-30 IT companies of Ukraine in 2023 [Electronic resource] // DOU, 2024. – URL: <https://dou.ua/lenta/news/top-30-it-companies-in-2023> (access date: 05/26/2025).
7. The share of IT exports exceeds pre-war indicators by about 3% [Electronic resource] // UBN News, 2024. – URL: <https://ubn.news/the-share-of-it-exports-exceeds-pre-war-indicators-by-about-3> (access date: 05/26/2025).
8. Results of the year on the IT labor market: +31% vacancies, product IT is growing, but not without cuts [Electronic resource] // DOU, 12/09/2024. – URL: <https://dou.ua/lenta/articles/jobs-and-trends-2024> (access date: 04/28/2025).
9. Kutsyk, P., & Kovtun, O. (2024). Identification of promising business and modeling of optimal strategic sets for enterprises using the capabilities of artificial intelligence. *Digital Economy and Economic Security*, (5 (14), 127-136. <https://doi.org/10.32782/dees.14-20>
10. Kutsyk P. O., Tulika N. M., & Protsykevich A. I. (2024). State and prospects for the development of the IT industry of Ukraine. *Economy and Society*, (67). <https://doi.org/10.32782/2524-0072/2024-67-108>

THE TOURIST POTENTIAL OF "PERPERIKON" - THE SACRED ROCK CITY OF THE THRACIANS

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Abstract

This research evaluates the tourism potential of Perperikon, the sacred rock city of the Thracians, as a cultural and historical resource. The model elaborated for historical-cultural anthropogenic tourism resources was applied to evaluate tourism potential according to the following three criteria: 1. Development capacity; 2. Degree of impact/influence – the level of attractiveness is evaluated; 3. Degree of change (as a result of tourism) – assessment of the utility, value, and significance of the tourist attraction. The characterization of the object was performed, some indicators were analyzed, and relevant generalizations were made. In the implementation of the study, the classical empirical approach, statistical methods, comparative analysis, surveys, observations, results of the authors' previous research, and literature sources were used. The elaboration is part of a project aimed at presenting the potential of the region's resources for the development of complex and competitive tourism products with high added value, contributing to sustainable regional development and improving the quality of life of the population by increasing tourism demand.

Keywords: tourism potential, tourism, tourism resources, protected, cultural and historical tourism resource, tourism policy, tourism product, tourism demand

JEL: L83, Z10, G18

Introduction

Bulgaria is a country which is rich in cultural and historical monuments from different historical eras. It is estimated that there are about 40,000 of them. Seven of them have the status of immovable cultural heritage of world significance, and more than 10,000 are of national importance. Among European countries, Bulgaria ranks third after Italy and Greece in terms of archaeological cultural heritage [1]. In terms of this heritage wealth, this country ranks among the first in Europe.

According to the Ministry of Tourism of Bulgaria, in recent years (2022 - 2024) cultural tourism forms about 20% of the country's tourism product (for comparison, before the pandemic it was about 10%) [4]. Data indicate that as of 2023, 5 million visits to museums by tourists and locals have been recorded, and the growth in museum visits by foreigners was 56%.

On the other hand, when positioning Bulgaria according to the “tourism competitiveness index”, the country's cultural tourism resources are rated at 1.96. According to this indicator, Bulgaria ranks only 54th out of 141 countries that participated in the study [10].

In 2022, this index was transformed into the Travel & Tourism Development Index (TTDI). It measures a number of factors and policies that ensure the sustainable development of travel and tourism [12]. TTDI is a direct successor of the “Tourism Competitiveness Index”. It consists of five dimensions, 17 components and 102 individual indicators distributed among the different components. Each of the indicators is evaluated according to a 7-point system with the application of a special methodology that allows to align the individual units of measurement - indicators - with the overall scoring system. In the May edition of the World Economic Forum Travel & Tourism Development Index for 2024, Bulgaria ranks 40th out of 119 countries that participated in the study. Ahead of us are countries such as India (39), Mexico (38), Hungary (37). Of the Balkan countries, however, only Greece is ahead of Bulgaria (21), and the USA is ranked first in the world. Moldova, for example, is in 88th place.

In the framework of the present study, the component assessing resources for tourism development, in particular cultural resources, is of most interest. Therefore, we will focus on them in more detail.

As a criterion “Resources for transport and tourism development” in the presented evaluation system, reflects the reasons why travelers go to a particular locality/destination. The first component includes natural resources and measures the available natural potential. Natural potential is defined in terms of landscape, natural parks and fauna diversity. It does not take into account the existing natural heritage, but the utilization of the country's natural assets for tourism development.

The second component is cultural resources. It takes into account, for example, the presence of archaeological sites, recreational sites, etc. It assesses how cultural heritage is socialized and used for tourism development rather than the actual existing cultural heritage (e.g. the presence of more than 40,000 sites in Bulgaria). The third component, non-leisure resources, measures the attractiveness of factors that facilitate business and other travel, including the presence of global cities, major corporations and leading universities.

Indicators of cultural resources are: number of World Heritage sites, non-material cultural heritage, cultural and recreational tourism, etc.

According to this indicator Bulgaria scored 2.10 points. Such countries as Czech Republic, Poland, Great Britain have higher scores, and Moldova received 1.25 points. Overall, the average score for Western Europe is 3.52 [12].

The reasons why Bulgaria has a low position in the world market of cultural tourism are complex and are outlined in the fundamental documents for the development of tourism in the country, so we will not focus on them in detail. However, it should be noted that one of the reasons is the insufficient preparing of tangible cultural heritage objects to turn them from a potential tourist resource into a basis for the creation of a competitive tourist product. In this study we will present a positive example of a cultural heritage site that has been successfully transformed into an attractive tourist attraction.

Research description

Research is part of a project aimed at assessing the potential of Bulgaria's cultural heritage sites that can become a basis for tourism development.

The aim of the work is to study the cultural and historical tourist potential of Perperikon - the sacred rock city of the Thracians.

In order to achieve the goal, the following tasks were solved:

1. General description of the object is provided.
2. Evaluation of the potential of the cultural and historical tourist resource of Perperikon was carried out.

In the evaluation of the potential, a methodology that considers the object as an anthropogenic tourist resource was applied.

The following methods were used in the research:

- balance method (score balance method), which results in assigning a certain number of points (grades) to the selected characteristics of cultural-historical tourist resource (CTRR), specific indicators of their measurement and aggregated subjective opinions;
- expeditionary-field method - field work;
- observation method and survey method;
- cartographic method;
- from heuristic methods the method of expert evaluations was applied.

General characteristic

Perperikon or Perperik (Latin: Perperikon; Greek: Περπερικον) is an archaeological complex consisting of a large 8,000-year-old megalithic sanctuary, monuments from antiquity and the Middle Ages.

In Thracian times it was a sacred rock city, capital and fortress with a royal palace. Later it was inhabited by Romans, Goths, Byzantines and Bulgarians. The temple of the ancient city was probably dedicated to the Thracian god Zagreus. It was destroyed by the Turks in 1362, and after a few decades the place was completely deserted.

Most researchers assume that the name is related to the gold coins of perpera, which were also called zlatitsa in medieval Bulgaria. It is believed to be an episcopal city, where Nikita of Remesa baptized the Besseans and passed on to them the Thracian alphabet and Christian worship in the Thracian language, which he had created. Archaeological and written sources prove that here was the famous in ancient times sanctuary of Dionysus of the Thracian tribe of Satyrs, whose priestly lineage was Bessians. In this sanctuary, as well as in the sanctuary of Apollo at Delphi, were two of the most important oracles of antiquity.

Perperikon is located at an altitude of 470 m above sea level, on top of a hill that is part of the Eastern Rhodopes. The hill is located 15 km northeast of the modern town of Perperik. It is 15 km from the town of Kardjali, above the village of Gorna Krepost. Its area is about 12 km², and the megalithic complex is the largest on the Balkan Peninsula, covering an area of 5 km².

Active excavations began in 2000 and continue to this day, revealing a large rock city that flourished in the Roman era, although its history began several millennia earlier.

We know about the sacred city from a number of ancient writers. Thus, Macrobius (400 AD) reports about the sanctuary in the form of an oval hall. In the works of later Roman historians it is noted that the oracle of the god Dionysus in the Rhodope Mountains was the most important sanctuary.

Already at the end of the 19th century, Konstantin Irecek wrote that the oracle of the god Dionysus in the Rhodope Mountains was the most important sanctuary. Konstantin Irecek wrote

about the medieval fortress of Hyperperakion (Perperikon). From his description, we understand that the hydronym Perperék-dere, the name of the river that formed the valley above which Perperikon rises, has been preserved in this area.

Contemporary research and discovered artifacts give reason to believe that it was on Perperikon that the famous oracle of the god Dionysus was located. This is confirmed by the reports of the Roman historian Suetonius Tranquillus, who speaks of a Rodopian sanctuary of Dionysus. In his work "Twelve Caesars" he describes the prophecy given to the father of the first Roman Emperor Octavian Augustus, that his son will become ruler of the whole world, the sign of which was the flame burning at the sacrifice on the altar. In the same shrine it was predicted to Alexander the Great that he would conquer the whole known world from Egypt to India. In describing Xerxes' campaign against the Hellenes in 480 BC. Herodotus also mentions the oracle of Dionysus, which "...was located on a high mountain peak. Besses were engaged in divination in the sanctuary; the priestess gave predictions, as in the Delphic oracle, not differing from it in any way." At least two fateful predictions for mankind were made in the Rhodopean temple of Dionysus. Alexander realized there that he would conquer Asia and the whole world, and the Romans that they would become a world empire.

The Perperikon consists of four parts: the fortress, the Acropolis, the internal fortified city located on the highest part of the hill, the palace-tomb located directly below the Acropolis, and the northern and southern sub-fortresses (which have not yet been explored).

The most impressive structure is the Acropolis, whose walls are 2.8 meters thick. Exist the hypothesis that the fortress was probably built in the Roman period. In 45 years of our era, the whole of Thrace was conquered by the Roman Empire. The process of Romanization, typical for all provinces of the empire, began and Perperikon was thoroughly rebuilt. The fortress wall was built of massive stone blocks with a perfectly carved facade. The base of the wall is carved into the rock and resembles steps. Today, the wall is completely destroyed, but thanks to these steps you can trace its layout. Inside the Acropolis there are a large number of temples and civil buildings. Their first floors were completely carved into the rock. Today the streets, wide for their time, can be laid right into the rock. From the street one can access the almost preserved foundations of the houses. At the eastern end of the Acropolis is a large basilica. It is believed to have been a pagan temple, converted into a church after conversion to Christianity.

The entrance to the building is from the west through two monumental portals carved in the rock. A covered colonnade, the so-called portico, whose columns have been preserved in situ, leads from the basilica to the interior of the Acropolis. In antiquity, such porticos were built only in large cities and significant cult complexes. By now two gates have been discovered on the Acropolis: one in the west and the other in the south.

The sanctuary palace is located 30 meters below the Acropolis. It is supposed to be a monumental temple ensemble of the god Dionysus, which grew continuously and reached its full bloom in the Roman era.

In 2000, a significant archaeological discovery was made - the so-called "temple road". This road leads to the sanctuary palace. It is a hundred-meter long passage formed in the rocks. The passageway is a natural narrow passage that has been further widened. Its width is 3-4 meters, and its height in some places reaches 7-8 meters. Rough high steps are carved in the tunnel. The passage ends with a fortress wall - the palace's enclosing wall. The fortress wall of the palace is connected with the wall of the Acropolis. The palace-sanctuary from three sides (east, west and north) is

surrounded by halls, rooms, corridors, staircases. Today the first floor is preserved, which is completely carved in the rocks. It contains about 50 rooms on an area of 17,000 square meters. Architecturally, it consists of several buildings and is located on seven levels. It has risen several stories. This is evidenced by the holes in the surrounding rock left by the support beams. The preserved first floor rooms can be accessed through well-preserved doors with carved stone lintels, staircases and corridors. In some places, wide windows carved into the rocks have been preserved. One of the most impressive buildings is the ceremonial hall to the east of the courtyard. It is carved in the rocks to the west and continued on a wooden beam to the east. In the western and northern part of the palace-sanctuary, two crypts were discovered located deep under the surface of the rocks. In one, 15 sarcophagi were found, and in the other - 5 sarcophagi made of massive stone slabs.

Of interest is the sewage system constructed in Perperikon. It was built by the first inhabitants of Perperikon and was constantly improved. It reached its final form in the Roman era. Under the brick floors of each room, channels were dug to drain rainwater. They passed through special holes in the door lintels and flowed into larger drains cut into the streets. These, in turn, flowed into several large cloacas that diverted water through holes in the wall down the slope. There are no natural water sources on the hill, so structures were needed to supply Perperikon with water. It is presumed that in addition to the sewage system, there was a plumbing system and two tanks that stored rainwater. One of them has impressive dimensions - 12 meters long, 5 meters wide and 6 meters deep. The tanks are completely carved into the rock. The map shows the sites described above (Fig. 1), and Figs. 2, 3, 4 and 5 are photographs of some of them.

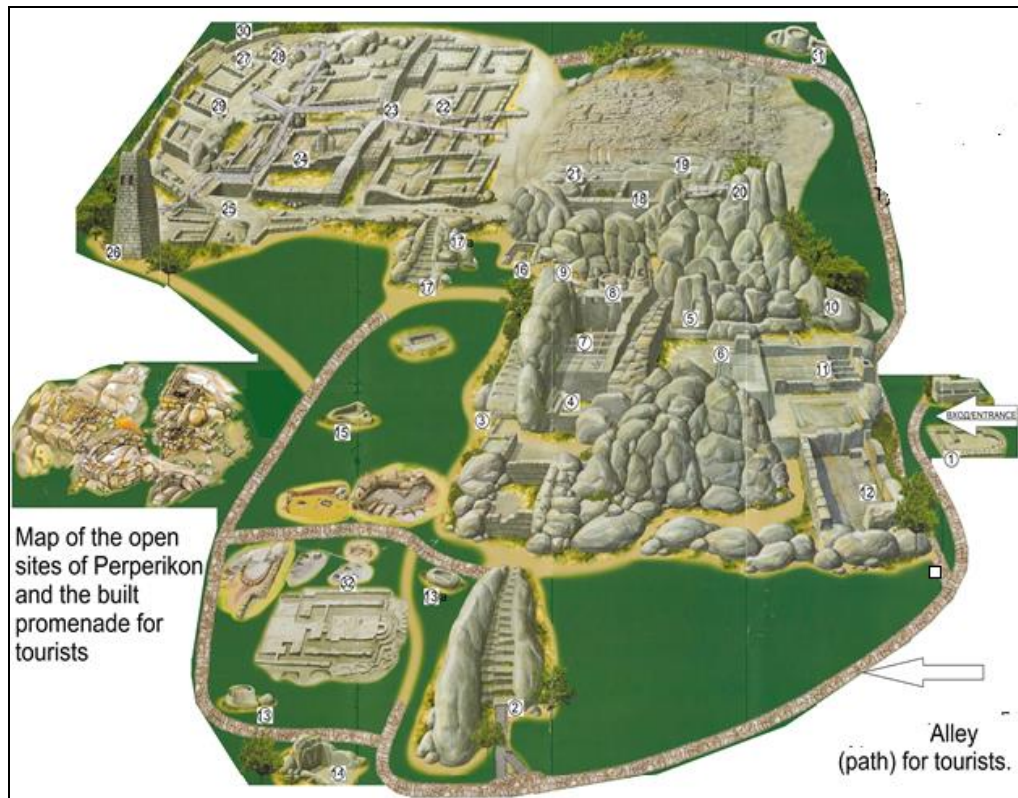


Figure 1. Map of the open areas of the Perperikon and the traveler's route that has been constructed [9]

The legend in Fig. 1: 1.Medieval Church, 2.Rock passage, 3.First gate, 4.Bathhouse, 5.Throne, 6.Stairs leading to the throne room, 7.Large tomb (crypt), 8.Altar in the temple of Dionysus, 9.Western entrance to the room of Dionysus, 10.Room of the young family, 11.Small tomb (crypt), 12. Princess room, 13 and 13a.Sharapana and altar, 14.First reservoir, 15.Sacrificial altar, 16.Chapel with altar, 17.Stairs to the south gate, 17a.Throne and ritual platform of the priest-guesser, 18.Ancient and medieval building, 19.Church, 20.Image of the mother goddess - rock painting, 21. Acropolis - the highest part of the hill, 22. Small palace, 23.Eastern wall, 24. The second basilica, 25. The second basin, 26. The main tower, 27. Pythons - large canisters for storing wine and food, 28. The altar, 29. Roman era quarter, 30. Northwest wall, 31. Sharapana, 32. A large early Christian episcopal church.



Figure 2. General view of the Acropolis

Source: Kardzhali Municipality website -<https://visitkardzhali.com/listing/perperikon/>



Figure 3. View of the second reservoir, the main tower, the Roman quarter and part of the small palace

Source: Municipality of Kardzhali website - <https://visitkardzhali.com/listing/perperikon/>



Figures 4 and 5. Reservoir (nymphaeum) with part of the water supply system and a large tomb (crypt)

Source: personal archive of the authors

Assessment of the tourism potential of Perperikon, the sacred rock city of the Thracians.

Based on the results of field surveys conducted in November 2024, the comprehensive assessment of the tourism potential of the cultural-historical, tourist resource of Perperikon is 87.5 out of a maximum of 100 points (see Table 1).

Table 1. Main characteristics and indicators for assessing the cultural-historical tourist resource of Perperikon - the sacred rock city of the Thracians

№	Defining characteristics of (related to the main criteria)	Indicators and measurements	Scores (number of points)			
			Max.	Max.	for the object	Max. for object
1.	Fascinating/ Attractiveness (criteria 2)	1. visibility / popularity 2. combination with a beautiful and diverse landscape 3. authenticity / preservation 4. uniqueness 5. beauty / exoticism 6. informative / scientific value	1.5 2.3 3.4 4.5 5.4 6.4	25	1 - 5 2 - 3 3 - 4 4 - 5 5 - 3 6 - 4	24
2.	Value (criteria 2)	1.world (including those on the UNESCO list) 2.national (incl. in 100 national tourist sites) 3. local 4. ensemble 5. "for information"	1.8 2.5 3.2 4.2 5.1	18	1 - 0 2 - 5 3 - 2 4 - 2 5 - 1	10
3.	Accessibility (criteria 1)	1.with all (including large-sized) cars / buses	1.5	11	1 -	

		2.by car only 3.off-road vehicles only 4.on foot only	2.3 3.2 4.1		2 - 3 3 - 2 4 - 1	11
4.	Capacity / throughput (criteria 2)	1.throughput capacity (number of visitors per week, per day, per 1 hour) 2.capacity of facilities 3.degree of load on ecosystems 4.possible maximum number of visitors per 1 m ² 5.number of visitors to the number of sites	1.3 2.3 3.3 4.2 5.2	13	1 - 3 2 - 3 3 - 2 4 - 2 5 – data not available	10
5.	Use for tourism purposes (criteria 3)	1.safety in use 2.degree of popularity 3.guaranteed service life 4. capital intensity	1.4 2.2 3.4 4.3	13	1 - 4 2 – 1,5 3 - 4 4 - 3	12,5
6.	Readiness to receive and serve tourists (criteria 3)	1.availability of tourism infrastructure and extension 2.degree of staffing with personnel 3.availability/absence of excursion services 4.degree of availability for formation of tourist product	1.7 2.5 3.3 4.5	20	1 - 7 2 - 5 3 - 3 4 - 5	20
		TOTAL NUMBER OF POINTS OUT OF THE MAXIMUM (100)				87,5

According to the evaluation scale presented in Table 2, the object has high indicators to define its tourism potential as developed.

Table 2. Scale of evaluation of the tourist potential of cultural and historical tourist resources

0-20 т. (1)	21-40 т. (2)	41-60 т. (3)	61-80 т. (4)	81-100 т. (5)
Lack of potential	Low potential	Good potential	Developing potential	Developed potential

The following is a brief analysis of the results obtained according to the various criteria, taking into account the requirements for the length of the report.

For the criterion “Fascinating/attractiveness”, the щироце received a score of 24 out of a possible 25 points. This high score is due to the prominence, authenticity, beautiful landscape, cognitive and scientific value of Perperikon. It is a place that emphasizes its uniqueness not only in the Balkan Peninsula, but also in Europe. The American website <https://www.islands.com/> in 2024 published an article declaring Perperikon as the European Machu Picchu [11]. This comparison has a basis, but we should not forget that Machu Picchu is about 520 years old and Perpericon is more than 8000 years old. When the star of Machu Picchu rises, the sunset of Perpericon comes. Perhaps it's a coincidence.

The criterion “accessibility” received the maximum score. Perperikon has a paved transportation infrastructure. It can be reached by all means of transportation as well as on foot. An asphalted road leads to and from Perperikon. Perpera can be reached by road from Kardzhali and from the village of Chernoochene. The plot is socialized and has: built parking, area for tourist souvenirs, sanitary facilities, regulated access. Next to the hill on which Perperikon is built, a stone alley with installed lighting and cameras has been created. In the stone city, wooden stairs, walkways and information boards have been built to give tourists full access and information about all the restored and preserved sites (Figures 6, 7, 8 and 9).



Figures 6 and 7. The beginning of the stone road for tourists and the wooden staircase leading to the “road to the temple”

Source: authors' personal archive

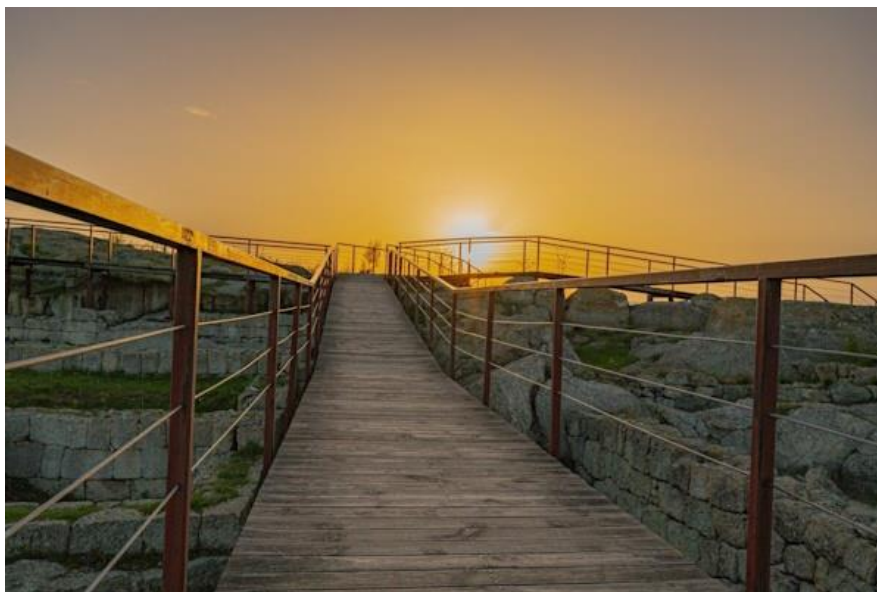


Figure 8. Tourist “alley” built on the Acropolis

Source: Kardjali Municipality website - <https://visitkardzhali.com/listing/perperikon/>



Figure 9. Second basilica and wooden “promenade” for tourists to visit

Source: Kardjali Municipality website - <https://visitkardzhali.com/listing/perperikon/>

The indicator “use for tourism purposes” is estimated at 96% out of a maximum possible 100%. This is due to the degree of exploration, restoration and conservation of the object. Perperikon, according to the National Tourism Council, was visited by more than 35,000 tourists in 2023. As of 2024, the Perperikon archaeological complex continues to be among the most visited cultural and historical sites in the region of Kardjali. The total number of visitors reaches more than 46,000 people [14]. However, according to unconfirmed data, more than 100,000 tourists have visited Perperikon. Even according to official data, Perperikon is one of the most visited cultural tourism sites in Bulgaria.

The project “Perperikon - Temple of Gods and House of Civilizations” is implemented within the framework of the Operational Program “Regions in Growth” for 2014-2020, of which Kardjali Municipality is the beneficiary. This is the municipality's fourth investment project within the EU operational programs, with a total value of BGN 8.2 million, out of the six implemented in Perperikon. In total, according to the Kardzhali Municipality, about BGN 20 million (€10.26 million) has been invested in the socialization of the archaeological site over the years, not counting funds for archaeological research provided by the Ministry of Culture of the Republic of Bulgaria [15]. This is a purposeful, sought-after result of the tourism policy of the meat government. The results obtained are by no means accidental. Tourism is a constant priority in the policy of the municipality of Kardzhali. The Municipality's Comprehensive Development Plan (CDP) for the period 2021 - 2027 already states that tourism is one of the ways to achieve balanced and sustainable economic growth. The development of tourism potential is highlighted as a strategic objective [5].

What has been realized in Perperikon is a good example of interaction between scientists, business, local and central authorities.

The criterion “Importance” received a relatively low score. This is due to the fact that Perperikon is not included in the UNESCO World Heritage List and there are still unexplored areas. However, research continues every year and this is a potential for future development of the site and possibly an application for inscription as a UNESCO site.

On the criterion of “readiness to receive tourists”, Perperikon receives the maximum number of points. According to this criterion, on the one hand, the site has a developed tourist infrastructure, and on the other hand, it is accessible and staffed with guides from the local history museum in Kardzhali. The mode of visiting is free of charge (on payment of a visit fee). This increases the satisfaction and aesthetic perception of the site by tourists.

Conclusions

Perperikon, the sacred rock city of the Thracians, as well as other peoples, cultures and religions, has great potential for the formation of a cultural tourism product. The site has been socialized and prepared for tourists to visit. There are also positive experiences of the local authorities in turning it into an attractive tourist destination. Kardjali Municipality and the Ministry of Culture have invested heavily in research, restoration and conservation. Good cooperation has been achieved between Kardjali Municipality, Kardjali Regional History Museum and the Ministry of Culture, resulting in the realization of the projects presented above. The wide access to information about the site was made possible by respecting one of the EU principles: “ensuring that every user has access to the Internet, the services offered and public information flows” [2].

The question of a general survey of the site remains open. A positive point in solving this problem is that the research under the direction of Prof. Nikolay Ovcharov does not stop. Every year, after the end of the “archaeological season”, Perperikon continues to surprise us with more and more new discoveries. For the development of tourism, the positive aspect is that the discoveries are socialized and become part of the tourist magic of Perperikon - the rock city of the Thracians, the Bulgarian and European Machu Picchu.

In conclusion, it should be emphasized that regardless of the forms of tourism that can be developed, it is necessary that these activities be subject to a targeted policy, provided with the necessary information. Relevant (adequate) information should have the following characteristics: it is a true reflection of the study of each fact, phenomenon, process, excluding subjectivism; it reflects reality in a timely manner; it does not contain omissions or errors; in any case, the costs associated with this information are many times less than the benefits [3].

The present study is a contribution to the clarification of objective information about the state of the object in the process of its development as a tourist resource through the proposed assessment and analysis.

References

1. Актуализирана Национална стратегия за устойчиво развитие на туризъм в България 2014-2030 г., Решение № 65 от 2 февруари 2018 г. на Министерския съвет, <http://www.tourism.government.bg/bg/kategorii/strategicheski-dokumenti>.
2. Димитрова, П.(2020) Адекватность нефинансовой информации в корпоративных годовых отчетах, Управленческий учет и финансы. №2., Москва, с. 134–140.
3. Димитрова, П. (2022), Нефинансова информация в годишните отчети на предприятията, от обществен интерес// монография, АИ „Талант“, Пловдив., ISBN 978-619-203-336-1, стр. 59.
4. Национално представително проучване на населението 18+ на Министерството на туризма(2024), <http://www.tourism.government.bg/bg/kategorii/strategicheski-dokumenti>
5. План за интегрирано развитие на община Кърджали за 2021 - 2027 г. - https://kardjali.bg/?pid=3,norm_2
6. По „Методика за оценка на културните и историческите туристически ресурси (КИТР) и техния потенциал“, IPA Cross-Border Programme CCI Number 2007CB16IPO008, Alliance for regional and civil initiatives (ARCI) – Haskovo branch, chrome-

extension://efaidnbmnnnibpccajpcgclclefindmkaj/https://arcingo.org/bgtrmat/2_4_Assessment%20methodology_BG.pdf,

7. По Перперикон - <https://vila.bg/blog/perperikon>
8. По „Перперикон – Археологически комплекс/<https://newthraciangold.eu/cmspage.php?lng=bg&id=72>
9. По туристическата карта „Перперикон, Татул, Източни Родопи, 2024, изд. Домино.
10. Levkov, Krasimir, (2017). Bulgaria's place in world tourism (an attempt to positioning), New Knowledge Journal of Science, Vol 6, No 1 (2017), ISSN 2367-4598 (Online), Academic Publishing House "Talent" University of Agribusiness and Rural Development - Bulgaria, <http://science.uard.bg/index.php/newknowledge/article/view/208/172>,
11. The 'Machu Picchu Of Europe' Is A Striking Ancient Site More Affordable To Visit Than South America's; Read More: <https://www.islands.com/1739241/machu-picchu-europe-striking-ancient-city-perperikon-more-affordable-cheaper-south-america/>
12. Travel & Tourism Development Index 2024, (2024), Isight Report, may 2024, World Economic Forum, <https://www.weforum.org/publications/travel-tourism-development-index-2024>.
13. <https://tourismboard.bg/news/poveche-ot-35-000-turisti-sa-posetili-perperikon-prez-2023-g/>,
Посетители Перперикон през 2023 г.
14. <https://bnr.bg/kardzhali/post/102134431/po-skapi-bileti-za-perperikon-no-bez-promana-za-muzea-i-galeriata>
15. https://kardjali.bg/?pid=2,2&id_news=9243
16. <https://visitkardzhali.com/listing/perperikon/>

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QUALITATIVE RESEARCH ON CONSUMER PREFERENCES OF SUSTAINABLE PACKAGING

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Abstract

Production of product packaging plays a significant role in the European Union's economy, and sustainability and environmental awareness are becoming increasingly important in consumer behavior. The aim of the research was to explore consumers' preferences regarding sustainable packaging and how their decisions are influenced by the social and regulatory environment conducting semi-structured interviews and additionally a projective technique has been applied. It can be concluded that the respondents generally have a positive attitude toward sustainable packaging, and environmental protection is important to them. Price sensitivity remains a significant barrier to the broader adoption of eco-friendly solutions. Media and influencers play an especially important role, as do regulations (such as the introduction of deposit systems). The interviews revealed that all respondents view recycling and sustainable packaging as important. However, their expectations for the future differ. Based on the research findings, it is clear, that several factors influence consumer preferences regarding sustainable packaging, namely consumer behavior, willingness to pay, external influences, and expectations for the future are closely interconnected. Purchasing decisions are significantly influenced by social effects, particularly from family and friends.

Keywords: Packaging, Sustainability, Consumer, Environment

Introduction

The production of product packaging plays a significant role in the European Union's economy, and sustainability and environmental awareness are becoming increasingly important in consumer behavior. Packaging is essential for protecting and transporting products. It allows for safe transportation and protects the content from contamination and damage (Sacharow and Griffin, 1980). Interestingly, 40% of the plastic and 50% of the paper used in the EU are allocated for packaging (European Court of Auditors, 2020). The largest use of plastics in the EU is in the packaging industry, which includes, for example, yogurt cups, water bottles, and protective packaging for fruits. Future goals include reducing packaging waste and increasing the reuse or recycling of materials (Council of the European Union, 2024). Additionally, manufacturers are being given greater responsibility regarding sustainable packaging. In principle, recycled materials do not always meet the requirements for food packaging, as there may be issues with their physical characteristics, smell, or color.

Several studies focus on environmental protection, the future of packaging trends, with particular attention to EU directives and Agenda 2030 goals. These studies aim to review the social, economic, and environmental aspects that influence the future direction of sustainable development and the packaging industry. The various literatures not only provide a review but also explore consumers' opinions on how environmentally friendly they perceive certain packaging materials, such as traditional plastic, biodegradable plastic, or glass. Moreover, they help better understand the role of packaging in consumer behavior. The findings highlight that consumer awareness is essential for the success of plastic-free efforts and more effective industrial solutions (Nuojuua, et al., 2024). All this can have important implications for companies regarding brand and packaging design. The aesthetic appearance, usability, and symbolic meaning of packaging should not be overlooked, as packaging can also carry social and emotional value (Ghorbani and Westermann, 2024)). In recent years, the growing amount of packaging waste has increased both practical and scientific interest in the technological development, design, and marketing of sustainable packaging (Sonck-Rautio et al., 2024). The role of packaging for consumers is also well reflected in studies examining what happens when a product is transferred without packaging. One such example is the zero-waste approach, where customers can put the product into their own container. Beitzén-Heineke and colleagues (2017) showed that when using their own containers, consumers rated the food higher and, since they could choose the portions themselves, less food went to waste (Beitzén-Heineke et al., 2017).

Methodology

The aim of the research was to explore consumers' preferences regarding sustainable packaging and how their decisions are influenced by the social and regulatory environment. I also focus on their expectations and future ideas about recycling. The literature review highlighted that packaging serves not only a practical purpose such as protecting or transporting a product but also an aesthetic and even emotional role in consumer decision-making. Furthermore, considering environmental factors is becoming increasingly important, where consumer awareness plays a key role. This justifies the qualitative investigation of consumer preferences regarding sustainable packaging. In this research, I aim to explore how Generation Y consumers relate to sustainable

packaging, what factors influence their purchasing decisions, how environmentally conscious they consider themselves, and their ideas about sustainability and the future of recycled packaging.

I formulated my research questions based on the literature review, and four main themes can be distinguished. My questions are as follows:

RQ1. What are the consumers' attitudes and preferences toward sustainable packaging?

RQ2. What role does price sensitivity play in sustainable packaging products?

RQ3. How do social norms, regulations, and media influence consumers' opinions and decisions regarding sustainable packaging?

RQ4. What are consumers' expectations for the future of sustainable packaging?

Each of the research questions related to consumer preferences regarding sustainable packaging covers a relevant theme, helping to gain a deeper understanding of consumer behavior and relationships. Based on the research questions, the four main themes are the following:

- Consumer attitudes towards packaging
- Willingness to pay, price sensitivity
- External influences, social environment (rules, media)
- Recycling and future vision, consumer expectations and future ideas

I conducted semi-structured interviews related to the themes mentioned. I chose the individual interview method for this research because I wanted to specifically explore consumers' attitudes, preferences, and opinions regarding sustainable packaging. This method allowed me to directly question the participants and uncover their personal experiences. Individual interviews provided the opportunity for participants to freely share their opinions and elaborate on their thoughts. The method required significant preparation and time investment, but it enabled me to obtain relevant information.

The research target group consisted of "health-conscious" consumers who likely pay attention to environmental impacts and healthy lifestyles, seeking products that meet specific dietary needs (e.g., vegan, gluten-free, or additive-free foods). Another criterion for the interviews was that the respondents belong to Generation Y. The participants were selected from a store's customer base in Veszprém, which targets health-conscious and environmentally aware consumers. The store sells both packaged and bulk, unpackaged products. This provides customers with the opportunity to use their own containers for zero-waste shopping. Therefore, the opinions of those involved in the research offer particularly relevant insights into attitudes and expectations regarding sustainable packaging, as they are likely to consider the environmental impact of products in their purchasing decisions.

In the retail store, I first discussed the research's purpose, theme, and relevance with the owner. After this conversation, she agreed that I could approach some customers, who also agreed to participate in the interview. To gain the consumers' trust and facilitate smoother interview proceedings, I prepared a presentation that included the key thematic topics. This helped participants preview the potential directions of the conversation, making them more open during the interview. The sample for this research consisted of four respondents. Although the sample size is relatively small, this research primarily served a pretesting function, aimed at laying the groundwork for later, broader data collection and refining research tools. In this pretesting research, I also aimed for a deeper understanding of consumer attitudes, behaviors, and underlying motivations.

Two of the semi-structured interviews were conducted in person, and two online. I

scheduled separate appointments with each interviewee before conducting the interviews. Before the interviews, I created a guide that contained questions related to the topics and helped maintain the allotted time. The interviews averaged 70 minutes. To facilitate smoother conversation, I recorded the interview with the participants' prior verbal consent, then transcribed the information. Naturally, there were some individuals who did not consent to the recording, so their responses were documented in writing. I assured them that their responses would remain anonymous and that there were no right or wrong answers, encouraging them to freely share their thoughts and opinions.

Results obtained and discussions

In the following sections, I will present the responses of each interviewee in detail along the main themes, then compare the similarities, differences, and interesting individual approaches. I will anonymize the respondents with labels A1, A2, A3, and A4 for clarity.

In the first part of the interviews, I asked basic introductory questions to get the participants into the topic. According to the target group, the respondents belong to Generation Y, are residents of Veszprém or nearby areas, and typically shop around three times a week. The results are summarized in the following table.

Table 1.

	A1	A2	A3	A4
Age group	25-30	25-30	30-35	25-30
Location	Veszprém	Veszprém	Sóly	Veszprém
Frequency of shopping	3	3	2	3

Source: own compilation based the interviews

In the first part of the interview, I asked the participants about their views on sustainable packaging, their experiences, and what advantages or disadvantages they associate with packaging. I was curious about how much attention they pay to labels and certifications when selecting products.

For the first respondent (A1), the concept of sustainable packaging was not entirely clear. *"It's not an easy question. There are recycled and biodegradable packaging."* She associate several elements with the concept, such as recycled, biodegradable materials, and the possibility of reuse (e.g., jars, ice cream containers). The most important factors for her are functionality and durability, meaning that the packaging should adequately protect the product. Design or aesthetics are less important, but sometimes the eco-design (color, texture) does not appeal to her. In general, she has a positive attitude toward sustainable packaging. She does not notice labels at the moment of purchase but later on, and believes that these labels are often printed in very small sizes.

The second respondent (A2) has a conscious approach to sustainable packaging and strongly prefers packaging-free options, as well as reusable packaging materials: *"I use reusable packaging materials (glass, paper, boxes, bamboo)."* To her, sustainable packaging also refers to food that is not bought but grown from their own production. *"I think sustainable packaging also means not packaging but growing our own food... it feels good not to buy the bagged versions."*

The third respondent (A3) considers packaging increasingly important, especially for health-conscious products. *"I am trying to eat as healthily as possible now, so quality products take precedence over packaging."* ; *"If I know that a packaging is recyclable, I feel more comfortable*

buying it." She generally prefers glass, paper, and biodegradable packaging. *"I try to avoid regular plastic, but sometimes there is no other option."* Recently, she has been paying more attention to packaging labels.

For the fourth respondent (A4), the first things that come to mind regarding sustainable packaging are environmentally friendly, biodegradable materials that do not burden the environment in the long term. However, the functionality and quality of the products are often more important to them than the environmental impact. He regularly checks labels, especially for dietary reasons, but he also pays attention to signs indicating biodegradable or sustainable packaging. He tries to use his own packaging whenever possible: *"I bring my own jar or container."*

The following summary table illustrates consumer attitudes toward sustainable packaging. Most respondents have a generally positive attitude toward sustainable packaging, but the interpretation of the concept and the main purchasing considerations vary.

Table 2.

	A1	A2	A3	A4
Interpretation of sustainable packaging	The concept is not entirely clear, she associates it with recycling, biodegradability, and reusability	Considers packaging-free and homegrown food as sustainable packaging	Sustainability is reflected in conscious material choices (e.g., recyclable, biodegradable materials)	First thinks of environmentally friendly, biodegradable packaging, but emphasizes practicality
Important considerations when purchasing	Functionality and quality, aesthetic considerations are less important	Packaging-free and reusable packaging	Functionality and quality, aesthetic considerations are important; labels and signs play a role	Functionality and quality, labels and signs play a role

Source: own compilation based the interviews

The interview participants show interest in sustainable packaging and are open to new solutions. To a greater or lesser extent, all show some level of awareness. However, choosing sustainable packaging often involves compromises (e.g., price, availability, functionality).

In the next section of the interview, I asked the participants questions related to their willingness to pay and price sensitivity.

The first respondent (A1) is willing to pay more for sustainable packaging, especially for cosmetic products (e.g., refillable soap, products in cardboard packaging). She understands that these products are more expensive due to additional technological processes and higher energy consumption. She accepts that the circular economy system comes at a cost: *"I always buy granola here in the store... I can ask for it in my own container... compared to the packaged version, it costs the same."* This response reflects a conscious purchasing attitude, as she is critical and thoughtful in financial matters. *"In other stores, I'm not willing to pay 15 Ft for a biodegradable bag."*

The second respondent (A2) shows price sensitivity but acknowledges that compromises need to be made: *"Yes, it depends on my wallet."* She believes that in Hungary, there are still system

limitations, and unfortunately, environmentally friendly technological processes are costly. *"The process itself might be more expensive for companies than just producing something new."*

The third respondent (A3) would be willing to pay more for sustainable packaging, but only to a certain extent: *"If it's, for example, a few hundred forints more, but I really feel that it's an environmentally friendly solution, then I'd gladly pay."* Visual appeal and clear labeling would

greatly facilitate their decision. *"It would help if the design was appealing as well, if something looks good and is green, that's a bonus for me... if the packaging clearly highlighted why it's sustainable."* From this, it can be inferred that design and communication are significant influencing factors.

The fourth respondent (A4) mentioned that due to his special dietary needs, the products he buys are already more expensive, making it harder for him to afford even the sustainable alternatives. Although he considers environmentally friendly solutions important, the high price and lack of availability are barriers.

Price and willingness to pay are significant factors for almost all respondents. It can generally be concluded that sustainable packaging comes with an additional cost.

Table 3.

	A1	A2	A3	A4
Price Sensitivity	Does not explicitly mention price sensitivity, but prioritizes functionality over design or other factors	Believes in self-production, thus partially avoiding store prices. Prefers packaging-free or reusable alternatives	Willing to pay more if the product is healthier, higher quality, or more sustainable	Sensitive to price due to already buying more expensive products due to special dietary needs
Willingness to Pay	Generally open to paying more for sustainable packaging	Generally open to paying more for sustainable packaging	Generally open to paying more for sustainable packaging	Generally open to paying more for sustainable packaging

Source: own compilation based the interviews

Most respondents are generally open to paying more for sustainable packaging, but to varying extents. Several participants pointed out that sustainable packaging products are often limited in availability or are sold at a higher price. It can be concluded that while openness to sustainability is present, it does not always correlate with a real willingness to pay. Price sensitivity is one of the biggest obstacles to the widespread adoption of sustainable packaging. Factors such as personal circumstances, like dietary restrictions (A2 and A4) or home production (A2), significantly influence their choices.

In the third section of the interview, I asked questions to understand how social expectations, regulations, and media affect their views on sustainable packaging.

The first respondent (A1) feels social pressure towards a more sustainable lifestyle, partly due to deposit systems or the media's encouraging role. For example, she mentioned that the introduction of a deposit fee motivated them to invest in a soda machine: *"The 50 Ft deposit fee encouraged me to invest in a soda machine. It comes with a thick-walled plastic bottle that I can refill, eliminating the need to buy bottled water."* She trusts the selective waste collection system,

though she notes that *"nothing is perfect."* A1 mentioned several brands she particularly appreciates for his eco-friendly packaging, such as DM's own-brand products for their recycled packaging or Lush's packaging-free alternatives (e.g., soap bars). However, she also noted that Lavender Tihanyi Natural Cosmetics, which they like, are considered natural for their ingredients but not for sustainable packaging.

The second respondent (A2) believes that regulation is crucial, especially in encouraging younger generations. She sees this change as generational: *"Older people are not very interested in these things, but younger people are much more conscious."* She thinks that those with specific dietary needs tend to be more conscious in their purchases. It's worth noting that A2 follows a vegan diet. She also emphasizes the importance of teaching proper selective waste collection habits from an early age.

For the third respondent (A3), the media is the most significant influence, particularly videos that showcase environmental impacts. She does not see societal expectations as overwhelming but rather as inspiring: *"I don't actively follow regulations, but if rules get stricter, people automatically pay more attention."* She also noted that media and online spaces increasingly discuss sustainable packaging, which influences their thinking.

Although the media positively impacts the fourth respondent (A4)'s attitude toward sustainable packaging, practical implementation in their daily life is more challenging. *"I'm often rushing around."* The actual steps toward sustainability are sometimes difficult due to time constraints and accessibility issues. A4 actively follows online content and often makes product choices based on recommendations that highlight packaging and ingredients. *"For example, I choose the Jordan toothbrush because it's partially made from recycled materials."* Authentic recommendations make purchasing decisions easier for him.

The external environment such as media, influencers, and regulations has a significant impact on attitudes toward sustainable packaging. Respondents perceive these influences in different ways.

Table 4.

	A1	A2	A3	A4
Role of External Influences	Did not specifically mention media; responses suggest experiences and practical considerations.	Critically views advertisements, prioritizing personal experience, knowledge, and reliable sources.	The media is a source of information. The sustainable packaging is becoming more prominent.	Influenced by product recommendations and relies on his for purchasing decisions.

Source: own compilation based the interviews

The analysis of the interviews reveals that media and the social environment significantly affect the participants. Peers and family members also influence their purchasing decisions. Several participants mentioned that environmental consciousness is becoming a more common topic within their close circles. Information from credible sources helps them make decisions more easily.

In the final key section of the semi-structured interview, I discussed the future vision of recycling with the participants. I asked guiding questions about their selective waste collection habits and their ideas for sustainable packaging.

The first respondent (A1) shared that her entire family practices selective waste collection and that they consider it very important. She is optimistic about the future and wish to see more products available in recycled packaging, with people becoming more conscious about it. *"The more people actively engage in selective waste collection and recycling."* Unfortunately, many people do not consciously choose these alternatives.

For the second respondent (A2), selective waste collection is not only a habit but a life philosophy. It goes beyond basic sorting, as she regularly and consciously collect items like used oil, batteries, and electronic devices. Although it sometimes happens that not all waste in their household is disposed of properly, she makes an effort to remind family members about the importance of selective collection from time to time. The respondent mentioned the selective waste collection service in Sólý, where the recyclable waste is picked up once a month, which she finds sufficient due to their conscious lifestyle and purchasing habits that result in minimal waste production.

The third respondent (A3) sorts waste regularly at home, it has become a routine, but she expresses some skepticism about the system: *"At home, I sort plastic, paper, and glass. It has simply become a habit..."* *"...sometimes I doubt whether it's actually being recycled..."* She consistently takes the sorted waste to the correct collection points. In the future, she would like to see more sustainable options available in stores, at more accessible prices, and with clearer communication. *"It would be nice if sustainable choices didn't seem like a luxury or 'advanced level'..."*

The fourth respondent (A4) also practices selective waste collection and takes it to collection points. He generally pays attention to his environment but, due to his fast-paced lifestyle, cannot always make time for thoughtful, conscious decisions. However, he believes that small steps can still make a big difference: *"Everyone should pay attention to their own 5%."* In the future, she would like to see more materials that are easier to recycle and more widely available.

The respondents expressed differing expectations for sustainable packaging in the future.

Many respondents mentioned that labeling on sustainable packaging is not clear enough (A1, A4). Looking ahead, they expect packaging to provide more understandable and visible information. In many cases, sustainable packaging is either unavailable or too expensive, and in the future, they hope that a wider range of options will become available at standard prices. Additional incentives, such as return systems and discounts, could further encourage sustainable choices.

Table 5.

	A1	A2	A3	A4
Expectations and Development Directions	Packaging should be functional and environmentally friendly.	Consumers increasingly use their own containers, buy from local sources, and even produce their own.	Increasing the use of recycled and biodegradable materials.	Glass, paper, and biodegradable packaging.
Future Expectations	Packaging should not only be biodegradable	Clearer and more easily interpretable	Sustainable packaging is often unavailable or too	Clearer and more easily interpretable

	but also truly recyclable.	labeling on sustainable packaging.	expensive. She expect it to become widely accessible at a normal price, with potential incentives like returns and discounts.	labeling on sustainable packaging, normal price.

Source: own compilation based the interviews

As a final step of the interview, I applied a projective technique, asking the respondents to personify sustainable packaging. This method helped me gain insight into how they perceive its characteristics, what age group it would belong to, what occupation it would have, and what hobbies it might enjoy.

The first respondent (A1) envisioned sustainable packaging as a young woman who is creative, community-oriented, and inspirational. *"She would be a young woman, perhaps a seamstress, making fashionable clothes from everything she recycles, helping others... a community person, maybe even a green influencer, who raises awareness about environmental protection."*

The second respondent (A2) imagined sustainable packaging as a woman working in a helping profession, *such as "a social worker, wellness expert, or health advisor."* She would be someone for whom social utility, environmental responsibility, and community well-being are important. Not only does she lead a conscious and active lifestyle, but she also inspires and supports others. She lives actively, follows a mindful lifestyle, and values both physical and mental health.

The third respondent (A3) personified sustainable packaging as a person with a strong character, probably working in a creative profession such as an environmental consultant or designer. She would live consciously but would not impose her values on others.

The fourth respondent (A4) envisioned sustainable packaging as a well-groomed, kind-looking man, dressed in white, who works as a gardener. He lives in harmony with his environment, radiates awareness, yet remains a simple, everyday figure.

Conclusions

In this section, I would like to present the key findings related to the research questions.

RQ1. What are the consumers' attitudes and preferences toward sustainable packaging?

It can be concluded that the respondents generally have a positive attitude toward sustainable packaging, and environmental protection is important to them. However, their views on the concept of sustainable packaging vary. For all four respondents, the practical and functional aspects of packaging are of paramount importance, while design and aesthetics are less significant (A1, A4) or serve as a secondary factor (A3). There are differences in the level of awareness among the respondents: A2 and A4 try to use their own packaging, while A1 and A3 mostly prefer recycled options. The pursuit of sustainability often involves compromises, particularly in terms of price, availability, and functionality. The ideal (environmentally conscious and practical) packaging is not always available.

RQ2. What role does price sensitivity play in sustainable packaging products?

The research revealed that the acceptance of sustainable packaging is both an economic and practical issue. Price sensitivity remains a significant barrier to the broader adoption of eco- friendly solutions. Consumer decisions are influenced by multiple factors such as life situation, regular product use, product availability, and communication. There is greater openness toward alternatives like self-produced packaging, packaging-free options, and refillable packaging, as these could be more cost-effective in the long term. Most respondents are particularly price- sensitive, but some indicated that if sustainability is clearly communicated or if the product's design is attractive, they are more willing to pay a higher price.

RQ3. How do social norms, regulations, and the media influence consumers' opinions and decisions regarding sustainable packaging?

The interviews showed that social influences significantly affect the purchasing decisions of Generation Y regarding sustainable packaging. Media and influencers play an especially important role, as do regulations (such as the introduction of deposit systems). Social norms, particularly the environmentally conscious attitudes of family members and peers, also emerge as strong influencing factors.

RQ4. What are consumers' expectations for the future of sustainable packaging?

The interviews revealed that all respondents view recycling and sustainable packaging as important. However, their expectations for the future differ. Several respondents (A1, A4) emphasized that current packaging labels are not clear enough. They expect that future labels will be clear, visible, easily interpretable, and informative. Respondents also expect sustainable packaging to not be more expensive than conventional packaging. Additional incentives, such as a return system, deposit packaging, or discounts, would increase consumers' willingness to choose sustainable packaging.

Projective Technique: Personification of Sustainable Packaging

In addition to the research questions, I applied a projective technique, asking interviewees to provide a brief description of how they would personify sustainable packaging. This method allowed me to understand how consumers imagine sustainable packaging. The summarized results are shown in the table below.

It is evident that social, lifestyle, and moral values were also associated with sustainable packaging, and it appears as a role model in the respondents' imagination.

Table 6.

Interviewee	Gender	Occupation/Role	Characteristics, Values	Key Phrases
A1	Female	Fashion designer / Seamstress / Influencer	Creative, community-oriented, recycling, inspiring	<i>"green influencer", "recycles everything", "helps others"</i>
A2	Female	Wellness expert / Health advisor / Social worker	Helpful, conscious, focused on physical and mental health, active lifestyle	<i>"social utility", "health-conscious", "community well-being"</i>

A3	Female	Environmental consultant / Designer	Strong character, authentic, creative, non-imposing	<i>"does not impose her values on others"</i>
A4	Male	Gardener	Harmonious, kind, simple, conscious, nature-connected	<i>"white-clad gardener", "radiates awareness"</i>

Source: own compilation based the interviews

Based on the research findings, it is clear, that several factors influence consumer preferences regarding sustainable packaging. Consumer behavior, willingness to pay, external influences, and expectations for the future are closely interconnected. Purchasing decisions are significantly influenced by social effects, particularly from family and friends. One respondent (A2) mentioned the frequency with which selective waste is collected in the community, highlighting the important role of waste management companies. If the service is not functioning properly, it could hinder environmentally conscious efforts. On the other hand, the opportunity exists for everyone to take their recyclable waste to designated collection points.

In future research, it will be crucial not to overlook sociodemographic factors such as age, gender, education, and place of residence. It would be advisable to clarify the research questions. Greater emphasis should be placed on exploring generational differences and consumers' awareness of sustainable packaging. It would have been advisable to carry out the research by product groups. Specific questions, along with increasing the sample size, would lay the groundwork for a broader data collection in future studies. Additionally, those with specific dietary habits tend to be more conscious of their purchases and the environmental impact. Thus, future research could include a pre-screening of respondents regarding their dietary habits, which would provide an opportunity for a more detailed examination of differences. Since conducting the interviews required significant time investment, it would have been more efficient to conduct focus group interviews, which would have allowed for the collection of more opinions and experiences in a shorter time frame.

References

1. BEGHETTO, V., GATTO, V., SAMIOLO, R., SCOLARO, C., BRAHIMI, S., FACCHIN, M., VISCO, A. Plastics today: Key challenges and EU strategies towards carbon neutrality: A review. *Environmental Pollution*, 2023, 334, 122102
2. BEITZEN-HEINEKE, E.F., BALTA-OZKAN, N., REEFKE, H. The prospects of zero-packaging grocery stores to improve the social and environmental impacts of the food supply chain. *Journal of Cleaner Production*, 2017, 140, 1528–1541. <https://doi.org/10.1016/j.jclepro.2016.09.227>
3. COUNCIL OF THE EUROPEAN UNION, Sustainable packaging. Council signs off on new rules for less waste and more re-use in the EU, 2024
4. EUROPEAN COURT OF AUDITORS. Plastic waste and packaging in the EU: Better design and recycling of plastic products. Luxembourg: Publications Office of the European Union. Available, 2020 at: https://www.eca.europa.eu/Lists/ECADocuments/RW20_04/RW_Plastic_waste_EN.pdf (Accessed: 01 April 2025).
5. GHORBANI, M., WESTERMANN, A. Exploring the role of packaging in the formation of brand images: a mixed methods investigation of consumer perspectives. *Journal of Product & Brand Management*, 2024, 34, 186–202. <https://doi.org/10.1108/JPBM-09-2023-4738>
6. SACHAROW, S., GRIFFIN, R.C. Principles of Food Packaging. 1980, AVI Publishing Company.
7. NUOJUA, S., PAHL, S., THOMPSON, R. C. Plastic alternatives and substitutes in the packaging sector – A UK consumer perspective. *Sustainable Production and Consumption*, 2024, 46, pp. 68-81.
8. SONCK-RAUTIO, K., LAHTINEN, T., TYNKKYNNEN, N. Consumer meaning -making of packaging functions for sustainable food packaging – Insights from qualitative research in Finland. *Current Research in Environmental Sustainability*, 2024, 7, 100259. <https://doi.org/10.1016/j.crsust.2024.100259>

FUNCTIONAL APPROACH TO THE ORGANIZATION OF INFORMATION IN THE INTEGRATED MANAGEMENT SYSTEM OF COMMERCIAL UNITS

ABORDAREA FUNCȚIONALĂ A ORGANIZĂRII INFORMAȚIILOR INFORMATIVE ÎN SISTEMUL MANAGERIAL INFORMATIC INTEGRAT AL UNITĂȚILOR COMERCIALE

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Abstract

This paper reveals the information of informative (reflective) role, which constitutes the basis for the formation (formulation) of the values of decision-making information units. The examination, first of all, of the stage of functional organization (by management functions) of the named information in the environment of the full transformative process is justified by the fact that the creation of an object or the initiation of a work requires the clarification of their organizational aspect, which, in turn, inevitably causes the need to determine the composition and values of the structural management (management) units. The availability of these two parameters of the given domain creates conditions for establishing the ways of changing both the composition and values, as well as the work necessary to be performed on them, that is, processing. That is why, organization, by its imperativeness within any evolutionary stage, it is of decisive influence, as based on it, the correct passage of the other two situations (structuring and processing) of the single information-decision-making process takes place. In this sense, at the level of organizational unit (university, enterprise, etc.) possible variants of organizing information units with an informative role within the limits of the unitary management process are revealed and analyzed.

Keywords: organization, criteria, informative, information, economic, management, system

JEL: D69, D89, C60, C61

Introducere

Specificul mediului oricărui sistem informatic integrat constă în aceea, că în componența sa, în interconexiune și interacțiune, intră toate constituențele materiale și informaționale ale obiectului sau activității gestionate. Cadrul acestui sistem cuprinde trei stadii evoluționiste de bază: organizare, structurare și funcționare.

Enumerarea primordială a organizării este justificată de faptul că inițial apare ideea creării unei unități constituante (fabrică, stadion, etc). Pornind de la predestinația unității în cauză, în continuare obiectiv se impune determinarea structurii, adică, evidențierea acelor elemente, care prin compoziția și interacțiunea lor asigură funcționarea ei.

Primele două stadii sunt de ordin contributiv la prelucrarea de calcul, logic eficientă a datelor de intrare și permanent o precedă. Deși, din punct de vedere a obținerii noilor valori informaționale în procesul unitar transformativ, ele dispun de rol secundar (pregătitor), efectuarea lor influențează decisiv metamorfoza modalităților și succesiunea operațiunilor de calcul. Ele determină componența și gruparea elementelor incluzând într-un tot întreg, succesiunea repartizării lor. Privind prioritatea, întâietatea aparține organizării, deoarece prin ea se stabilește primordial ce obiect sau activitate constituantă e necesar de organizat, iar în această bază - din ce elemente trebuie să constea unitatea și care ar fi ordinea repartizării lor. Pe lângă acestea, abordarea structurală și transformativă solicită luarea în considerare a aspectului lor organizatoric. Deci, fără

posedarea conținutului organizatoric e imposibil de a organiza, structura și pune în funcțiune orice obiect (proces)

La moment și în perspectiva imprevizibilă, pentru informațiile economice sunt proprii două domenii de procesare a lor: sistemul de gestiune și subsistemul lui informatic. Așa cum cel dintâi, la primul nivel compozițional constă din funcții, care sunt realizate de subiect, respectiv și organizarea unităților informaționale se consideră funcțională manuală. Totodată, organizarea datelor pe mediul suporturilor mijloacelor tehnice este de ordin informatic și are loc în mod automat.

Pentru majoritatea sistemelor informatice existente este caracteristică orânduirea separată și îndeplinirea fragmentară a procedurilor și operațiunilor manuale cu cele tehnice.

În ciuda faptului că mijloacele tehnice dispun de destinație hotărâtoare în realizarea informatică a procesului informațional unitar, fără cunoașterea și aplicarea corectă a specificului domeniului de aplicare al lor, își pierd sensul și necesitatea utilizării. Din acest motiv, primar, logic rațional fondat, se solicită ca mai întâi să fie profund, pe deplin și calitativ studiat, precum și strict respectat aspectul funcțional al organizării informațiilor atât pe parcursul lucrărilor elaborative, cât și a celor de funcționare a sistemelor informatice integrate. Tot așa, și obținerea informațiilor reflectante (informative) este de ordin primar, așa cum în baza lor se formează informațiile decizionale.

Din cele constatate până acum, devine evident că pentru orice sistem integrat, inclusiv și cel informatic, mai întâi se solicită studierea și traducerea în practică a concepției organizării funcționale a domeniului, valorile parametrilor căruia servesc drept bază de estimare și selectare a metodelor tehnologice și mijloacelor tehnice informatice, necesare pentru funcționarea automată a procesului material-informațional unitar.

Rezultate obținute și discuții

1. Locul, valoarea și predestinația informațiilor de rol informativ în sistemul managerial integrat

În prezent, pentru domeniul informațiilor economice, la anumite stadii, sunt caracteristice studiul și utilizarea lor în mod izolat, fără luarea în considerare a conexiunilor funcționale și transformativă. Odată cu complicarea compoziției, majorarea excesivă a volumelor, inventarea și aplicarea masivă a mijloacelor tehnice performante, s-au creat condiții și se cere abordarea sistemică a informațiilor în cauză. Din acest motiv, se impune elaborarea și traducerea în practică a proceselor informaționale în interconexiune și interacțiune dintre unitățile informaționale.

Pentru domeniul activităților economice umane sunt proprii două categorii de procese: materiale și informaționale. La rândul său, după locul ocupat, valoare și predestinație în cadrul sistemului managerial economic unitar se evidențiază informații informative și decizionale. Fiind extrase din realitatea materială și luate în particular, informațiile informative îndeplinesc funcția de reflectare. De aceea, în cadrul sistemului gestional unitar astfel de informații ocupă poziție intermediară între compartimentele material și gestional, în baza lor creându-i-se condiții de formare (formulare) a informațiilor decizionale.

Actualmente, așa informații sunt supuse prelucrării prin intermediul diverselor proceduri și operațiuni în mediile managerial (extern) și tehnic (intern). Deoarece primele din ele (cele informative) sunt procesate de subiect în mod manual, prin intermediul variatelor funcții, iar cele

secunde (decizionale) – cu ajutorul mijloacelor tehnice, în mod automat, respectiv și se disting interpretări funcționale și informatice ale lor.

Având în vedere că aspectul funcțional este primar, iar organizarea predetermină structurarea, transformarea și utilizarea datelor, e necesar ca astfel de etapă a evoluției sistemului informațional să fie examinată în primul rând, permanent conducându-se de specificul realizării ei pe parcursul întregului proces de elaborare, implementare și funcționare a procesării valorilor informaționale

În acest context, de pe poziții de deservire a funcțiilor de gestiune ale sistemului managerial economic, organizarea informațiilor impune conștientizarea și luarea în considerare a următoarelor momente de bază, de care e necesar de ținut cont permanent atât în activitățile gestionale, cât și în cele informative, indiferent de modalitatea efectuării celor din urmă (manuală sau automată) [1, 73-81; 2, 54-64; 3, 38-44]:

- 1) interpretarea obiectului economic condus drept nucleu unitar material – managerial-informațional;
- 2) legătura organic indisolubilă dintre obiectele și activitățile materiale economice;
- 3) precedarea și succedarea proceselor materiale economice;
- 4) poziția intermediară între obiectul (procesul) material condus și sistemul lui de conducere;
- 5) asigurarea funcționării obiectului condus și realizării sistemului managerial al lui prin organizarea informațiilor sub formă de fluxuri;
- 6) orientare opusă a mișcării fluxurilor informaționale informative ce precedă (de normare, reglementare și previziune) celor ce succedă (evidență; statistică; gestiune) activitățile materiale economice. Primele se mișcă de la sistemul managerial spre obiectul condus, formându-și valorile unităților informaționale structurale derivate prin descompunere. Cele secunde se mișcă în direcție opusă – de la obiectul condus spre sistemul lui de conducere, formându-și valorile unităților informaționale structurale derivate prin generalizare (sintezare);
- 7) prin infiltrare structurală și calculantă a informațiilor ce precedă cu cele ce succedă activitățile materiale se formează cea de a treia categorie de informații – cea de analiză economică;
- 8) în procesul de prelucrare informațiile de normare și de referință servesc drept bază de formare a valorilor majorității unităților informaționale derivate de previziune și de evidență, în așa mod executând funcția de „mediu alimentar” al formării și apariției celor din urmă;
- 9) rolul dublu (transformativ și funcțional) al informațiilor precedente activităților materiale economice contribuie la organizarea lor în mod combinativ, în îmbinare atât între ele, cât și cu celelalte categorii de informații;
- 10) realizarea conexiunilor combinate dintre diverse grupuri de informații funcționale, ce precedă și succedă procesele materiale, conduce la formarea informațiilor de analiză economică;
- 11) organizarea informațiilor la nivel de unitate organizatorică economică (agenție, firmă, etc.) sub formă de rețea este adecvată modalității reticulare de realizare a activităților acestei unități;
- 12) elaborarea și funcționarea rețelei informaționale unitare are loc grație dispunerii de anumiți parametri și exigențe ale mediului material ce trebuie respectate;

- 13) diversitatea variantelor de organizare a informațiilor este provocată de mediul și principiile abordării distribuirii lor;
- 14) distribuirea pur funcțională contribuie la organizarea sistemului de informații economice (S.Ît.E.) pe funcții, complexe de probleme și probleme gestionale în particular;
- 15) abordarea funcțional-spațială se realizează prin ramificarea pe funcții, nivele, organe, posturi de conducere, probleme soluționate și indicatori apartenenți lor. În cadrul acestei modalități de abordare pot fi realizate diverse variante de organizare a informațiilor - pur spațială, pe nivele gestionale, combinativă;
- 16) abordarea temporală, de asemenea, contribuie la diverse variante de organizare a informațiilor economice pe termene (perioade) de funcționare a obiectelor (proceselor) conduse.

2. Abordarea funcțională a organizării informațiilor informative ale procesului managerial economic unitar și realizarea ei conceptuală

În baza interpretării funcționale se poate ajunge la concluzia că în mediul sistemului managerial economic fluxurile informaționale informative sunt organizate funcțional, spațial și temporal. În conformitate cu aceasta, la nivel general informațiile economice în mod obiectiv se ramifică pe nivele, funcții și obiecte manageriale, precum și pe momente verificative de realizare a deciziilor gestionale.

În cel mai general plan distribuirea informațiilor informative economice pe funcții gestionale este prezentată grafic în fig. 1 [1,81-82; 2,65-66; 3,44-45]

Din ea e evident că sistemul de informații economice al obiectului condus (S.Ît.E.Ob.Cs.) la primul nivel se ramifică pe funcții de conducere (F.C.) ce constituie conținutul sistemului de conducere al obiectului (S.C.Ob.). La următorul nivel informațiile informative ale fiecărei funcții gestionale se divizează pe complexe de probleme (C.P.) de aceeași categorie. Cel de al treilea nivel gestional preconizează determinarea conținutului informațional informativ al fiecărei probleme gestionale (P) în cadrul fiecărui complex. În final, la ultimul nivel, în cadrul fiecărei probleme gestionale informațiile informative se organizează pe indicatori gestionali (I).

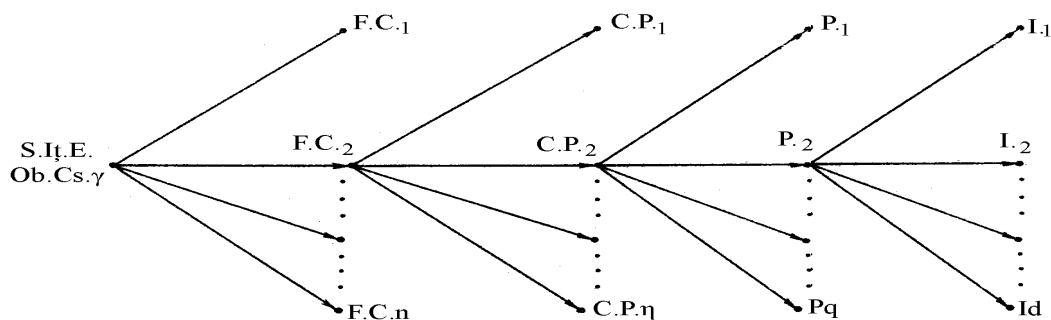


Figura 1. Schema conceptuală a distribuirii informațiilor informative economice pe funcții gestionale

Succesiunea distribuirii consecutive a informațiilor informative ale sistemului de gestiune economică pe unități gestionale (funcții, complexe de probleme, probleme) în interpretare analitică se prezintă în următorul mod:

$$(S.I_t.E.O_b.C_{s,\gamma}) \equiv [F.C_i]; i=1,2,3,\dots,m; \quad (1.1)$$

$$(F.C_i) \equiv [C.P_e]; e=1,2,3,\dots,n; \quad (1.2)$$

$$(C.P_e) \equiv [P_r]; r=1,2,3,\dots,p; \quad (1.3)$$

$$(P_r) \equiv [I_\alpha]; \alpha=1,2,3,\dots, q. \quad (1.4)$$

De regulă, indicatorul se consideră drept unitate structurală cu sens funcțional informativ, însă e necesar de atras atenție și asupra posibilității utilizării lui în calitate de unitate gestională. De rol dublu (informativ și gestional) dispun și celelalte unități gestionale (F.C., C.P., P.).

În așa sens informațiile unor funcții gestionale economice (evidență, gestiune, statistică) luate în particular, fără legătura cu informațiile altor astfel de funcții, poartă caracter pur informativ. Ele oferă informații referitoare la situația reală a obiectului. În absența informațiilor de previziune sau de normare ele nu pot să contribuie la formularea concluziei privind evoluția obiectului (procesului).

Informațiile celorlalte funcții gestionale economice (normare, reglementare, analiză economică) dispun de rol dublu – în cazul implicării lor în procesele de prelucrare în comun cu alte informații ele sunt informative, iar în cazul aplicării lor separate ele sunt de ordin gestional.

Tot așa și complexe de probleme ale fiecărei funcții, problemele fiecărui complex și indicatorii fiecărei probleme pot fi de ordin informativ și gestional. În prima variantă aceste unități numai reflectă situația unității conduse, iar în cea de a doua variantă - servesc drept bază pentru interveniri în această situație. Condiția obligatorie a clasării problemei sau indicatorului în categoria celor informative sau gestionale este contribuția lor la formularea unei sau mai multor decizii gestionale. Prin urmare, funcția gestională poate fi interpretată și drept ansamblu de decizii interconexate de una și aceeași clasă, orientate spre realizarea unui oarecare scop referitor la un oarecare parametru de funcționare a obiectului gestionat în integritate.

Sensul problemei informative se reduce la formarea unuia sau a câtorva indicatori cu valori derivate. La cel mai inferior nivel de gestiune (loc de muncă, operațiune) așa problemă poate fi soluționată în bază unei sau mai multor date primare.

Studiul aspectului gestional (funcțional) al procesului de gestiune contribuie la determinarea structurii sistemului managerial, pe când studiul aspectului informativ – la determinarea organizării și structurii sistemului de informații. Totodată, primul aspect este fundamental, așa cum el predetermină componența și volumul informațiilor informative necesare pentru realizarea lui.

Distribuirea informațiilor informative economice pe funcții gestionale de aceeași categorie și pe componente constituente ale funcțiilor indisolubil este legată de ramificarea lor în continuare pe anumite raze spațiale, concret realizate sub formă de diverse nivele gestionale și obiecte gestionate aparținând acestor nivele. Aici, de importanță majoră dispune stabilirea raportului dimensional dintre nivelul și funcția gestională, subordonarea lor. Astfel de situație se reduce la aceea că o parte din funcții gestionale considerate drept centralizate pătrund toate nivelele de conducere și în, același timp, fiecare din nivele corespunde așa componență (colecție) de funcții. De exemplu, funcțiile de evidență și previziune sunt realizate începând cu cel mai inferior (loc de muncă, brigadă) și terminând cu cel mai superior (economia națională) nivel de conducere economică. Celelalte funcții (în sens de organizare a efectuării lor) la unele nivele pot fi realizate, iar la altele – nu. Așa, funcția de normare se referă la orice nivel de conducere economică, însă nu la toate din ele ea este realizată din cauza volumului infim de lucrări, caracterului lor accidental și dispunerii de posibilități de răspândire (difuzare, oferire) a informațiilor normative elaborate de un obiect sau de mai multe obiecte.

E cunoscut, de asemenea, că funcțiile gestionale locale se referă la anumite totalități de obiecte și nivele de gestiune. De aceea în unele cazuri e dificil de stabilit care din aceste aspecte este de bază – cel funcțional sau cel spațial (dimensional). Probabil, pe parcursul studiului proceselor distributive a informațiilor e necesar de condus de scopurile efectuării lui. În cazul distribuirii informațiilor în dependență de destinația lor funcțională e necesar de determinat pentru fiecare funcție gestională nivelele și obiectele aparținute ei. Așa, la orice unitate organizatorică materială, inclusiv și comercială cu potențial major funcția de evidență deservește toate cinci nivele gestionale [1, 22-26; 2, 42-46; 3, 29-35], iar în interiorul fiecărui nivel – totalitățile de obiecte respective aparținute nivelului (la primul nivel – locurile de muncă, la nivelul doi – brigăzile, la nivelul trei – secțiile etc.).

Procesele gestionale ce constituie conținutul nivelului de gestiune sunt realizate de anumite organe. La rândul său, activitatea oricărui organ gestional este susținută și evoluează grație anumitor posturi funcționale suplinite de anumiți lucrători. În continuare, în cadrul fiecărui post este soluționat un anumit ansamblu de probleme, în așa scop fiind utilizate anumite totalități de indicatori. În final, indicatorii de una și aceeași categorie pot fi implicați în gestiunea diverselor varietăți de obiecte sau diverselor obiecte ale uneia și aceeași varietăți. De exemplu, indicatorul recepționărilor (intrărilor) resurselor pot să se refere și la mijloacele fixe, și la materia primă, și la produsele finite, etc., pe când indicatorul intrărilor materialelor de bază se referă la toată gama denumirilor lor incluzente în nomenclatorul de ansamblu al lor.

Schema generalizată a distribuirii informațiilor informative economice în varianta abordării ei funcțional – spațiale (dimensionale) este prezentată în fig. 2 [1, 82-83; 2, 68-69; 3, 46-47].

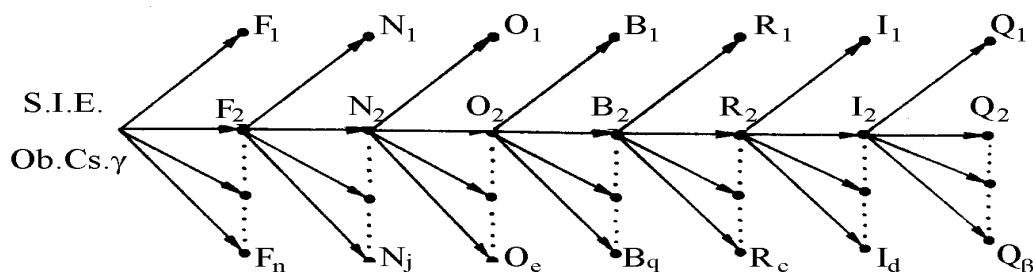


Figura 2. Schema concepută a organizării funcțional-spațiale (dimensionale) a informațiilor informative economice

Din schemă e evident că în varianta abordării funcțional-spațiale (dimensionale) informațiile informative economice mai întâi sunt ramificate (organizate) pe funcții gestionale (F.C.), în interiorul fiecărei funcții – pe nivele de conducere (N), în cadrul fiecărui așa nivel – pe organele de conducere (O), în fiecare organ – pe posturi funcționale (B), în cadrul fiecărui post funcțional – pe probleme funcționale (R) soluționate de acest post, în interiorul fiecărei probleme – pe indicatori implicați în soluționarea ei (I), iar fiecare indicator – pe obiecte (proces) la care se referă indicatorul (Q).

Descrierea analitică consecutivă a acestei variante de distribuire a informațiilor informative economice se prezintă în următorul mod:

$$(S.I.E.O_b.Cs.a) \equiv [F_i]; i=1,2,3,\dots,n; \quad (2.5.)$$

$$(F.C_i) \equiv [N_j]; j=1,2,3,\dots,k; \quad (2.6.)$$

$$(N_j) \equiv [O_p]; p=1,2,3,\dots,l; \quad (2.7.)$$

$$(O_p) \equiv [B_r]; r=1,2,3,\dots,q; \quad (2.8.)$$

$$(B_r) \equiv [R_c]; c=1,2,3,\dots,m; \quad (2.9.)$$

$$(R_c) \equiv [I_d]; d=1,2,3,\dots,\alpha; \quad (2.10.)$$

$$(I_d) \equiv [Q_t]; t=1,2,3,\dots,\beta. \quad (2.11.)$$

Dacă în cadrul distribuirii funcțional – spațiale de bază este principiul spațial, atunci schema distribuirii informațiilor în cauză este alta și se prezintă sub formă de următoarea succesiune:

$$S.I\grave{t}.E.O_b.C_{s,\gamma} \rightarrow N_j \rightarrow F_i \rightarrow O_p \rightarrow B_r \rightarrow R_c \rightarrow I_d \rightarrow Q_t \quad (2.12.)$$

Abordarea pur spațială preconizează distribuția informațiilor informative economice pe nivele și organe de conducere, posturi funcționale și obiecte conduse:

$$S.I\grave{t}.E.O_b.C_{s,\alpha} \rightarrow N_j \rightarrow O_p \rightarrow B_r \rightarrow Q_t \quad (2.13.)$$

Așa cum obiectele de una și aceeași categorie (secție, sectoare) se includ în unul și același nivel de gestiune, schema distribuirii informațiilor informative este următoarea:

$$S.I\grave{t}.E.O_b.C_{s,\gamma} \rightarrow N_j \rightarrow Q_t \rightarrow O_p \rightarrow B_r \rightarrow S_u; \quad (2.14.)$$

unde: S_u – subdiviziunea u a obiectului condus B_r ; $u=1,2,3,\dots,v$.

În îmbinare (combinare) cu abordarea funcțională varianta spațială se prezintă în următoarea succesiune:

$$S.I\grave{t}.E.O_b.C_{s,\gamma} \rightarrow N_j \rightarrow Q_t \rightarrow O_p \rightarrow F_i \rightarrow U.C_b.O_p; \quad (2.15.)$$

unde: $U.C_b.O_p$ – unitatea constitutivă b a obiectului condus p .

A treia modalitate de abordare a organizării informațiilor în cauză este de ordin temporal, deoarece ele se ramifică pe momente temporale gestionale ce sunt considerate drept momente verificative (de control) (M_v) [1,83-86; 2,70-74; 3,47-48]. Astfel de modalitate de abordare este de categorie universală și de aceea se referă la orice domeniu și funcție managerială. În așa situație este posibilă formarea și ramificarea informațiilor în două variante. În prima din ele informațiile pot fi organizate și colectate în raza fiecărui moment verificativ (M_v), în interiorul fiecărui M_v – în cadrul fiecărui nivel de gestiune (N_j) și în interiorul fiecărui N_j – pe fiecare funcție gestională (F_i), etc.:

$$S.I\grave{t}.E.O_b.C_{s,\gamma} \rightarrow M_{vf} \rightarrow N_j \rightarrow F_i \rightarrow O_p \rightarrow B_r \rightarrow R_c \rightarrow I_d \rightarrow Q_t; \quad (2.16.)$$

unde: M_{vf} – moment verificativ (de control) $f: f=1,2,3,\dots,y$

În varianta secundă schema succesiunii colectării și distribuirii informațiilor este următoarea:

$$S.I\grave{t}.E.O_b.C_{s,\gamma} \rightarrow M_{vf} \rightarrow N_j \rightarrow O_p \rightarrow F_i \rightarrow B_r \rightarrow R_c \rightarrow I_d \rightarrow Q_t \quad (2.17.)$$

Schema grafică de distribuire a informațiilor economice în varianta elucidată este prezentată în fig.3.

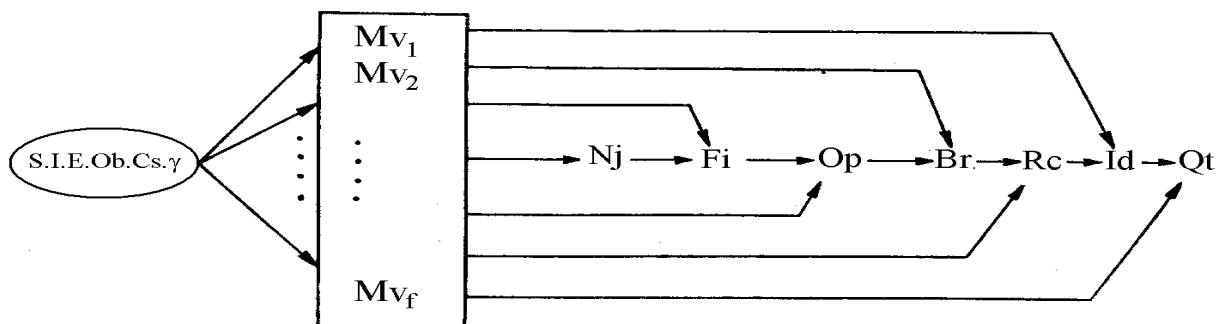


Figura 3. Schema conceptuală de distribuire a informațiilor informative economice în baza modalității temporale de abordare a realizării lor, (momentelor verificative - M_{vf})

Din schema dată e evident că în aspect temporal distribuirea informațiilor pătrunde toate razele spațiale și funcțiile conducerii economice.

Intersectarea fluxurilor informaționale are loc din motive funcționale și de prelucrare, deoarece ambele variante solicită utilizarea în comun a mai multor categorii de informații.

Orientarea fluxurilor nominalizate se efectuează divers, dar tot spațial și temporal. Așa, de exemplu, cele de normare și de previziune se formează la nivelele superioare, conținând unități informaționale cu cele mai generale valori și sunt orientate spre nivelele inferioare, treptat concretizându-se (diminuându-se) valorile acestor unități pentru fiecare nivel și obiect. De aceea ele sunt orientate de la nivelele superioare spre cele inferioare, descriptiv cuprinzând tot mai multe și mai variate obiecte și procese materiale și spirituale.

Privind fluxurile informaționale de evidență, statistică ș.a., ele sunt canalizate în direcție opusă, formând la nivelul inițial cele mai elementare unități (date primare), iar ascendând de la un nivel superior de gestiune la altul, aceste unități informaționale își schimbă componența, forma de exprimare și își generalizează (majorează) valorile.

Determinarea aspectelor procesului de conducere economică, succesiunii interacțiunii lor, locului și rolului aspectului informațional al acestui proces, precum și a modalităților de distribuire, intersectare și orientare în timp și spațiu a fluxurilor informaționale informative contribuie la conștientizarea și organizarea cât mai rațională și adecvată a acestor fluxuri. La rândul său, aceasta conduce la majorarea eficienței gestiunii, ceea ce în consecință condiționează prosperarea sub-sistemului material economic.

3. Particularitățile organizării funcționale a informațiilor informative în economia de piață

Tezele expuse până acum sunt de ordin general și de atâta caracteristice pentru orice sistem economic, în același număr și cel de piață, însă în mediul celui din urmă pot fi remarcate anumite particularități, printre care esențiale sunt următoarele [1, 66-81; 2, 97-103; 3, 177-179, 200-204].

Prima și cea mai importantă din ele constă în aceea, că dacă până nu demult primatul valoric aparținea laturii materiale a procesului de gestiune unitar, apoi în prezent tot mai pronunțat se majorează valoarea funcțională a compartimentului lui informațional. Așa situație se explică prin faptul că anterior activitățile materiale condiționau și influențau nemijlocit procesele informaționale, determinându-le componența și conținutul, precum și rolul lor auxiliar și subordonat în sistemul de conducere. Acum, însă, tot mai evidentă devine situația inversă, când informația se transformă în mijloc de influențare și modificare directă a proceselor materiale. De aceea tot mai pronunțat se observă faptul că eficiența și calitatea activităților materiale sunt condiționate de calitatea resurselor informaționale, aceasta explicându-se prin următoarele.

În economia centralizată informația economică îndeplinea cu preponderență funcția descriptivă (reflectorie), pe când în economia de piață ea devine un remediu de reglare și realizare nemijlocită și activă a proceselor materiale.

Anterior și deocamdată până în prezent informația economică nu se consideră drept componentă organică a activităților materiale, iar obiectul economic nu era și nu este interpretat la concret drept nucleu unitar material - informațional.

O altă particularitate constă în aceea, că trecerea de la metodele administrative de gestiune la cele economice creează condiții de extindere majoră a activităților materiale ale obiectului gestionat. Concomitent, și necesitățile informaționale ale lui practic devin de caracter nelimitat.

Condițiile noi ale relațiilor de piață, de asemenea, impun coordonarea, interconectarea și interacțiunea activităților informative nu numai cu cele materiale, dar și cu informațiile decizionale, cu luarea în considerare a îmbinării lor organice. Numai în așa caz poate fi vorba despre un sistem informațional logic bine gândit, rațional constituit și funcțional eficient pentru sistemul unitar de gestiune.

Așa cum activitatea materială economică este de caracter sistemic, și „aura” ei informațională trebuie să fie tratată de pe aceleași poziții.

Evoluția în timp și în spațiu a sistemului economic material obiectiv condiționează organizarea, transformarea și utilizarea resurselor informaționale în mod distribuit.

Mediul relațiilor de piață tot mai insistent provoacă dinamizarea conținutului funcțional și componenței resurselor în cauză, ele devenind compozițional tot mai complicate și maxim operative.

Necesitatea funcționării reale a obiectului interpretat ca nucleu material – informațional unitar solicită apropierea și integrarea cât mai stringentă a activităților informaționale cu cele materiale.

Trecerea de la modalitatea separată de efectuare a proceselor materiale economice la cea interconectată a influențat și evoluția organizării resurselor informaționale – de la fișiere separate – la baze de date – formă integrată de realizare a organizării lor.

Nivelul existent de aplicare a metodelor și mijloacelor informatice în domeniul nominalizat impune abordarea organizării, structurării și transformării informațiilor economice prin integrarea aspectelor funcțional și informatic ale acestor procese.

Conștientizarea aspectelor de abordare generală și a celor proprii relațiilor economiei de piață a resurselor informaționale, precum și conducerea permanentă de ele contribuie la performanțe majore a sistemului material economic.

Printre unii novici și o parte din lucrătorii funcționali ce profesează activități de economiști în sensul cel mai extins al conținutului acestui domeniu și azi încă mai bănuiește opinia că informatizarea este o noțiune proaspăt inventată, iar efectuarea ei este considerată drept tribut modei. Realitatea, însă, mărturisește contrariul, deoarece procesele informaționale l-au preocupat pe om odată cu devenirea lui ființă conștientă și socială.

Ce l-a impus pe subiect ca orice activitate a lui simultan permanent să dispună de însoțire informațională? Evident, necesitatea obiectivă de a depune eforturi și a consuma resurse pentru a obține produse materiale și spirituale – baza existenței și avansării sale pe treptele evoluției ca gen. Altfel fiind spus, conștient ori inconștient, subiectul a simțit necesitatea în informații de atunci, de când a început să muncească, deci, de când a devenit propriu zis om. La rândul său, munca este condiționată de faptul că raportul dintre forțele individului și naturii este incomparabil și din acest motiv primul (individul) este nevoit prin informații și calcul să-și măsoare orice pas.

Așadar, îmbinarea organică a proceselor materiale cu cele informaționale sub formă de nucleu unitar constituie imperativul permanent al oricăror timpuri și evenimente, în care este implicat omul. Altceva, că la începuturi procesele informaționale erau limitate în spațiu și timp, deoarece și cele materiale, de asemenea, erau marginalizate de posibilitățile individuale și particularitățile societății.

Prin aceasta și se explică faptul că inițial informația era „dobândită”, prelucrată, memorizată și utilizată de un individ, ori de un grup de indivizi, de regulă, în mod oral și operativ.

Pe măsura extinderii razei manifestării materiale umane tot mai pronunțat devine caracterul social al informațiilor respective, iar informatizarea se efectuează tot mai conștient. În plan de studiu și de realizare la un moment dat s-a produs „erupția” proceselor informaționale de la cele materiale prin separarea celor din urmă din cauza necesității preocupării speciale de ele, așa cum se solicită resurse esențiale pentru efectuarea lor. În așa mod, dacă la începutul activităților economice materiale umane realmente fluxurile informaționale se formau și se realizau acolo, unde se efectuau și cele materiale, apoi treptat, în mod evolutiv, spațial și temporal unele s-au desprins de altele din motive de majorare a volumelor, complexității componentei și creșterii operativității lor.

Actualmente tot mai frecvente și intense sunt preocupările de stabilire și de constituire a celor mai eficiente conexiuni dintre aceste două categorii de fluxuri (materiale și informaționale) cu scopul de a le uni într-un singur nucleu material – informațional, fiind esențial dispersate structural și componistic în spațiu și timp comparativ cu perioadele precedente. Din acest punct de vedere convențional se poate constata că în prezent ne găsim la etapa intermediară de tranziție de la obiectul economic inițial unitar material – informațional (unitatea fiind condiționată de nivelul și caracterul activităților materiale) spre revenirea la această unitate organică dintre materie și informație, însă la nivel mult mai superior, deoarece ambele componente (materia și informația) ale procesului de conducere sunt distanțate și separate spațial și temporal. Schematic și simplist această teză evoluționistă este prezentată în fig. 4 [2, 71-77]

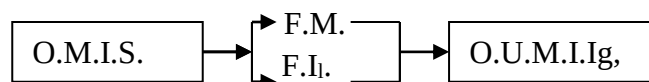


Figura 4. Evoluția fluxurilor materiale și informaționale în cadrul obiectului unitar material – informațional: O.M.I.S.- obiect cu resursele materiale și informaționale separate; O.U.M.I.Ig. – obiect unitar material-informațional integrat; F.M - fluxuri materiale; F.I. – fluxuri informaționale

Majorarea exagerată a volumului și complicarea pronunțată a componentei informațiilor economice, precum și dispunerea de mijloace și tehnologii informatice, ultimele fiind consecința celor dintâi, contribuie la informatizarea adecvată a societății umane.

În așa circumstanțe de importanță primordială este organizarea informatizării pe baze științifice, mai întâi de toate, grație perfecționării factorului uman prin instruire deplină și calitativă a utilizatorilor de orice categorie. Cu acest prilej e binevenită și memorativă următoarea afirmare a părintelui ciberneticii Norbert Veener: „Calculatorul este pe atât de valoros, pe cât de valoros este omul, care îl utilizează” [4, p. 52].

De asemenea, informatizarea ar fi promovată în mod științific, dacă ar fi inversat conceptul de inventare și aplicare a mijloacelor tehnice de efectuare a ei. Până în prezent, mai întâi se inventează mijloacele de această clasă și numai ulterior se studiază concret domeniul de intervenție a lor. În opinia noastră, mult mai eficient ar fi acel concept, conform căruia în baza determinării parametrilor cantitativi și calitativi ai domeniului de aplicare ar fi construite și utilizate mijloacele tehnice respective. Deci, procesele de informatizare trebuie să fie inițiate și orientate nu de la mijloace și metode spre domeniu, dar invers: de la domeniu – spre metode și mijloace.

Afară de aceasta, producția și implementarea masivă a mijloacelor tehnice de calcul permanent dotate cu performanțe continue excesive, deja au contribuit la aceea, că în mod

individual pot fi utilizate metode și remedii informatice de capacități inimaginabile comparativ cu capacitățile subiectului. Însă, valorificarea acestor capacități are loc în tempou foarte încetinit, la nivel preponderent inferior și practic stopat de incoerența realizării și potențialului lor. Printre primele cauze ale situației create este lipsa de cunoștințe și de utilizatori de calificare superioară în activitățile informatice economice.

Accesul fizic nemijlocit al specialistului - economist la calculator a contribuit nu numai la facilități evidente, dar și la complicații de natură cu totul deosebită. Dacă în anturajul mașinilor electronice de calcul universale mari (M.E.C.) de generațiile I-III exista o gamă destul de variată de categorii de utilizatori – specialiști în anumite domenii de elaborare și exploatare a sistemelor informatice (de exemplu, specialiști în resurse informaționale, matematice, programate, tehnologice ș.a.), apoi mediul calculatoarelor electronice personale (C.E.P.) impune îmbinarea acestor activități de o singură persoană. Așa situație s-a creat grație posibilității accesului direct la calculator a individului, dispunerii de sisteme de programare tot mai „prietenoase”, dar și de aceea că îmbinarea în mod fericit a elaborării, implementării și funcționării cotidiene a resurselor și proceselor informatice de un singur utilizator contribuie la atingerea celor mai remarcabile performanțe. De pe aceste poziții devine evidentă necesitatea stringentă ca orice utilizator de orice profil să fie capabil de a efectua aceste activități (elaborare, implementare, funcționare) pe orice compartiment al informaticii economice (resurse informaționale, matematice, programate, tehnologice, organizatorico-economice ș.a.).

O modalitate esențială de abordare a activităților informaționale economice este condiționată și de particularitatea fundamentală a obiectelor și proceselor economice – funcționarea și realizarea lor în spațiu și timp. Această circumstanță obiectiv solicită coordonarea activităților în raza acestor parametri prin intermediul asigurării anumitor conexii informaționale eficiente între ele. Deoarece informațiile indisolubil însoțesc procesele materiale economice, de asemenea, e necesar ca ele să fie organizate, prelucrate și utilizate în mod distribuit, prin aceasta contribuind la apropierea și integrarea cât mai organică a activităților informaționale și materiale sub formă de nucleu material – informațional unitar.

În acest sens de importanță majoră este tratarea de pe poziții sistemice atât a elaborării, cât și a implementării și funcționării diverselor forme de deservire informațională a activităților materiale economice. Așa abordare este motivată de caracterul sistemic al organizării și funcționării unităților materiale economice ce permanent solicită anumite resurse informaționale.

Teza formulată poate fi pusă la baza studiului și elaborării serviciilor informatice atât în plan teoretic, cât și practic. Neglijarea ei a condus și va conduce la ineficiența și chiar discreditația valorii decisive a informațiilor în organizarea și realizarea activităților materiale economice, mai cu seamă, în mediul relațiilor de piață.

Pornind de la situația existentă și perspectiva apropiată, o orientare magistrală în domeniul informatizării ar fi elaborarea, implementarea și funcționarea unităților tehnice de realizare informatică a problemelor informative economice sub formă de rețele de calcul, de altfel, în ultimul timp considerate drept informatice, ceea ce este mai coerent conținutului funcțiilor realizate de ele. Deci, evoluția informatizării în mod obiectiv impune necesitatea stringentă de tranziție treptată de la formele organizatorice de realizare a activităților informatice la cele tehnice, contribuind la organizarea și prelucrarea distribuită automată a informațiilor, ceea ce corespunde scopului ideal de asigurare informațională a obiectelor economice și sunt cele mai adecvate pentru ele.

În procesul de studiu, organizare și realizare a activităților informaționale e necesar, de asemenea, de ținut cont și de acea circumstanță, că atât sistemul material economic, cât și cel informatic sunt extrem de dinamice, permanent variind după componentă și conținut.

În final pot fi formulate următoarele concept, principii și teze de bază privind abordarea activităților informaționale în mediul social – economic modern al pieții.

Mediul nominalizat este prezentat de diverse obiecte și procese efectuate de ele cu scopul de a obține anumite bunuri materiale și spirituale.

Deoarece activitatea obiectelor economice este de neconceput fără coordonarea funcționării lor în spațiu și timp, devine evident faptul, că aceste obiecte sunt de caracter sistemic, așa cum teritorial ele constituie o noțiune „geografică” și există în primul rând grație realizării permanente a conexiunilor materiale cu alte obiecte de aceeași categorie. Din acest motiv la etapa actuală mediul în cauză nu poate fi de altă natură, decât socială.

Concluzii

Se știe că orice acțiune de orice caracter (social, particular) obligatoriu dispune de însoțire informațională adecvată. În așa caz activitățile informaționale economice respectiv se organizează și sunt realizate în mod sistemic.

Această abordare este fundamentală, din ea decurg principiile și tezele de interpretare a activităților informaționale în mediul social – economic, printre ele fiind următoarele [2, 78-79]:

- 1) apariția (formarea) și evoluția informațiilor sunt obiectiv condiționate de unitățile materiale și evenimentele social - economice;
- 2) organizarea obligatorie indisolubil integrată a obiectelor și proceselor lui materiale;
- 3) interpretarea spațială și temporală;
- 4) dinamica continue, pronunțat compozițională și de conținut;
- 5) apropierea și integrarea cât mai nemijlocită și concretă a activităților informaționale de cele materiale cu scopul evidențierii și realizării lor sub formă de nucleu material – informațional unitar;
- 6) adecvarea formelor organizatorice informaționale în coraport cu modalitățile și caracterul efectuării activităților materiale economice. Trecerea de la organizarea separată a proceselor materiale economice la cea interconectată a contribuit la evoluția respectivă a resurselor informaționale (R.I.): de la fișiere separate – la baze de date (Bz.D.).
- 7) abordarea organizării, structurării și transformării informațiilor informative economice în aspectele funcțional și informatic;
- 8) organizarea, prelucrarea și utilizarea distribuită a resurselor informaționale economice;
- 9) dispersarea resurselor și activităților informaționale la nivelele inferioare și integrarea lor la nivelele superioare. În ansamblu, în mod normal se solicită îmbinarea fericită a lor;
- 10) realizarea relativ deplină a acestor îmbinări este condiționată de sistemul informatic, cadrul căruia antrenează în interconexiune și interacțiune toate etapele transformative ale informațiilor economice - inițială (primară), de prelucrare informațională, structurală, de calcul și de utilizare (analiză);
- 11) posibilitatea abordării sistemice a activităților elucidate în baza integrării proceselor de organizare, structurare, păstrare și utilizare a valorilor unităților informaționale economice;

- 12) coordonarea, interconectarea și interacțiunea activităților informative nu numai cu cele materiale, dar și cu cele gestionale, având în vedere îmbinarea lor organică;
- 13) creșterea continuă a valorii funcționale a proceselor informaționale, influența lor asupra celor materiale devenind tot mai pronunțată și decisivă. Această situație își găsește explicația în faptul, că anterior procesele materiale condiționau și influențau direct procesele informaționale, determinându-le componența și conținutul lor, precum și rolul auxiliar (descriptiv) și subordonat în sistemul de gestiune. Acum tot mai conturat se observă interacțiunea inversă, când informația devine remediu de influențare și modificare a proceselor materiale.

Cunoașterea profundă a esenței și conținutului principiilor și tezelor de bază privind abordarea funcțională a organizării și efectuării activităților informaționale în mediul material economic, precum și conducerea permanentă de ele contribuie la obținerea performanțelor majore atât a sistemului de gestiune respectiv, cât și a obiectului gestionat, ceea ce în consecință conduce la prosperarea economică și spirituală a societății umane în ansamblu și a fiecărei componente a ei.

Referințe

1. LEAHU, T. Sisteme informaționale conceptuale de management economic integrat. Monografie. Chișinău, ULIM, 2021 (CEP USM). 297 p., p. 81-86.
2. LEAHU, T. Organizarea, structurarea și transformarea informațiilor sistemului managerial economic. Monografie. Chișinău, C.E.P. USM, 2009, 431 p.245, p. 63-79.
3. ЛЯХУ, Ф.С. Экономическая информация: организация, структура и преобразование. Кишинёв: Контабилсервис, 1996. 219с, с. 44-48.
4. НОРБЕРТ ВИНЕР. Кибенрнетика. М., Физматгиз, 1969.

CRITICAL INFRASTRUCTURE SUSTAINABILITY IN THE CONTEXT OF THE WELL-BEING OF THE COUNTRY'S POPULATION

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Abstract

The article analyses and summarizes theoretical approaches to the concepts of “sustainability,” “resilience,” “system sustainability,” “critical infrastructure sustainability,” and “population well-being.” Using content analysis and a systems approach, existing definitions of the term “system sustainability” are conditionally systematized according to classification characteristics. A bibliometric and trend analysis of scientific publications was conducted to identify the relationships between the concepts of “critical infrastructure sustainability,” “population well-being,” and “quality of life of the population.” The paper proposes an original approach to defining the term “critical infrastructure sustainability” in the context of the well-being of the country's population.

Keywords: sustainability, resilience, population well-being, quality of life of the population, critical infrastructure

JEL: Q01, Q56, I31, I38, R42, L98

Introduction

Critical infrastructure as a set of processes, networks, objects is of great importance for the development of the national economy and the well-being of the country's population. It should be noted that critical infrastructure as an economic system operates in conditions of instability, uncertainty and threats, that is, under the influence of many external factors that cannot be foreseen and predicted in advance. They are disturbances in this system and cause its deviation from the state of equilibrium. In this regard, an important property of critical infrastructure as a system is its ability to return to a state of equilibrium as a result of the action of these disturbances, that is, the stability of strategic infrastructure objects.

Therefore, in the modern globalized world, the problem of ensuring the stability of critical infrastructure to threats of various natures is becoming increasingly relevant, especially when these threats are transformed and acquire new hybrid forms, and also negatively affect various spheres of life. One of such spheres is recognized as social, the key element of which is ensuring the well-being of the population. In this regard, ensuring resilience is a necessary and important basis and prerequisite for the effective development of critical infrastructure.

Analysis of recent publications and research

As the analysis shows, determining the relationship between the development of critical infrastructure, sustainability, resilience, stability, and ensuring the well-being of the population is among the leading foreign scientists (C. Axon & S. Roberts [1]; A. Azami & M. Razavian [2]; C.-W. Chen [3]; M. Das [4]; G. Helgadóttir et al. [5]; N. Santero et al. [6]; F. Santos et al. [7]; Z. Turskis et al. [8]; F. Zhang & H.Qian [9]).

According to scientists Z. Turskis et al. [8], critical information infrastructure exists in different sectors of each country. Its loss or disruption of sustainability will lead to a negative impact on the provision of vital services, as well as on the social or economic well-being of the population. It may also even pose a threat to human health and life. Therefore, it is advisable to address the problem of ensuring sustainable development of EU countries from the point of view of identifying critical information infrastructures. For this purpose, a model of identifying critical

information infrastructures taking into account the sustainable development of countries is proposed.

Researchers A. Azami & M. Razavian [2] pay attention to studying the role of factors that are usually associated with achieving sustainable development in urban areas, including quality of life, productivity, infrastructure, justice and environmental sustainability.

The issues of the well-being of the population of the world, the level and quality of life of the population are considered by many researchers, including: K. Cooper, M. Fabian & C. Krekel [10]; M. Kruzslicika [11]; J. Thoma [12]; W. Tov [13]; S. Waddock [14] and others.

Despite the wide range of scientific research on the chosen topic, the multifaceted nature and debatability of individual issues require further scientific development.

Research purpose

The purpose of this article is to study the relationship between the concepts of “critical infrastructure sustainability”, “population well-being” and “population’s quality of life” using bibliometric and trend approaches, as well as to clarify the essence of the term “critical infrastructure sustainability” in the context of ensuring the well-being of the country’s population.

Research methodology

The theoretical and methodological basis of the study is the provisions of the theories of systems, globalization, infrastructure; concepts of strategic management, sustainable development, resilience.

The following general scientific methods were used in the research process: dialectical, historical, formal-logical, axiomatic, hypothetical-deductive, analysis and synthesis, induction and deduction, bibliometric analysis, trend analysis, comparative analysis, analogy, classification, structural-logical generalization.

Based on the results of the analysis of coincidences and closeness of the relationship of 66 keywords of the selected sample of 239 publications, a network visualization map was constructed (*Figure 1*), on the basis of which 5 clusters on the topic under study were identified and characterized.

The first cluster (red colour) contains the largest number of terms (namely 19 items), among which the following can be mentioned: ecosystem service, environmental sustainability, green space, green infrastructure, infrastructure, urban policy, urban growth, urbanization. It is worth noting the keyword “Urban development”, the frequency of its co-use in the studied sample is 15, and the strength of the connection is 96.

The second cluster (16 concepts, green) combines such terms as critical infrastructure, climate change, economic development, economic and social effects, resilience, sustainable infrastructure, environmental impact, urban transportation, sustainable cities. In this cluster, the keyword “Sustainable development” has the highest frequency – the ratio is 58, while the strength of the association is 393.

The third cluster (13 elements, blue colour) describes the relationship between the development of critical infrastructure and the well-being of the population with the following terms: sustainable development goals, energy utilization, information management, investments, life cycle.

The main key term in this cluster is “Energy efficiency”, the frequency of its co-use in the studied sample of scientific publications is 12, and the strength of the association is 56.

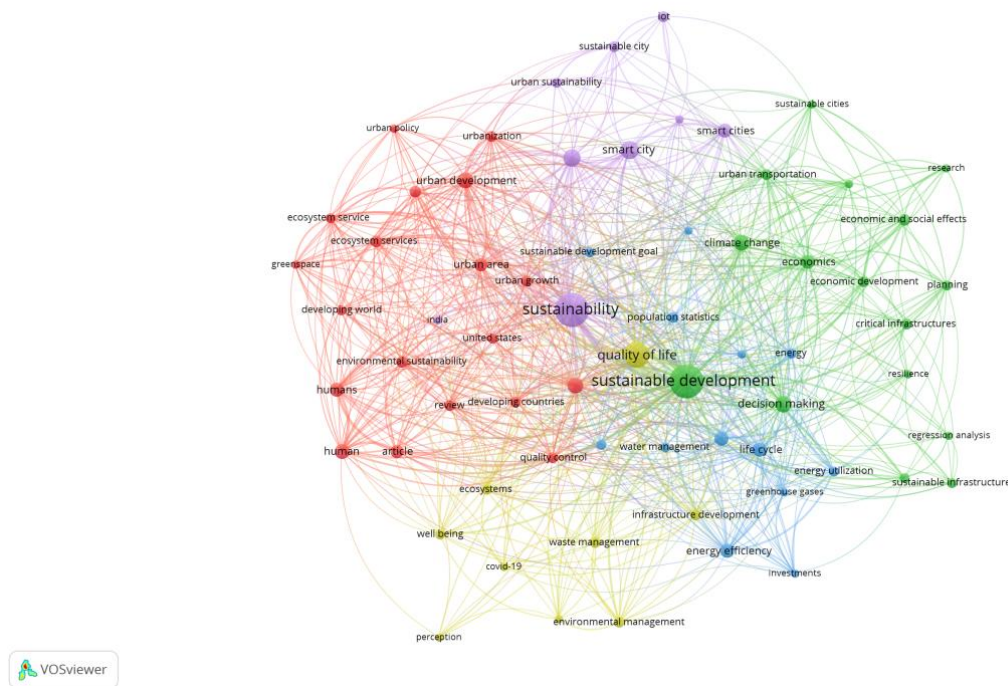


Figure 1. Map visualization of bibliometric analysis of publications devoted to issues of the relationship between the critical infrastructure sustainability and the well-being of the population

Source: built on the basis of data from the Scopus scientometrics database using the VOSviewer program

The fourth cluster (9 elements, yellow colour) is associated with the following categories: ecosystems, environmental management, infrastructure development, waste management, well-being. The keyword “Quality of life” has the highest frequency of co-use – 41, while the strength of association – 202.

The fifth cluster (9 elements, purple colour) covers the following categories: smart city, sustainable city, urban planning, urban sustainability. The frequency of co-use of the main keyword “Sustainability” in this cluster is 72, and the strength of association – 246.

Thus, based on the constructed terminological map of categories and the highlighted most significant keywords related to the issues of critical infrastructure development in the context of ensuring the well-being of the population, it can be stated about the multidimensionality and cross-dependence of the studied areas, since there are numerous connections between the terms, as well as their high prevalence in research.

In order to determine the temporal patterns of the development of the views of scientists who study the relationship between the sustainability of critical infrastructure and the well-being of the population in countries around the world, the trend analysis tool – Google Trends is used. Based on trend analysis over the past 5 years (2021-2025), a high level of interest in the topic “Quality of life” was found worldwide (average score 67) (*Figure 2*). However, the popularity level of topics related to the concepts “Critical infrastructure sustainability” and “Population well-being” was 0 points. That is, no user search queries were found in countries around the world for these keywords.

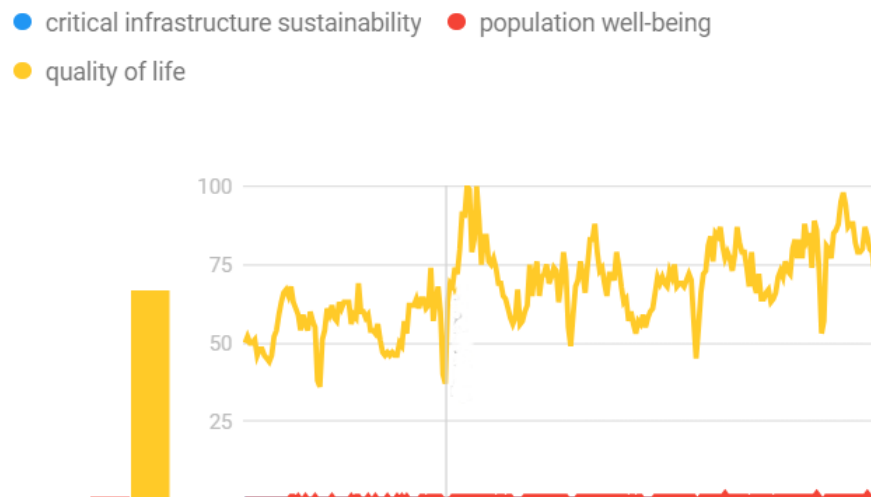


Figure 2. Dynamics of search frequency changes in the context of the definitions “Critical infrastructure sustainability” (blue colour), “Population well-being” (red colour), “Quality of life” (yellow colour) in the world

Source: constructed using Google Trends tools

If we consider Moldova and Ukraine, then in these countries the most common user search query can be attributed only to “Quality of life”. Therefore, the topics related to the problems of ensuring the stability of critical infrastructure and the well-being of the population remain insufficiently resolved and require thorough research.

Research results

Recently, a lot of scientific literature has appeared on the problems of developing critical infrastructure. In scientific sources, this concept is mostly defined as: a complex system; its key components or elements; critically important infrastructure objects; network structure; physical structure; organizational structures; institutions; institutions; a set of assets; an object of administrative and legal protection; an object of cyber protection; a security direction; a component of national infrastructure; a set of objects, technologies, state and scientific structures; an object of public administration; a component of information security; an element of the system for ensuring the national security of a state or region, etc.

In [15], the term “critical infrastructure” refers to a set of facilities, systems, and networks that are priority and strategically important for the development of a competitive national economy and ensuring an adequate level of national security, the neutralization or disruption of which may harm the national interests of the state, lead to the emergence of possible threats and risks, significant damage and losses (economic, transport, logistics, environmental, financial, investment, information, etc.).

The development of critical infrastructure can be understood as the process of transformational changes in priority and strategically important facilities, systems, and networks for the economy by transferring key infrastructure components to a qualitatively new level of functioning due to adaptation to the variability and instability of the exogenous environment, taking into account the impact of possible threats, risks, and modern challenges [16].

It is worth noting that the development of critical infrastructure affects the quality of life of the population and its well-being. Thus, a critical infrastructure facility is an engineering structure, a public service, and an information system in the critical infrastructure sector, the disruption or destruction of which has negative consequences for the performance of the economic and social functions of the state, and therefore for the quality of life of residents in terms of protecting their lives, health, safety, property, and the environment.

For the most part, scientists understand the welfare of the population as an indicator of the effectiveness of state policy, which reflects the level of people's provision with material and spiritual benefits, as well as the quality of their lives [17-20].

The welfare of the population is the main indicator of assessing the effectiveness of the implementation of the state's socio-economic policy [21]. The growth of the population's social welfare depends on meeting the needs of people, the level of which is rapidly growing and qualitatively changing. It is the totality of material, social, and spiritual conditions that reflects the level and quality of life of the population. The process of meeting the needs of society with material and spiritual benefits is the ultimate goal of the functioning of any economic system [21].

At the current stage of social development, well-being is interpreted as a complex category that includes not only material, but also social, psychological, legal, political and other components both at the individual level and at the level of the entire society [22].

According to O. Chechel [23], the welfare of the population as a basic category of the state's economic policy is a multifaceted phenomenon. The level of the population's welfare is a factor that restrains or promotes human development.

Summarizing various approaches to determining the criteria for assessing the welfare of the population, we note that, in our opinion, the main components of the welfare of the population are “quality of life” (standard and conditions of life) and “way of life” (labour activity, demographic and migration activity), through which it is advisable to develop a system of criteria for assessing the welfare of the population. According to O. Chechel [23], the quality of life is a set of conditions of human existence that ensure the acquisition of necessary life benefits, material wealth and spiritual values.

T. Pavlyuk et al. [24] formulate the welfare of the population as the basis for the development of the state, and the quality of life is considered as a complex characteristic of a person in different social conditions, which reflects the degree of his freedom, the possibility of comprehensive development and implementation of abilities and life plans. This is the totality and quality of material, social, cultural and spiritual values provided by society to a person to satisfy his needs and realize his interests. That is, this category demonstrates the extent to which a person satisfies his needs in current social conditions and achieving a high quality of life is the goal of social policy and evidence of the social well-being of society [24].

As H. Sytnyk and Y. Taran [25] argue, the well-being of the population and food security directly depend on the competitiveness of the state. Therefore, in order to realize opportunities and minimize threats in Ukraine, it is necessary to develop a strategy that should be based on the principles of a guaranteed minimum level of well-being, ensuring equal opportunities, improving the quality of life, strengthening social cohesion, strengthening social security, social responsibility and social integration [25].

In addition, it is worth emphasizing that the development of critical infrastructure is closely related to the categories of “sustainability” and “resilience”. The concept of “sustainability” is multifaceted and is used in different areas, having different meanings.

Based on the analysis of various research approaches to the content of the interdisciplinary concept of resilience, it can be concluded that it is built around the ability of complex systems to respond to negative influences in a way that allows them not to lose their functionality and ability to develop [26].

At the same time, the following characteristics are of fundamental importance for understanding resilience and further conceptualization: the field of research; the object in relation to which resilience is considered; external factors/influences in relation to which the object must be resilient; the goal of achieving resilience of a certain object; parties interested in the corresponding result; subjects/factors capable of influencing the achievement of such a result. That is, in a generalized form, the concept of “resilience” characterizes the reaction of an object to certain external stimuli, its ability to adapt to their influences without significant loss of functionality [26].

In the European Union, sustainability is defined as the ability of an individual, an individual economy, a society, a country or a region to withstand, adapt and recover quickly from stresses and shocks [27].

As noted by O. Firsova [28], in the classical theory of system sustainability (stability), three main forms are distinguished: 1) inertia (resistance) – the ability of a system to maintain its state unchanged for a certain period of time under external influences; 2) elasticity (recoverability) – the ability of the system to return to its original state after the cessation of external influences; 3) plasticity (flexibility) – the presence of several normal or permissible states in the system and its ability to transition from one state to another under the influence of adverse factors, while maintaining the necessary invariant – the mode of functioning, development trajectory, structural connections, etc.

O. Bazhenova [29] states that sustainability is the ability of a system to move from different initial states to some equilibrium (stationary) state.

From the point of view of I. Vysotskaya [30], sustainability is the ability of an object to function normally and resist various inevitable disturbances. The researcher conventionally systematized the interpretation of stability into 3 groups: system state; system property; system behaviour characteristic. In her opinion, the stability of an economic system is not just a property or state of the system, but a property that manifests itself in the state of the system, which depends on its relations with the external environment. The development of an economic system is possible provided that dynamic stability is ensured. The dynamic stability of an economic system is manifested in the reaction of the system and its elements to the action of external and internal factors, which leads to the restoration of the system [30].

In the scientific literature, there is such a concept as economic stability. This is a complex concept associated with the ability to maintain integrity and balance in conditions of negative and positive influences of various internal and external factors due to the effective use of enterprise resources [31].

From the position of S. Tkachenko [32], economic stability can be considered as the ability of a system to maintain its operational state in order to achieve planned results in the presence of various disturbance influences. Disturbances can cause temporary deviations of the coordinates of

the state of the system within predetermined tolerances, but with the cessation of influences, a stable system must return to its original position.

So, it turns out that stability is a dynamic concept, that is, it involves the development of an economic system. Therefore, sustainability is closely related to the concept of “system” and is one of its main properties.

As scientists V. Vasylenko et al. [33] argue, there is a close connection between such concepts as functional stability and reliability, survivability and fault tolerance. At the same time, we must understand the fundamental difference between these concepts: the main components of functional stability are aimed not at reducing the number of failures and violations, but at ensuring the performance of particularly important functions in which these violations have already occurred.

The main feature of functionally stable systems is their ability to degrade at the structural level to complete system failure, i.e. to remove failed elements from the structure, rebuild the structure, adjust the system parameters for adaptation to new operating conditions [33]. Thus, based on the generalization of existing scientific approaches to the definition of the concept of “stability”, it was established that, as a rule, this category is understood as the ability of an object (system), a universal property, function, state of equilibrium, capabilities, inertia, recoverability, system capability, and a characteristic of system behaviour. At the same time, some authors identify stability with stability.

It should be noted that in recent years, the concept of “resilience” has been introduced into scientific circulation in economic literature, which is closer in essence and meaning of sustainability, stability, resistance, flexibility, recovery, etc.

For the most part, scientists understand the concept of “resilience” as the balancing of risk factors and protective factors; the ability to quickly restore resources; a dynamic process; the process of combating shocks and changes; the ability of the system; the ability or capacity of the economy; the fundamental basis; the concept; the paradigm; the strategy, etc.

In the context of civilizational subjectivity, resilience is a strategy that is able to maintain balanced development and successfully withstand external and internal challenges; through the efforts of the political and intellectual elite to anticipate and neutralize these challenges [34].

In [35], two approaches to understanding resilience are identified. According to the first approach, “resilience” is considered as a return to an already existing equilibrium point; according to the second, as a constant adaptation to changing conditions. The criterion of resilience according to the first approach is the rate of return to the initial state (a significant role in this process is played by the “strength” of the shock – the intensity and duration of the impact on the economic system), according to the second approach – the elasticity of the economic system. But both approaches determine that resilience implies the internal ability of the economic system to change (“bend”) and recover after a negative impact (shock) as a result of structural adaptation [35].

Thus, “resilience” is considered as a property of an economic system that has a post-event nature, which allows it to absorb or mitigate losses, reconfigure, restore its state due to internal adaptive properties after the impact of shocks of various natures [35].

Conclusions

Based on the above, the following conclusions can be drawn. In today’s world, critical infrastructure is the backbone of any country’s national economy. Disruption of critical systems and

essential services, such as telecommunications, energy and water supply, transport and financial systems, can lead to significant economic and social losses [36]. These systems are highly vulnerable to a variety of shocks, from climate and geological hazards to industrial accidents, terrorist attacks, cyber threats, armed conflicts and hostilities, which can have cascading negative impacts at the local, national and even global levels.

Therefore, ensuring the resilience of critical infrastructure is of utmost importance. The concept of “system sustainability” should be considered from the perspective of a transformational economy, taking into account the significant impact of exogenous and endogenous factors and the emergence of new challenges of the time. Among them, we can mention such things as the intensification and deepening of the processes of globalization and European integration, transformation, digitalization [37], infrastructure provision and the transition to network forms of interaction and partnership, the use of public investment tools and the green financing mechanism [38-40] for the restoration and modernization of strategically important infrastructure facilities, etc.

Thus, the concept of “critical infrastructure sustainability” is proposed to be interpreted as the ability of infrastructure facilities to maintain their functioning in conditions of shock, to recover and adapt to the impact of threats, risks, challenges and adverse shocks of various nature in order to ensure effective socio-economic development of the economy and an adequate level of well-being of the population.

Currently, in the European Union, the resilience of critical infrastructure is recognized primarily as a national responsibility of each country. As shown by the analysis [36], the resilience of critical infrastructure encompasses the ability to prevent, protect, respond, resist, mitigate, absorb, adapt and recover from crises and emergencies, armed conflicts, military events that may disrupt the provision of essential services. This is particularly important for critical infrastructure, as complete protection is usually not possible.

In this context, ensuring the critical infrastructure sustainability can be based on a combination of several key qualities:

- ✓ reliability (the ability to continue operating or remain resilient. This involves designing structures or systems that are robust enough to withstand foreseeable shocks. It also involves investing in and maintaining critical infrastructure elements so that they can withstand low-probability but high-consequence events);
- ✓ redundancy (the ability to continue operations through replacement or backup systems that can be activated if something important fails or stops working);
- ✓ resourcefulness (the ability to skilfully manage an event as it unfolds. It includes identifying options, prioritizing what needs to be done to control the damage and begin to mitigate it, as well as communicating decisions to the people who will implement them);
- ✓ adaptability (the means to learn new lessons that can be learned from a disaster. It involves reviewing plans, modifying procedures, and implementing new tools and technologies necessary to increase reliability, resourcefulness, and the ability to recover from the next crisis).

Prospects for further research are to generalize foreign practice in identifying infrastructure threats to ensure the resilience of the quality of life of the country's population.

References

1. Axon, C. J., and Roberts, S. H., 2017. Energy for cities: Supply, demand and infrastructure investment. Green Energy and Technology. Springer Verlag, Berlin, Germany, pp. 5-27. https://doi.org/10.1007/978-3-319-54458-8_2.
2. Azami, A. S., and Razavian, M., 2013. Analysis moving towards sustainable development of a city with emphasis on the quality of urban life: The case of Noor. Environment and Urbanization ASIA, 4(1), pp. 31-56. <https://doi.org/10.1177/0975425313477725>.
3. Chen, C.-W., 2023. Can smart cities bring happiness to promote sustainable development? Contexts and clues of subjective well-being and urban livability. Developments in the Built Environment, 13, 100108. <https://doi.org/10.1016/j.dibe.2022.100108>.
4. Das, M., 2024. Green and blue infrastructure in high-density megacities of global south: A critical evaluation of benefits and obstacles for enhancing the well-being of Hong Kong's aging population. Developments in Environmental Science. Elsevier Ltd, Amsterdam, vol. 15, pp. 575-594. <https://doi.org/10.1016/B978-0-443-21948-1.00027-3>.
5. Helgadóttir, G. et al., 2019. Social sustainability of tourism in Iceland: A qualitative inquiry. Scandinavian Journal of Hospitality and Tourism, 19(4-5), pp. 404-421. <https://doi.org/10.1080/15022250.2019.1696699>.
6. Santero, N., Masanet, E., and Horvath, A., 2011. Life-cycle assessment of pavements. Part I: Critical review. Resources, Conservation and Recycling, 55(9-10), pp. 801-809. <https://doi.org/10.1016/j.resconrec.2011.03.010>.
7. Santos, F. C. et al., 2024. Sustainability-oriented assessment of pavement technologies: A case study of a heavy-traffic highway in Brazil. Case Studies in Construction Materials, 20, e03337. <https://doi.org/10.1016/j.cscm.2024.e03337>.
8. Turskis, Z. et al., 2019. A fuzzy WASPAS-based approach to determine critical information infrastructures of EU sustainable development. Sustainability (Switzerland), 11(215), 424. <https://doi.org/10.3390/su11020424>.
9. Zhang, F., and Qian, H., 2024. A comprehensive review of the environmental benefits of urban green spaces. Environmental Research, 252(2), 118837. <https://doi.org/10.1016/j.envres.2024.118837>.
10. Cooper, K., Fabian, M., and Krekel, C., 2023. New approaches to measuring welfare. Fiscal Studies, 44(2), pp. 123-135.
11. Kruzslíčka, M., 2016. Food Security and Population Welfare in Romania. Agric. Econ. Rural Dev., 13, pp. 79-93.
12. Thoma, J., 2021. On the possibility of an anti-paternalist behavioural welfare economics. Journal of Economic Methodology, 28(4), pp. 350-363. <https://doi.org/10.1080/1350178X.2021.1972128>.
13. Tov, W., 2018. Well-being concepts and components. Handbook of subjective well-being. Noba Scholar, Salt Lake City, UT.
14. Waddock, S., 2021. Wellbeing economics narratives for a sustainable future. Humanistic Management Journal, 6(2), pp. 151-167.
15. Kyzym, M. O., Khaustova, V. Ye., and Trushkina, N. V., 2022. The Essence of the Concept of „Critical Infrastructure” From the Standpoint of National Security of Ukraine. Business Inform, 12, pp. 58-78. <https://doi.org/10.32983/2222-4459-2022-12-58-78>. [in Ukrainian]
16. Trushkina, N., and Zhukova, I., 2024. Management of the critical infrastructure development: clarification of theoretical provisions. Věda a perspektivy, 4(35), str. 63-73. [https://doi.org/10.52058/2695-1592-2024-4\(35\)-63-73](https://doi.org/10.52058/2695-1592-2024-4(35)-63-73). [in Ukrainian]
17. Karapetyan, O. M., 2022. Actualities of the formation of the sovereign welfare fund of Ukraine in the post-war period. Aktual'ni problemy pravoznavstva – Current problems of law, 2, pp. 45-50. <https://doi.org/10.35774/app2022.02.045>. [in Ukrainian]
18. Kravtsov, O. O., 2019. Modeling public welfare based on ethical criteria for the distribution of economic benefits. Economics. Finance. Law, 7(1), pp. 18-21. [in Ukrainian]
19. Molchanova, E., Kovtonyuk, K., and Savych, O., 2019. Methodological approaches to determining the public welfare of the country. Mizhnarodna ekonomichna polityka – International Economic Policy, 1, pp. 46-69. <https://doi.org/10.33111/iep.2019.30.0334>. [in Ukrainian]
20. Mordovets, M. V., 2019. The experience of building a general welfare state: problems and prospects. Hileia – Gileya, 143(3), pp. 58-60. [in Ukrainian]
21. Druzhynina, V. V., and Makarov, A. I., 2016. The impact assessment of the welfare of the population at the local level. Efektyvna ekonomika – Effective Economy [Online], 5. URL: <http://www.economy.nayka.com.ua/?op=1&z=4946>. [in Ukrainian]
22. Vdovyn, M., and Sukhovich, K., 2024. Population welfare indicators of Ukraine and other countries of the world: a comparative analysis. Transformational Economics, 3(08), pp. 13-18. <https://doi.org/10.32782/2786-8141/2024-8-2>. [in Ukrainian]
23. Chechel, O. M., 2011. Basic criteria for the well-being of the population. Investytsiyi: praktyka ta dosvid – Investments: practice and experience, 1, pp. 82-85. [in Ukrainian]
24. Pavlyuk, T. I., Vilchynska, O. Ya., and Petryk, V. A., 2019. Population welfare – the basis of state development. Economic Studies, 4(26), pp. 128-131. [in Ukrainian]

25. Sytnyk, H., and Taran, Y., 2024. State policy regarding the welfare of the population and food security of Ukraine in the context of its competitiveness: theoretical aspect. Actual problems of innovative economy and law, 1, pp. 14-19. <https://doi.org/10.36887/2524-0455-2024-1-3>. [in Ukrainian]
26. Reznikova, O. O., 2022. National Stability in a Changing Security Environment: monograph. National Institute of Strategic Studies, Kyiv, Ukraine. [in Ukrainian]
27. European Commission, 2012. Communication from the Commission to the European Parliament and the Council the EU approach to resilience: Learning from food security crises. URL: http://ec.europa.eu/echo/files/policies/resilience/com_2012_586_resilience_en.pdf.
28. Firsova, O. D., 2019. Ensuring the health system resilience. State Formation [Online], 1, pp. 1-9. <https://doi.org/10.34213/db.19.01.16>. [in Ukrainian]
29. Bazhenova, O., 2008. Modelling the Stability of the Economic Security System of Ukraine. Bulletin of the Taras Shevchenko National University of Kyiv. Ser.: Economics, 101, pp. 52-54. [in Ukrainian]
30. Vysotska, I. B., 2017. Theoretical approaches to the concept "system satisfaction". Scientific Bulletin of the Lviv State University of Internal Affairs. Ser.: Economic, 2, pp. 13-23. [in Ukrainian]
31. Chepka, V. V., and Matiash, O. K., 2017. Financial stability of the enterprise: essence and influence factors. Economy and Society, 12, pp. 649-655. [in Ukrainian]
32. Tkachenko, S. M., 2011. The essence of economic stability of enterprises and its components. Efektyvna ekonomika – Effective economy [Online], 5. URL: <http://www.economy.nayka.com.ua/?op=1&z=1350>. [in Ukrainian]
33. Vasylenko, V. V. et al., 2019. Main directions increasing the functional stability of the management system of data center. Svyazok – Communication, 1, pp. 35-39. [in Ukrainian]
34. Bozhok, Ye., Pyrozhkov, S., Khamitov, N., 2021. Resilience: Survival Strategy in Conditions of Hybrid Threats. Ukrinform, June 15. URL: <https://www.ukrinform.ua/rubric-society/3265105-rezilentnist-strategia-vizivanna-v-umovah-gibridnih-zagroz.html>. [in Ukrainian]
35. Khaustova, V. Ye., and Reshetnyak, O. I., 2023. Resilience of Economy: Its Essence and Challenges for Ukraine. Business Inform, 7, pp. 30-41. <https://doi.org/10.32983/2222-4459-2023-7-30-41>. [in Ukrainian]
36. Khrapkina, V. V., and Trushkina, N. V., 2024. Mechanisms for ensuring the stability of critical infrastructure: European experience. In: V. Khrapkina, and K. Pichik (Eds.), Management of innovative development of socio-economic systems: a collective monograph (pp. 613-628). Publishing house "Kyiv-Mohyla Academy", Kyiv, Ukraine. [in Ukrainian]
37. Khaustova, V., and Kyzym, M. et al., 2024. Digital transformation of energy infrastructure in the conditions of global changes: bibliometric analysis. Proceedings of the 12th Int. Conf. on Applied Innovations in IT, 12(1), pp. 135-142. <http://dx.doi.org/10.25673/115664>.
38. Ganea, V., Trushkina, N., Țirlea, M. R., and Birca, I., 2022. Economia circulară – un model de perspectivă pentru Republica Moldova [Circular Economy – a Perspective Model for the Republic of Moldova]. UNIVERS STRATEGIC – Revistă de Studii Strategice Interdisciplinare și de Securitate, Anul XIII, 4(52), pp. 52-68.
39. Caprian, I., Birca, I., and Trushkina, N., 2023. Eco-efficiency as a philosophy of modern business in the conditions of global transformations. Green, Blue & Digital Economy Journal, 4(1), pp. 1-10. <https://doi.org/10.30525/2661-5169/2023-1-1>.
40. Caprian, I., Birca, I., and Trushkina, N., 2023. Logistical support for the development of the circular economy. Three Seas Economic Journal, 4(1), pp. 1-9. <https://doi.org/10.30525/2661-5150/2023-1-1>.

DIGITAL APPLICATIONS FOR MONITORING AND SUPPORTING VULNERABLE CHILDREN

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Abstract

In the era of rapid digital transformation, digital applications have become vital tools for strengthening community-based support for vulnerable children. These tools enable real-time communication and coordination among public authorities, schools, social services, NGOs, and community cooperatives, improving early identification and personalized support for at-risk children. The paper examines digital tools such as case management platforms, early warning systems, mobile reporting apps, and collaborative workspaces that support data sharing and joint

decision-making. Emphasis is placed on cooperative networks that promote digital inclusion and innovation, especially in rural and underserved areas. Despite their benefits, challenges still persist, including unequal access to technology, limited digital literacy, and data privacy concerns. The paper highlights successful models and best practices, advocating for integrated digital ecosystems that connect communities and authorities to deliver timely, coordinated services. This approach supports the Sustainable Development Goals (SDGs) and national strategies aimed at strengthening child protection and social inclusion.

Keywords: digital tools, vulnerable children, child protection, community support, data sharing, social inclusion

JEL: H75, I28, I38, O33

Introduction

The increasing pace of digital transformation is reshaping the way societies address complex social challenges, particularly those affecting vulnerable populations. Among the most pressing concerns is the need to improve support systems for children in difficulty—those at risk of neglect, abuse, exclusion, or poverty. Traditional mechanisms of intervention, often fragmented and reactive, are increasingly complemented or replaced by digital applications that enable proactive, coordinated, and data-driven responses. These tools facilitate collaboration among public authorities, educational institutions, social services, non-governmental organizations (NGOs), and community actors, fostering a more integrated approach to child protection and social inclusion. In this context, the use of digital platforms—such as case management systems, early warning tools, mobile reporting apps, and collaborative digital workspaces—offers new opportunities to strengthen the effectiveness, timeliness, and reach of child support services, particularly in rural or underserved areas. We explore the role of such digital innovations in improving monitoring and support for vulnerable children.

Results obtained and discussions

Digital case management platforms are increasingly central to child protection efforts. For example, Romania's Aurora case-management application was developed to support social workers and professionals working with the most vulnerable children. In Romania, the Aurora platform enabled social workers to reduce the time from initial concern to intervention significantly, leading to more timely support for vulnerable children. The platform enables efficient data management, facilitates inter-agency coordination, and helps track cases in real time. Similarly, UNICEF's Primero/CPIMS+ has been deployed in multiple countries to unify case records and support rapid, coordinated interventions [2].

Early warning systems that integrate school attendance and health data have been piloted to flag children at risk of dropping out or facing abuse. Such systems have contributed to a measurable reduction in absenteeism and improved referral rates for at-risk children. Mobile applications and SMS-based reporting tools have empowered community members to report concerns securely and anonymously. For example, India's TADAA! platform supports underserved children's learning and emotional needs with minimal data collection, ensuring privacy while facilitating facilitator-led support. Digital workspaces, including custom platforms and mainstream solutions like Microsoft Teams, have enabled secure cross-sectoral collaboration. These tools allow for joint decision-making, shared case notes, and the development of multidisciplinary support plans for high-risk children.

Digital tools have led to earlier identification of children in need. Platforms like Kolibri, which operates on low-cost devices and offline environments, have expanded access to quality education in low-connectivity areas, ensuring that children in rural or marginalized communities are not excluded from digital support. Community-based digital initiatives, such as iTeach Schools in India, have built supportive online learning ecosystems, incorporating parental consent and counselor tracking to ensure successful outcomes for vulnerable students. Despite progress, disparities in access to devices and reliable internet persist, especially in rural and marginalized communities. This digital divide remains a significant barrier to the widespread adoption of digital support systems. Dimitriadis (2025) emphasizes the importance of safeguarding Europe's digital natives by addressing such disparities and ensuring equitable access to digital resources [1].

Both professionals and families often lack the digital skills needed to fully utilize available tools. Specialized training and ongoing support are essential to maximize the impact of digital interventions. Protecting children's data is a critical concern. Platforms like Greece's Kids Wallet illustrate best practices in privacy and age verification, sharing only minimal information (such as age eligibility) and requiring parental oversight for minors' online activities. This approach aligns with emerging European standards for digital child protection [3]. Many digital initiatives rely on short-term funding or pilot status, raising questions about long-term sustainability and integration into national child protection systems.

The Aurora case-management platform in Romania exemplifies successful integration, bringing together government agencies, NGOs, and community groups to streamline case tracking and intervention [9]. Similarly, India's TADAA! and Kolibri platforms demonstrate how minimal data collection and offline functionality can extend support to underserved children while safeguarding privacy. Co-design processes involving children, families, and frontline workers have led to more accessible and relevant tools. For example, the Kids Wallet app in Greece was designed to simplify parental controls and age verification while minimizing data exposure, setting a new standard for privacy-by-design in digital child protection [3]. The "Refuge and Risk" report by Katz and El Asam underscores the importance of involving vulnerable young people in the design of digital tools to ensure their effectiveness and relevance [5].

Specialized training and digital literacy initiatives are crucial. The "Vulnerable Children in a Digital World" report highlights the need for sector-wide training and tools to address the unique risks faced by children with disabilities, those in care, and other vulnerable groups [4][6]. Case studies from the IEEE Applied Case Studies series emphasize ethical design, minimal data collection, and robust consent procedures as key to building trust and ensuring compliance with international data protection standards [7]. In order to bridge the digital divide investments in connectivity and devices, especially for rural and marginalized communities, are essential. Continuous training for professionals and families is necessary to ensure effective use of digital tools. Integration of successful digital platforms into national systems and securing long-term funding are critical for sustainability. Children's perspectives must inform the design and evaluation of digital interventions, with feedback mechanisms and privacy safeguards built in. Digital applications directly support SDG 16.2 (ending violence against children), SDG 10 (reducing inequalities), and SDG 9 (building resilient infrastructure and fostering innovation) by improving access, equity, and effectiveness in child protection services. Long-term effects of digital monitoring on children's well-being require further study. Also, the potential of emerging

technologies such as AI and blockchain for child protection merits exploration. In **Table 1** there is a summary of mentioned platforms and their description.

Table 1. Platforms and their description

<i>Platform</i>	<i>Country</i>	<i>Description of platform</i>
Aurora Platform	Romania	Digital case management for social workers, improving coordination and early intervention
TADAA! Platform	India	Minimal data collection, age-appropriate learning for underserved children
Kolibri	India	Offline learning platform for low-connectivity, low-resource environments
Kids Wallet	Greece	Government-operated app for age verification and parental oversight, privacy by design
iTeach Schools	India	Online learning ecosystem with parental consent and counselor tracking for vulnerable students

Source: Elaborated by author

According to UNICEF (2020), digital tools, when strategically implemented, can strengthen national child protection systems through standardized procedures, enhanced accountability, and improved outcomes for children at risk [8]. UNICEF (2024) emphasizes a rights-based approach that ensures the best interest of the child, particularly in countries undergoing digital transformation in their public services [10]. For instance, in Estonia - a global leader in e-governance - digital identity systems have been integrated into child welfare services, enabling parents, educators, and social workers to collaborate in real-time. This digital backbone helps reduce duplication of efforts and ensures timely interventions. Similarly, the United Kingdom's National Child Measurement Programme (NCMP) integrates health data with school systems to monitor child well-being and proactively address public health concerns related to children. The Internet Matters report further highlights that children with existing vulnerabilities (e.g., those in care, with disabilities, or in socioeconomically disadvantaged households) face greater risks in the digital environment. These children are more likely to experience cyberbullying, grooming, and online exploitation. The report recommends tailored digital literacy curricula, age-appropriate privacy settings, and strong parental mediation mechanisms. It also encourages public-private partnerships for developing adaptive tools to detect and respond to online threats [4]. In the United States, the Child Welfare Information Gateway has explored the use of predictive analytics and artificial intelligence in identifying at-risk children. While these technologies show promise, ethical implications regarding algorithmic bias, informed consent, and transparency must be addressed. In line with IEEE SA's (2022) guidance, ethical AI deployment should adhere to principles such as data minimization, contextual integrity, and inclusive design to protect children's rights [3].

The co-design of digital tools remains a best practice globally. In Australia, the "BeYou" initiative involves children and youth in shaping mental health digital platforms in schools, fostering ownership and ensuring relevance. In Canada, Indigenous communities have developed culturally adapted digital support tools, incorporating traditional knowledge systems alongside modern technology. These practices affirm that context-sensitive, community-led design enhances engagement and sustainability. To advance the digital child protection agenda, governments and development partners should adopt a multi-layered strategy: to strengthen digital governance

frameworks for child protection, embedding privacy-by-design, informed consent, and secure data storage protocols; to invest in cross-sectoral interoperability, enabling educational, health, and social protection systems to share relevant data efficiently, with strong safeguards; to prioritize equity by addressing digital exclusion - through targeted programs that supply connectivity, devices, and training to vulnerable households; to promote public-private partnerships that incentivize the development of child-focused digital tools, ensuring accessibility, scalability, and ethical compliance; to establish national observatories or monitoring bodies to track and evaluate the impact of digital interventions on child well-being and rights; to foster participatory design and feedback mechanisms, ensuring that digital tools evolve in response to the real needs of children, caregivers, and professionals.

Conclusions

In conclusion, digital case management platforms, early warning systems, mobile applications, and digital workspaces are transforming child protection efforts globally. These tools enhance data management, inter-agency coordination, early identification of at-risk children, and access to education in diverse settings. However, the persistence of the digital divide, the need for improved digital literacy among professionals and families, and the critical importance of child data protection remain significant challenges. Initiatives like Romania's Aurora platform, India's TADAA! and Kolibri, and Greece's Kids Wallet offer valuable models for successful implementation, emphasizing integration, minimal data collection, offline functionality, and privacy-by-design principles. Moving forward, it is crucial to invest in infrastructure to bridge the digital divide, provide comprehensive digital literacy training, ensure the long-term sustainability of digital interventions, and prioritize ethical and child-centered design approaches. The integration of children's perspectives, robust consent procedures, and ongoing evaluation are essential to maximize the benefits of digital tools while safeguarding children's well-being and rights. Continued research into the long-term effects of digital monitoring and the potential of emerging technologies will further inform and strengthen digital child protection strategies, contributing directly to achieving key Sustainable Development Goals. Additionally, there remains a need for in-depth empirical research on the following: the long-term psychological impact of digital case monitoring on children's development and autonomy; comparative cost-benefit analyses of national vs. local digital tools in child protection systems; the effectiveness of digital literacy programs for families in marginalized contexts; the role of emerging technologies such as AI, blockchain, and biometrics in verifying identity, preventing fraud, and ensuring traceability in digital child welfare systems; mechanisms to address cross-border digital threats to children, including international coordination on online child exploitation.

References

1. DIMITRIADIS, D. Safeguarding Europe's Digital Natives: Foresight commentary on Child Online Safety and Identity. LinkedIn, 24 March 2025. [online]. Available at: <https://www.linkedin.com/pulse/safeguarding-europes-digital-natives-foresight-child-dimitriadis-fibcf> (visited 22.04.2025).
2. Global Social Service Workforce Alliance. How Digital Data Can Help Safeguard the World's Most Vulnerable Children. [online]. Available at: <https://socialserviceworkforce.org/blog/how-digital-data-can-help-safeguard-the-worlds-most-vulnerable-children/> (visited 22.04.2025).

3. IEEE Standards Association. 8 Examples of Protecting Children's Data Privacy and Fostering a Positive Experience. 13 July 2022. [online]. Available at: <https://standards.ieee.org/beyond-standards/8-examples-of-protecting-childrens-data-privacy-and-fostering-a-positive-experience/> (visited 22.04.2025).
4. Internet Matters. Vulnerable children in a digital world report 2019. Highlighting online risks and support. [online]. Available at: <https://www.internetmatters.org/hub/research/vulnerable-children-in-a-digital-world-report-2019/> (visited 22.04.2025).
5. KATZ, A., EL ASAM, A. Refuge and Risk: Life Online for Vulnerable Young People. Internet Matters. [online]. Available at: <https://www.internetmatters.org/wp-content/uploads/2021/01/Internet-Matters-Refuge-And-Risk-Report.pdf> (visited 22.04.2025).
6. KATZ, A., EL ASAM, A. Vulnerable children in a digital world in partnership with with Internet MattersVulnerable Children in a Digital World. Childnet International. 2019. [online]. Available at: <https://www.childnet.com/wp-content/uploads/2020/02/Internet-Matters-Report-Vulnerable-Children-in-a-Digital-World.pdf> (visited 22.04.2025).
7. NGUYEN, S. Applied Case Studies for Children's Data Governance. IEEE Standards Association. 2021. [online]. Available at: <https://engagestandards.ieee.org/rs/211-FYL-955/images/IEEEESA-Childrens-Data-Governance-Report.pdf> (visited 22.04.2025).
8. STOILOVA, M., LIVINGSTONE, S., KHAZBAK, R. Investigating Risks and Opportunities for Children in a Digital World: A rapid review of the evidence on children's internet use and outcomes. UNICEF. February 2021. [online]. Available at: <https://www.unicef.org/innocenti/media/5621/file/UNICEF-Investigating-Risks-Opportunities-Children-Digital-World-2021.pdf> (visited 22.04.2025).
9. UNICEF. Child protection: Digital opportunities, challenges and innovations across the Region. October 2020. [online]. Available at: <https://www.unicef.org/eca/media/14386/file> (visited 22.04.2025).
10. UNICEF. Protecting and Prioritizing Children's Rights and Safety in Digital Environments. A Call to Action. 23 September 2024. [online]. Available at: <https://www.unicef.org/innovation/stories/protecting-childrens-rights-in-digital-environments> (visited 22.04.2025).

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THE ROLE OF LOCAL BUDGETS FOR SUSTAINABLE DEVELOPMENT OF BULGARIAN MUNICIPALITIES

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Abstract

The scientific report characterizes the nature and features of local budgets. The goals for achieving sustainable development of municipalities are presented. The role and importance of local budgets as a tool for the sustainable development of Bulgarian municipalities are clarified. An analysis of the financial independence, indebtedness, financial sustainability, and investment activity of Bulgarian municipalities in recent years is carried out.

Keywords: local budgets, sustainable development

JEL: H72, Q01, R51, O18

Introduction

Local budgets are an important tool for achieving sustainable development of municipalities. The issues of their nature and specifics are relatively poorly studied in the specialized literature. The effectiveness of local budgets depends on the level of fiscal decentralization. It involves a detailed distribution of expenditure responsibilities and sources of revenue between different levels of

government, assessing the extent and amount to which the central government can provide local authorities with the opportunity to administer the budget process at the local level themselves, including assuming debts. Fiscal decentralization improves financial relations between central and local governments and guarantees the financial autonomy of municipalities. It implies a higher degree of synchronization between the interests of different political, economic and social groups in individual municipalities and improves the efficiency in the distribution and accounting of public financial resources.¹

The object of study in the scientific report is local budgets, and **the subject of research** is the changes in the financial situation of municipalities in Bulgaria in recent years. **The aim** is to establish the impact of the budget policy implemented at the local level on the financial autonomy, indebtedness, financial sustainability and investment activity of Bulgarian municipalities in the context of achieving sustainable development of local communities. To achieve the goal formulated in this way, it is necessary to solve the following **tasks**: presenting the essence and features of local budgets, clarifying the role of local budgets as a tool for achieving sustainable development of municipalities, and analyzing and assessing the financial situation of Bulgarian municipalities during the period 2017-2023.

Results obtained and discussions

Essence and features of local budgets

In order to obtain a complex and comprehensive picture of the essence of the local budget, it is necessary to examine it from different perspectives. In this regard:

- *the municipal budget* is an annual financial plan that is drawn up, adopted, amended, implemented and reported according to certain rules and procedures. It includes all receipts and payments related to the activities of a given municipality within a budget year;²
- *the municipal budget* is a document reflecting the specifics of the municipality's financial policy;
- *the municipal budget* is a document for financial management of the operational activities of the municipality;
- *the municipal budget* is a means of communication between local administration authorities and representatives of the local community.

Local budgets perform certain fiscal functions. The main ones are the following: allocative, distributive and stabilization.³

1. The essence of *the allocative function* is expressed in the fact that local budgets provide the necessary financial resources to meet certain public needs. Municipalities provide a variety of services to the local community, which are spatially limited to their territory. They are called local

¹ Iliopoulos, P., K. De Witte. The Expenditure Composition and Trade-offs in Local Government Budgets, Socio-Economic Planning Sciences, Vol. 93, June 2024, <https://doi.org/10.1016/j.seps.2024.101900>.

² Public Finance Act, published in the State Gazette, issue 15 of 15 February 2013 and its amendments and supplements, Art. 5 and Art. 6.

³ Musgrave, R. A., P. B. Musgrave. Public Finance in Theory and Practice, 5th Edition, McGraw-Hill Book Co, Singapore, 1989, pp. 6-13.

public goods and differ significantly from public goods provided by the central government or from private goods that producers offer to specific consumers for voluntary payment;

2. The *distribution function* determines how much of the gross domestic product is distributed and redistributed through local budgets, observing the principles of efficiency and fairness. The optimal distribution of income and assets is achieved through tax policy and budget transfers;

3. The role of *the stabilization function* lies in the fiscal techniques and instruments through which the state of the local economy can be stabilized and socio-economic indicators at the local level can be improved (economic growth, employment, income level, prices of local services, tax burden in terms of property taxation, etc.).

The revenue part of the municipal budget is formed from own revenues, transfers from the central budget and attracted funds. Revenues include proceeds from local taxes and fees, services and rights provided by the municipality, disposal of municipal property, fines and property sanctions, interest and penalties, grants and donations.⁴ Transfers from the central budget include the general subsidy for activities delegated by the state, the general equalization subsidy, the transfer for winter maintenance and snow removal of municipal roads, the targeted subsidy for capital expenditures and financial compensations from the state.⁵ The attracted funds of the municipalities are formed from the bank loans received by them, from the issued bond loans, from the interest-free loans granted in accordance with the Public Finance Act, from financial leasing, from the attracted funds under operational programs and from other attracted funds.

Municipal expenditures are part of the public expenditures that are implemented through local budgets. They are used to ensure the administrative and investment activities of municipalities, as well as the provision of local public goods in order to meet the needs of the population of the respective territorial community. Therefore, municipal expenditures are part of the GDP that local authorities direct to finance various public services provided to the local community, in accordance to their powers.

The budget balance is obtained by adding budget transfers to the difference between the budget revenues and the budget expenditures of the municipality. The budget balance is an indicator of the fiscal position of local budgets. In the medium term, each municipality strives to achieve a balanced budget. If the municipal budget balance is negative, it can be financed by obtaining long-term bank loans, the issuance of municipal bond loans, available funds in bank accounts from previous periods and other sources of financing, including from abroad. If the budget balance is positive, this means that excess revenues are generated that do not correspond to the expenses incurred. In this case, it is necessary to pursue a policy of reducing the tax burden on the local population and local businesses, while at the same time improving the quality of the local public services offered.

Local budgets as a tool for sustainable development of municipalities

Each municipality is characterized by specific socio-economic conditions that distinguish it from all other municipalities on the territory of a given country. These conditions determine to a greater or lesser extent its ability to attract and retain investments, thus contributing to the

⁴ Public Finance Act, published in the State Gazette, issue 15 of 15 February 2013 and its amendments and supplements, Art. 45.

⁵ Ibid., Art. 52.

development of its economic potential. In order to identify the advantages and disadvantages of the local economy, it is necessary to analyze its strengths and weaknesses, as well as the opportunities and threats that accompany it. A very important condition for the successful economic development of a given municipality is the achievement of one-wayness and balance of interests between business, the local population and local government bodies.

There are various definitions of the concept of "sustainable development" in the specialized scientific literature. The classic definition is the one formulated in the Report of the World Commission on Environment and Development of the United Nations "Our Common Future" in 1987, prepared under the leadership of the former Prime Minister of Norway Gro Harlem Brundtland, according to which sustainable development is development that meets the needs of the present without compromising the ability of future generations to meet their own needs.⁶ In this sense, sustainable development plays an important role in meeting the needs of individuals. Provided that limited natural, human, material and financial resources are used effectively and the environment and biological diversity are protected to the maximum extent, it is believed that people's well-being will increase and their quality of life will improve.

At the UN Conference held in Rio de Janeiro from 3 to 14 June 1992, the "Rio Declaration on Environment and Development" and "Agenda 21" were adopted and signed. At this conference, the goals and action plans were formulated in connection with the implementation of the concept of sustainable development and the principle of building a global international partnership in solving various environmental problems was affirmed.⁷ According to "Agenda 21", the concept of "sustainable development" is understood as balanced socio-economic development, which is carried out in conditions of environmental protection and rational use of natural resources, taking into account the vital interests not only of current but also of future generations.⁸

Sustainable development is not a static quantity, but is seen as a dynamic process, which consists of three closely interrelated elements: economic, social and environmental. These elements of sustainable development are presented schematically in Fig. 1.

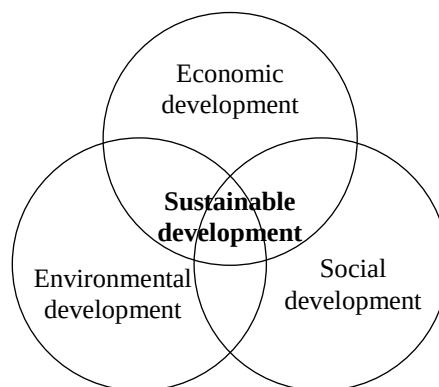


Figure 1. Basic elements of sustainable development⁹

⁶ United Nations WCED. Report of the World Commission on Environment and Development: Our Common Future, Oxford University Press, Oxford, 1987.

⁷ Shi, L., L. Han, F. Yang, L. Gao. The Evolution of Sustainable Development Theory: Types, Goals, and Research Prospects. Sustainability, 11(24), 2019, 7158, <https://doi.org/10.3390/su11247158>.

⁸ Serikov, S. D. Concept of sustainable development: theoretical aspect, Siberian Financial School, №4(117), 2016, p. 37.

⁹ Aminuddin, A. S, M. K Nawawi. Investigation of the Philosophy Practiced in Green and Lean Manufacturing Management, International Journal of Customer Relationship Marketing and Management, 4(1), 2013, p. 8.

The first element covers issues related to the fight against poverty as a factor causing not only economic, but also socio-political upheavals. In this regard, it is necessary to achieve economic growth based on the introduction of new resource-saving production and technologies. The second element contains activities aimed at providing broad support to people, while protecting their individual rights to life and development. The goal is to increase the level of social inclusion and reduce disparities in income and wealth. The third element of sustainable development includes a number of thematic areas, the most important of which are the creation of safe and environmentally friendly living conditions, increasing the efficiency of natural resources used and reducing the degree of negative anthropogenic impact on the environment ¹⁰.

From the analysis and assessment of the expenditures of municipalities in Bulgaria, depending on their functional structure, it can be established what funds, as an absolute amount and as a relative share of the total expenditures of each municipality, are directed to financing its economic development (this includes expenditures for housing construction, public works and communal services and expenditures for economic activities and services), for its social development (this includes expenditures for education, healthcare, social security, assistance and care) and for its ecological development (this includes expenditures for environmental protection).

In recent years, the local budgets of Bulgarian municipalities have allocated the most funds for financing social development. This is followed by funds for financing economic development. The least financial resources are allocated for financing environmental development. Of course, in municipalities where the mining industry and the processing industry are highly developed, the costs of environmental protection are relatively higher. In municipalities where the income of the population is relatively low and unemployment is relatively high, the costs of social development are relatively higher. In municipalities that are characterized by a low level of their economic development, the costs of investments in housing construction, public works and communal services, the construction of new enterprises and support for local business are relatively higher.

Therefore, the specifics of the expenditure policy pursued by Bulgarian municipalities, the balance of their budget and their investment capacity are important conditions for ensuring the sustainability of their development in both economic and social and environmental aspects.

Financial analysis of Bulgarian municipalities

From a methodological point of view, the financial condition of municipalities can be studied by developing a methodology containing a system of quantitative indicators for analyzing and assessing their financial independence, indebtedness, financial sustainability and investment activity.

The financial independence of municipalities is measured by the following indicators:

- relative share of own revenues to total local revenues;
- Coverage of local activity costs with own revenues – calculated as the ratio between local activity costs and municipalities' own revenues.

Municipal indebtedness is measured by the following indicators:

- amount of municipal debt;
- amount of municipal debt per capita.

¹⁰ Molchanova, M. Yu. Concept of sustainable development and its application in the region, Journal of Perm University, Special. issue, 2012, p. 48.

The financial Sustainability of municipalities is measured through the following indicators:

- relative share of overdue debts to total expenses;
- real estate tax collection.

The investment Activity of municipalities is measured by the indicator:

- relative share of capital expenditures to the total amount of expenditures.

The values of the indicators for financial independence of Bulgarian municipalities during the period 2017-2023 are presented in Table 1. From the data in it, it can be summarized that the relative shares of own revenues to total local revenues decreased from 34.78% in 2017 to 24.87% in 2023. On the other hand, the coverage of the costs of local activities with own revenues also shows a downward trend from 88.39% in 2017 to 74.08% in 2023. Therefore, the financial independence of municipalities in Bulgaria during the analyzed period is decreasing. They are becoming increasingly dependent on the financing they receive from the central budget and their ability to conduct independent financial policy is decreasing.

Table 1. Financial independence of municipalities in Bulgaria during the period 2017-2023¹¹

years	2017	2018	2019	2020	2021	2022	2023
own income (in million BGN)	2,240.7	2,376.2	2,449.3	2,449.2	2,892.6	3,182.0	3,389.0
expenses for local activities (in million BGN)	1,980.6	1,957.5	1,910.9	2,030.5	2,506.7	2,679.2	2,510.6
total local revenues (in million BGN)	6,443.0	7,327.2	8 184.8	8,935.9	10,010.3	11,741.5	13,625.3
<i>Relative share of own revenues to total local revenues</i>	34.78%	32.43%	29.92%	27.41%	28.90%	27.10%	24.87%
<i>covering the costs of local activities with own revenues</i>	88.39%	82.38%	78.02%	82.90%	86.66%	84.20%	74.08%

The values of the indicators that show the level of indebtedness of Bulgarian municipalities are presented in Table 2. The amount of municipal debt increases from 1,258.39 million BGN in 2017 to 1,770.49 million BGN in 2023. At the same time, with a decreasing population, the amount of municipal debt per capita increases, which leads to an increase in the indebtedness of Bulgarian municipalities.

Table 2. Indebtedness of municipalities in Bulgaria during the period 2017-2023¹²

years	2017	2018	2019	2020	2021	2022	2023
population (in thousands)	7,075.9	7,025.0	6,975.8	6,934.0	6,877.7	6,465.1	6,446.6

¹¹ <http://www.minfin.bg/bg/statistics/13>; <https://www.minfin.bg/bg/810>.

¹² <https://www.minfin.bg/bg/810>;

<https://nsi.bg/bg/content/2974/%D0%BD%D0%B0%D1%81%D0%B5%D0%BB%D0%B5%D0%BD%D0%B8%D0%B5>.

<i>amount of municipal debt (in million BGN)</i>	1,258.39	1,396.38	1,446.21	1,440.74	1,394.63	1,421.36	1,770.49
<i>amount of municipal debt per capita (in BGN)</i>	177.84	198.77	207.32	207.78	202.78	219.85	274.64

Table 3 contains information on the values of the indicators used to measure the financial sustainability of municipalities. The relative share of overdue liabilities to the total amount of municipal expenditures in Bulgaria decreases from 2.67% in 2017 to 1.27% in 2023, and the collection rate of real estate tax increases from 72.26% in the first to 79.11% in the last year of the analyzed period. In other words, the financial sustainability of municipalities increases and contributes to their sustainable development.

Table 3. Financial sustainability of municipalities in Bulgaria during the period 2017-2023¹³

<i>years</i>	2017	2018	2019	2020	2021	2022	2023
<i>relative share of overdue debts</i>	2.67%	1.97%	2.45%	1.75%	1.36%	0.88%	1.27%
<i>real estate tax collection</i>	72.26%	72.05%	74.78%	73.73%	76.99%	77.64%	79.11%

The investment activity of municipalities during the period 2017-2023 is presented in Table 4.

Table 4. Investment activity of municipalities in Bulgaria during the period 2017-2023¹⁴

<i>years</i>	2017	2018	2019	2020	2021	2022	2023
<i>capital expenditure (in million BGN)</i>	1,028.8	1,583.6	1,851.6	1,745.8	1,797.8	1,974.1	2,921.6
<i>total local expenditure (in million BGN)</i>	6,112.6	7,151.0	8,090.8	8,519.4	9,902.9	11,331.7	13,984.6
<i>Relative share of capital expenditure to total local expenditure</i>	16.83%	22.15%	22.89%	20.49%	18.15%	17.42%	20.89%

At the beginning of the analyzed period, the relative share of municipal capital expenditures to total local expenditures increased and reached 22.89% in 2019. Over the next three years, as a result of the negative impact of the Covid-19 pandemic, it decreased to 17.42% in 2022, and only in the last year did the investment activity of Bulgarian municipalities recover to its pre-crisis level.

Conclusion

The following conclusions and generalizations can be made from the research conducted in this scientific report:

¹³ <https://www.minfin.bg/bg/810>.

¹⁴ <http://www.minfin.bg/bg/statistics/13>: <https://www.minfin.bg/bg/810>.

A theoretical review of the essence, features and functions of municipal budgets as a whole was carried out.

The role of local budgets as a tool for achieving sustainable development of municipalities was clarified.

The most important indicators used to analyze and assessing the financial condition of Bulgarian municipalities were presented.

The state and dynamics of financial independence, indebtedness, financial sustainability and investment activity of Bulgarian municipalities during the period 2017-2023 were analyzed.

References

1. Public Finance Act, published in the State Gazette, issue 15 of 15 February 2013, and its amendments and supplements.
2. Molchanova, M. Yu. Concept of sustainable development and its application in the region, Journal of Perm University, Special. issue, 2012.
3. Serikov, S. D. Concept of sustainable development: theoretical aspect, Siberian Financial School, №4(117), 2016.
4. Aminuddin, A. S., M. K Nawawi. Investigation of the Philosophy Practiced in Green and Lean Manufacturing Management, International Journal of Customer Relationship Marketing and Management, 4(1), 2013.
5. Iliopoulos, P., K. De Witte. The Expenditure Composition and Trade-offs in Local Government Budgets, Socio-Economic Planning Sciences, Vol. 93, 2024, <https://doi.org/10.1016/j.seps.2024.101900>.
6. Musgrave, R. A., P. B. Musgrave. Public Finance in Theory and Practice, 5th Edition, McGraw-Hill Book Co, Singapore, 1989.
7. Shi, L., L. Han, F. Yang, L. Gao. The Evolution of Sustainable Development Theory: Types, Goals, and Research Prospects. Sustainability, 11(24), 2019, 7158, <https://doi.org/10.3390/su11247158>.
8. United Nations WCED. Report of the World Commission on Environment and Development: Our Common Future, Oxford University Press, Oxford, 1987.
9. <http://www.minfin.bg/bg/statistics/13>.
10. <http://www.minfin.bg/bg/810>.
11. <https://nsi.bg/bg/content/2974/%D0%BD%D0%B0%D1%81%D0%B5%D0%BB%D0%B5%D0%BD%D0%B8%D0%B5>.

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CHALLENGES OF ACCOUNTING ETHICS UNDER GLOBALIZATION PROBLEMELE ETICII CONTABILE ÎN CONDIȚIILE GLOBALIZĂRII

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Abstract

The accounting reform that began in the Republic of Moldova in 1998 aimed at raising the professional level of accountants and improving their role in financial and management decision-making. During the reformation, the accounting system was confronted with numerous professional challenges, including those related to ethics.

The foundation of any profession has been, is and will be professional ethics. The fundamental principles of ethics at the international level for professional accountants in the performance of their activities are established by the

International Code of Ethics for Professional Accountants, developed by the International Federation of Accountants (IFAC), which is an independent standardization body.

The fundamental principles of ethics outlined at the global level, such as: integrity, objectivity, professional competence and due care, confidentiality and professional conduct, are common to Moldovan society, but the conceptual-behavioral philosophy embedded in each principle differs.

In the context in which the globalization of social and economic processes affects the shaping of moral-ethical models of society, states, entities, entrepreneurs, professionals, which do not attest to a unification that would be desired, we consider it necessary to create our own state policy in the field of professional accounting ethics. The code mentioned in the local implementation raises concerns about conceptual, motivational and professional accounting issues, along with linguistic differences.

Artificial intelligence also outlines accounting ethical issues in 2025, including cultural and international differences in ethical standards, ethical training and professional responsibility.

Like all activities, accounting must be based on a well-structured, concrete, logical, scientific, clear, and understood ethical policy. Accounting is carried out for the purpose of the company; therefore, it is to be shaped and created by state institutions, even based on international norms.

Keywords: *accounting, accounting reform, accounting ethics, regulatory acts, globalization, accounting model, social and moral-ethical model, artificial intelligence*

JEL: M41

Introducere

În condițiile globalizării contabilitatea apare ca știință, filosofie, activitate și, nu în ultimul rând, ca politică, care depinde de valorile proprii ale cercetătorului, filosofului, societății, statului și factorului extern, în aria cărora se include studierea, organizarea, reglementarea acesteia.

Toată știința și practica economică se bazează pe informația generată de contabilitate [1, p. 7]. Calitatea ei oglindește dezvoltarea unui stat și afectează, implicit bunăstarea societății acestuia.

Fundamentul oricărei profesii este etica profesională. Actualmente sistemul contabil moldovenesc se confruntă relativ tăcut cu această problemă. Cercetînd masivul de informație de pe platforma *Instrumentul Bibliometric Național (IBN)* [2] - cea mai mare bibliotecă electronică cu Acces Deschis la articole publicate în revistele științifice, în culegerile manifestărilor științifice, în revistele de popularizare a științei și în revistele socio-culturale din Republica Moldova în perioada 1993-2025, am stabilit că problema eticii profesionale este tratată în 51 de articole, din care doar 4 de către specialiștii contabili: Bădicu Galina, Mihailă Svetlana, Șoimu Sergiu, Balan Igor, Moldovan Mirela, Chira Tatiana, Zaharco Silvia. Desigur nu toate publicațiile cercetătorilor moldoveni sunt fixate în IBN, dar vom constata că această temă merită atenție sporită în orice situație, dar mai mult în secolul XXI.

Globalizarea proceselor sociale și economice afectează conturarea modelelor moral-etice ale societății, statelor, entităților, antreprenorilor, profesioniștilor.

Principiile fundamentale de etică conturate la nivel global sunt comune și societății moldovenești: integritatea, obiectivitatea, competența profesională și atenția cuvenită, confidențialitatea și conduita profesională [3, pct. 110.1 A1, p. 21]. Însă vom menționa că în procesul cercetării subiectului în cauză, am atestat că sensul pus în aceste principii fundamentale diferă de la o țară la alta și depinde de valorile moral-etice ale societății corespunzătoare.

Nu vom uita și de valorile puse la bazele contabilității de către Părintele evidenței contabile Luca Pacioli. În opera sa fundamentală „Summa de arithmetica, geometria, proportioni et proportionalita” (1494) la compartimentul „Particularis de computis et scriptures (Tratat despre conturi și înregistrări)” Pacioli a identificat că Contabil poate lucra doar omul absolut onest, iar „Principiul-poruncă 8” pentru contabili a fost numită - onestitatea/moralitatea.

Rezultate și discuții

În teoria și practica academică se operează cu variațiile eticii: globală, profesională și personală.

Etica profesională adaptează principiile morale general umane la genurile particulare de activitate profesională. Totodată, etica profesională reflectă, de asemenea, și deosebirile dintre cerințele înaintate față de specialist și normele de conduită general umane acceptate de societatea în întregime. [4, p. 198]

Unii experți, specialiști contabili, economiști consideră că contabilitatea va dispărea, că aceasta vă putea fi ținută de inteligența artificială. Acest fapt ne-a trezit curiozitate și ne-a determinat să identificăm care ar fi problematica eticii contabile din punctul de vedere al inteligenței artificiale, văzută la nivel global. Ne-a impresionat răspunsul, deoarece am pus aceiași întrebare în trei limbi: română/moldovenească, engleză și rusă (Tabelul 1).

Tabelul 1. Problemele actuale ale eticii contabile identificate de inteligența artificială

Problemele actuale ale eticii contabile		
<i>Limba română</i>	<i>Limba rusă</i>	<i>Limba engleză</i>
1. Presiuni comerciale și conflicte de interese 2. Manipularea creativă a contabilității ("creative accounting") 3. Lipsa independenței auditorului 4. Lacune în reglementări sau aplicarea lor 5. Corupția și lipsa transparenței 6. Impactul tehnologiei și digitalizării 7. Formarea profesională insuficientă în etică 8. Globalizarea și standardele diferite	1. Конфликт интересов 2. Независимость и объективность 3. Конфиденциальность 4. Достоверность отчетности 5. Давление со стороны руководства 6. Ответственность перед обществом 7. Использование ИИ и автоматизации 8. Профессиональная компетентность 9. Сообщение о нарушениях (whistleblowing)	1. Financial Misreporting and Fraud / Raportarea financiară falsificată și fraudă 2. Auditor Independence and Objectivity / Independența și obiectivitatea auditorilor 3. Cybersecurity and Data Integrity / Securitatea cibernetică și integritatea datelor 4. Use of Artificial Intelligence and Automation / Utilizarea inteligenței artificiale și automatizarea 5. Environmental, Social, and Governance (ESG) Reporting / Raportarea ESG (mediu, social, guvernanță) 6. Whistleblower Retaliation and Protection / Protecția și represaliile împotriva avertizorilor de integritate (whistleblowers) 7. Pressure from Management / Presiunea din partea managementului 8. Tax Avoidance and Aggressive Tax Planning / Evaziunea fiscală și planificarea fiscală agresivă 9. Cultural and Global Differences in Ethical Standards/Diferențe culturale și internaționale în standardele etice 10. Ethical Training and Accountability / Formarea etică și responsabilitatea profesională

Sursa: <https://chatgpt.com/> [5]

Am fost curioși să aflăm și faptul că un nivel ridicat de etică contabilă este observat, de regulă, în țările cu un sistem dezvoltat de guvernare corporativă, control independent al auditului și comunități profesionale puternice. De exemplu: Canada, Marea Britanie, SUA, Germania, Australia.

Suplimentar am investigat, cu ajutorul inteligenței artificiale, cum cercetătorii din trei țări, în care etica profesională contabilă nu e atât de înaltă, văd problemele actuale ale eticii contabile (Tabelul 2). Astfel s-a identificat problematica eticii contabile la nivel profesional, de mediul academic și practic.

Tabelul 2. Problematica eticii contabile în viziunea economiștilor din Republica Moldova, România, Federația Rusă

Problemele eticii contabile identificate de cercetători		
<i>Republica Moldova</i>	<i>România</i>	<i>Federația Rusă</i>
1. Presiunea managerilor asupra contabililor 2. Contabilitatea creativă și raportarea denaturată 3. Implicarea contabililor în evaziune fiscală 4. Educație etică deficitară 5. Politizarea contabilității în instituțiile publice 6. Aplicarea formală a Codului Etic IFAC	1. Contabilitatea creativă 2. Conflictul între interesele etice și presiunile manageriale 3. Slaba aplicare a codului etic și a reglementărilor 4. Lipsa transparenței în raportare 5. Educația etică insuficientă în formarea contabililor 6. Implicarea contabililor în evaziune fiscală 7. Lipsa culturii etice la nivel organizațional	1. Несовершенство нормативно-правовой базы 2. Проблемы адаптации к международным стандартам (МСФО) 3. Низкий уровень профессиональной этики 4. Недостаточная автоматизация и цифровизация 5. Проблемы подготовки бухгалтерских кадров 6. Искажение информации в отчетности 7. Снижение доверия к финансовой отчетности

Sursa: <https://chatgpt.com/> [5]

Toate problemele identificate de specialiști sunt mai mult sau mai puțin importante, altele sunt discutabile. În contabilitate, cu un nivel jos de etică profesională, nu poate fi vorba de o contabilitate creativă și de o manipulare respectivă, deoarece contabilitatea este o activitate reglementată, scopul căreia e crearea și prezentarea informației precise despre fenomene. E discutabilă și problema politizării contabilității în instituțiile publice. Astfel și trebuie să fie contabilitatea într-un stat suveran.

În acest articol atenția noastră va fi direcționată spre problematica: educației etice deficitare, aplicării formale a Codului Etic IFAC, imperfecțiunii cadrului normativ contabil, problemei adaptării la standardele internaționale și responsabilității față de societate, toate fiind dependente una de alta.

Da, cadrul normativ contabil e imperfect și nu numai din punctul de vedere al reglementării eticii profesionale.

Nu găsim noțiunea de *etică* în Legea contabilității și raportării financiare nr. 287 din 15.12.2017 care stabilește cadrul normativ de bază, principiile și cerințele generale și mecanismul de reglementare în domeniul contabilității și raportării financiare în Republica Moldova. Găsim

cuvîntul etică în Standardul ocupațional „Contabil” și doar în lista calităților personale și profesionale ce ar trebui posedate de specialist cum ar fi: responsabilitate, rigurozitate în exercitarea atribuțiilor de funcție, eficiență, spirit de echipă, etică și comportament adecvat, abilități de comunicare cu colegii, clienții, furnizorii, confidențialitate etc. Acest concept lipsește și în Standardul Național de Contabilitate „Politici contabile, modificări ale estimărilor contabile, erori și evenimente ulterioare”. S-ar părea că în actele normative contabile, din care: primul fundamental conceptual (ce), ocupațional profesional (cine), metodologic și metodic (cum) ar putea fi găsite aluzii și trimiteri la respectarea normelor etice.

Tabelul 3. Acte normative contabile și reglementarea eticii contabile

Legea contabilității și raportării financiare nr. 287 din 15.12.2017 [6]	Standardul ocupațional Contabil, 2021 [7]	Standardul Național de Contabilitate „Politici contabile, modificări ale estimărilor contabile, erori și evenimente ulterioare”, 2013 [8]
Stabilește cadrul normativ de bază, principiile și cerințele generale și mecanismul de reglementare în domeniul contabilității și raportării financiare în Republica Moldova.		Obiectivul standardului constă în stabilirea modului de selectare, aplicare și modificare a politicilor contabile, de modificare a estimărilor contabile, de corectare a erorilor, de contabilizare a evenimentelor ulterioare și de prezentare a informațiilor aferente în situațiile financiare.
	Pentru aceasta, el trebuie să dețină calități personale și profesionale, cum ar fi: responsabilitate, rigurozitate în exercitarea atribuțiilor de funcție, eficiență, spirit de echipă, <i>etică</i> și comportament adecvat, abilități de comunicare cu colegii, clienții, furnizorii, confidențialitate etc.	

După destrămarea Uniunii Sovietice contabilitatea ca filosofie a încercat să se adapteze la valorile occidentale. Prin Hotărârea Guvernului cu privire la reforma contabilității Nr. 1187 din 24.12.1997 [9] s-a instituit reforma contabilității care a anunțat drept *obiectiv crearea unei baze informaționale sigure în vederea dezvoltării piețelor de capital și de hîrtii de valoare, atragerii de investiții, aprecierii obiective a activității întreprinderii, extinderii relațiilor economice internaționale, obținerii unui sistem unic de comparare a indicatorilor financiari*. Deci principalele sarcini care au fost fixate nu au constituit bunăstarea societății, ci *dezvoltarea piețelor de capital și de hîrtii de valoare, atragerea de investiții*.

De către specialiștii moldoveni au fost elaborate Standarde Naționale de Contabilitate de înaltă calitate, cu comentarii comprehensive exhaustive, și Plan de conturi contabile al activității

economico-financiare a întreprinderilor, conectat ideal la standarde, ce s-a demonstrat prin comparație cu actualele Standarde.

În anul 2001 potrivit Ordinului Ministerului Finanțelor Nr. 29 din 01.03.2001 [10] a fost pus în aplicare Codul privind conduita profesională a auditorilor și contabililor din Republica Moldova, elaborat în baza Codului privind Etica Contabililor Profesioniști (Code of Ethics for Professional Accountants), aprobat de Federația Internațională a Contabililor (IFAC) în redacția anului 2000.

La pct. 6 din Codul privind conduita profesională a auditorilor și contabililor din Republica Moldova se specifica că:

Ca și orice altă profesie, profesia de auditor și contabil se determină printr-un șir de caracteristici, inclusiv:

*posedarea unor cunoștințe, dobândite în procesul de studii și instruire continuă profesională;

*respectarea de către auditori și contabili a Codului privind conduita profesională, inclusiv menținerea la un nivel convenit a modului unic de abordare obiectivă a îndeplinirii obligațiilor sale;

**acceptarea unor obligații față de societate în ansamblu* (prin introducerea unor restricții la atribuirea unei calificări sau în utilizarea unui titlu) [10].

Totodată la pct. 9 din codul analizat se menționa că, o caracteristică distinctă a oricărei profesii o constituie *acceptarea obligațiilor acesteia față de public* [10]. Din punct de vedere al profesiei de auditor și contabil publicul reprezintă clienții, creditorii, organele de stat, patronii, angajații, investitorii, comunitatea de afaceri și financiară și toți cei care contează pe obiectivitatea și onestitatea auditorilor și contabililor în scopul menținerii funcționării corespunzătoare a activității de antreprenariat. Această încredere impune o responsabilitate a profesiei de auditor și contabil față de interesele publice. *Interesele publice, conform reglementatorilor, este bunăstarea generală a persoanelor și organizațiilor, cărora auditorii și contabilii le prestează servicii.*

Deci conform reglementărilor, contabilul are unele obligații față de societate în ansamblu, dar are obligații primordiale față de public, cu interese publice - bunăstarea generală a persoanelor și organizațiilor, cărora auditorii și contabilii le prestează servicii.

Am ajuns în situația de haos în care este loc pentru totul, pentru entitate de interes public, entitate publică, administrație publică, sectorul public, interese publice etc. Unde e regula, adevărul absolut? Unde e locul pentru societatea moldovenească, pentru bunăstarea ei?

Ținând cont de faptul că Codul stabilea „norme de conduită profesională unice în scopul asigurării celei mai înalte performanțe a activității desfășurate și menținerii încrederii publicului în profesia de auditor și contabil” [10, pct. 8] ne punem întrebarea: ce o fi în final publicul – societatea sau antreprenoriatul? E scris una, dar e sens pentru altceva. Desigur indirect e una și aceeași, dar doar într-o societate moral înalt dezvoltată. Și nu e vorba doar de Moldova. Globalizarea social-economică ne poate duce spre un final evident, dacă ne permitem ca cineva să ne reglementeze viața, inclusiv profesională, fără implicarea critică a fiecăruia din noi.

În anul 2008 Guvernul a aprobat Planul de dezvoltare a *contabilității și auditului în sectorul corporativ* pe anii 2009-2011 cu obiectivul general - îmbunătățirea calității raportării financiare a entităților din Republica Moldova, ceea ce ar avea un impact semnificativ și pozitiv asupra economiei naționale, datorită:

1. *fortificării stabilității financiare a țării și reducerii riscului crizelor pieței financiare;*
2. contribuției la investițiile externe directe;

3. facilitării accesului întreprinderilor mici și mijlocii la credite prin micșorarea costurilor informației financiare și a dobânzilor aferente;
4. creșterii veniturilor bugetare prin colectarea impozitelor și taxelor calculate în baza informațiilor contabile;
5. *ameliorării procesului de monitorizare și exercitare a controlului asupra activității întreprinderilor de stat;*
6. creării posibilității de a evalua și a lua decizii rezonabile de către investitori privind perspectivele de dezvoltare a entităților;
7. *asigurării accesului liber al tuturor categoriilor de utilizatori la informația aferentă activității entităților, promovînd astfel dezvoltarea activă a piețelor de capital;*
8. susținerii integrării economice a statului în Uniunea Europeană (UE), atît la nivel regional, cît și la nivel global [11].

Deci din anul 2009 facem reforma contabilității în sectorul corporativ. Dar avem noi în Republica Moldova un astfel de sector și astfel de întreprinderi? Legislația țării nu ne oferă răspuns la această întrebare. Da cunoaștem despre marile corporații: Apple, Microsoft, Tesla, Visa, Nestle etc. Dar care entități din RM se încadrează în categoria similară celor numite, nu prin ghicire, dar prin reglementări normativ-legale locale? Rezultă că reforma o facem în sectorul corporativ, care nici nu-l avem. Folosim termeni improprii societății în ansamblu, cît și societății profesionale și nici nu medităm asupra acestui fapt. O fi oare vorba de o degradare profesională?

Vom menționa și unele motive de tărăgănare în reforma contabilității:

- Existența SNC și altor acte normative învechite și incomplete;
- Nivelul insuficient al mecanismului de implementare și monitorizare a actelor legislative și normative în domeniul contabilității;
- Întocmirea rapoartelor financiare potrivit formularelor tipizate care cuprind un volum considerabil de informații și, totodată, nu reflectă situația patrimonială și financiară reală a entității;
- Dezvăluirea insuficientă a informațiilor financiare de către majoritatea entităților;
- Nivelul scăzut de pregătire a cadrelor contabile în sistemul de învățămînt universitar;
- Inaccesibilitatea rapoartelor financiare pentru diferite categorii de utilizatori, inclusiv publicul larg [11].

Istoria, la momentul actual, ne demonstrează că primele SNC au fost mai calitative față de cele introduse în 2014 atît după conținut, cît și calitate, construite după o logică contabilă perfectă, ce permitea instruirea contabililor în colegii, universități potrivit unei scheme bine fundamentate, conțineau un limbaj profesional adecvat. Da, desigur unele SNC așa și nu și-au găsit obiectiv aplicare în contabilitatea moldovenească, precum SNC 19 „Beneficiile angajaților, SNC 14 „Informații financiare privind sectoarele”, SNC 22 „Combinări de întreprinderi”, SNC 26 „Contabilitatea planurilor de pensii” etc.

În ceea ce privește motivul „întocmirea rapoartelor financiare potrivit formularelor tipizate care cuprind un volum considerabil de informații și, totodată, nu reflectă situația patrimonială și financiară reală a entității”, iarăși vom contrazice. Anume astăzi în anul 2025 avem Situații financiare inferioare celor create la începutul reformei, în care este loc și de volum considerabil de informații și de o citire neadecvată a situației patrimoniale și financiare reale a entității. Formularele tipizate, care sunt menționate ca un moment negativ, reflectă în realitate faptul că contabilitatea este o știință și practică socială, derulată în scopul societății, produsul căreia este informația pentru

societate și despre societate în context național și cel internațional. Motivul reformei, precum „inaccesibilitatea rapoartelor financiare (nu e clar de ce s-au redenumit în „situații financiare”, dacă în realitate este raport fiecare document contabil final) pentru diferite categorii de utilizatori, inclusiv publicul larg”, ne face aluzii că economia moldovenească este un teatru, fiindcă doar acolo poate fi vorba real de public. Citibilitatea ultimei variante a Situațiilor financiare, face documentele inaccesibile pentru diferite categorii de utilizatori, inclusiv publicul larg.

Nivelul scăzut de pregătire a cadrelor contabile în sistemul de învățământ universitar din anul 2009 nu se compară cu nivelul din anul 2025. Actualmente acesta a degradat esențial.

În același document au fost menționate și pericolele reformei, printre care:

- Tratarea inadecvată a prevederilor reglementărilor contabile de către funcționarii publici și cadrele contabile ale entităților;
- Dificultatea de înțelegere a standardelor de contabilitate bazate pe standardele internaționale de către utilizatori, în special la etapa inițială a reformei.

Desigur reglementările contabile străine au fost greu citibile la etapa inițială a reformei contabilității, dar situația adaptării la normele internaționale în limbaj contabil autohton a fost un proces mai ușor, decât citirea SNC din 2014, care au o construcție lingvistică străină societății noastre.

În anul 2010 Planul de dezvoltare a contabilității și auditului în sectorul corporativ a fost revizuit și extins după termen potrivit Hotărârii Guvernului cu privire la aprobarea Planului de dezvoltare a contabilității și auditului în sectorul corporativ pe anii 2009-2014 [12], în perioada căruia au fost elaborate noile SNC în baza Directivei 2013/34/UE și noul Plan general de conturi contabile.

Potrivit Planului menționat Ministerul finanțelor a acceptat pentru activare în sistemul profesional contabil și a publicat Codului etic [13] cu aplicare din 2012 și abrogare a actului precedent de reglementare a aspectului etic contabil [12].

Actualmente în Republica Moldova se aplică Codul Etic Internațional pentru Profesioniștii Contabili (inclusiv Standardele Internaționale privind Independența) (Codul IESBA), ediția 2023, elaborat de Consiliul pentru Standarde Internaționale de Etică pentru Contabili (IESBA) din cadrul Federației Internaționale a Contabililor (IFAC) și cuprinde principiile fundamentale de etică cu care trebuie să se conformeze toți profesioniștii contabili [3].

În primul rând sunt probleme de conștientizare legate de calificativul „profesioniștii contabili”. E complicat de urmărit, în 125 de pagini ale manualului care explică Codul etic, varietățile profesionale etice pentru *Profesionistul contabil* care poate fi:

- O persoană care este membră a unui organism membru IFAC;
- Profesionist contabil practician;
- Profesionist contabil cu drept de practică;
- Profesionist contabil practician cu experiență.

În logica noastră nu se încadrează că *profesioniștii contabili* practicieni cu experiență pot fi *directori, alți angajați cu funcție de conducere sau salariați cu experiență care au capacitatea de a exercita o influență semnificativă asupra achiziției, repartizării și controlului resurselor umane, financiare, tehnologice, fizice și intangibile ale organizației angajatoare și de a lua decizii legate de acestea*. Atestăm diferite viziuni profesionale etice și neetice. Logic contabilitatea e văzută diferit de la un sistem sau model contabil la altul (Figura 1).

Factorii			
1) Tipul creditorilor și investitorilor ca utilizatori principali ai informației contabile (persoane fizice, bănci, organele statale); 2) Numărul persoanelor fizice și juridice implicate în procesul investirii capitalului; 3) Participarea investitorilor în managementul afacerilor; 4) Gradul de dezvoltare a pieței și bursei de valori; 5) Nivelul participării în businessul internațional.			
determină modelul contabil aplicat [14, p. 23; 1, p. 9]			
Anglo-saxon	Continental	Sud-american	Islamic

Figura 1. Factorii determinanți ai conturării modelelor contabile

Sursa: elaborat de autor

Consiliul pentru Standarde Internaționale de Etică pentru Contabili® (IESBA®) *este un organism global de elaborare de standarde independent*, care deservește interesul public prin elaborarea de standarde de etică (inclusiv independență) de înaltă calitate, ca piatră de temelie pentru comportamentul etic în afaceri și organizații și pentru încrederea publicului în informațiile financiare și non-financiare, care sunt fundamentale pentru buna funcționare și durabilitate a organizațiilor, piețelor financiare și economiilor din întreaga lume [3].

Standardele internaționale transparente și de înaltă calitate sunt piloni esențiali ai arhitecturii globale privind raportarea externă. Adoptarea și implementarea acestora îmbunătățesc disponibilitatea informațiilor financiare și nefinanciare de înaltă calitate pentru părțile interesate, investitori și public, susținând încrederea și siguranța în raportarea și asigurarea externă și o creștere economică mai mare [3].

Ținând cont de faptul că în *modelul contabil anglo-saxon* situațiile financiare sunt considerate principala sursă de informații pentru investitori și creditori, în cel *continental* specificul contabilității se explică prin doi factori: orientarea afacerii către capitalul bancar mare și respectarea cerințelor autorităților fiscale, în *modelul sud-american* trăsătura distinctivă este orientarea contabilității către nevoile agențiilor guvernamentale pentru desfășurarea politicii fiscale [15, p. 294], iar în cel *islamic* accentul social al contabilității este unul primordial, constatăm că în Republica Moldova e conturat un *model contabil sinergetic*. Și apare întrebarea: ne putem noi oare încadra în arhitectura globală privind raportarea externă construită de organismul global de elaborare de standarde independent?

Răspunsurile etice le putem găsi în Codul etic internațional pentru profesioniștii contabili [3], analizând punctele acestuia.

100.1 O caracteristică distinctivă a profesiei contabile este asumarea responsabilității de *a acționa în interesul public*.

Interesul public o fi legat de bunăstarea societății?

100.2 Încrederea în profesia contabilă reprezintă motivul pentru care persoane juridice, guverne și alte organizații implică profesioniști contabili într-o gamă largă de domenii, inclusiv raportare financiară și corporativă, servicii de asigurare și alte activități profesionale. Profesioniștii contabili înțeleg și recunosc că această încredere se bazează pe competențele și valorile pe care aceștia le includ în desfășurarea activităților profesionale. Printre acestea se numără:

(a) Respectarea principiilor de etică și a standardelor profesionale,

- (b) *Aplicarea discernământului comercial,*
- (c) *Aplicarea competenței în probleme tehnice sau de altă natură și*
- (d) *Exercitarea raționamentului profesional.*

Ce o fi competența și valoarea - aplicarea discernământului comercial?

Iată și răspunsul referitor la aplicarea formală a Codului Etic IFAC. Sunt probleme de neînțelegere conceptuală a tratamentelor, probleme de acceptare a valorilor profesionale. Deaceia la crearea și implementarea în practică a unui Cod etic e necesar de a ține cont de specificul național. Avem nevoie de un Cod etic, care ar ridica cultura profesională contabilă, în care accentul trebuie pus pe *patriotismul profesional, demnitatea profesională și identificarea profesională*. Sistemul educațional e cel care, nu în ultimul rînd, poate contribui la însușirea de către contabili a sentimentului devotamentului față de profesie și propria țară, astfel contribuind la majorarea bunăstării societății și nu doar a publicului restrîns sau larg.

Concluzii

1. Fundamentul oricărei profesii a fost, este și va fi etica profesională. Principiile fundamentale de etică la nivel internațional pentru profesioniștii contabili în derularea activității sunt stabilite prin Codul etic internațional pentru profesioniștii contabili, elaborat de Consiliul pentru Standarde Internaționale de Etică pentru Contabili (IESBA) care constituie un organism independent de normalizare.

2. Problemele eticii profesionale contabile derivă din situația eticii societății. În contextul în care globalizarea proceselor sociale și economice afectează conturarea modelelor moral-etice ale societății, statelor, entităților, antreprenorilor, profesioniștilor, care nu atestă o unificare care s-ar dori, considerăm necesară crearea unei politici proprii statale în domeniul eticii profesionale contabile. Codul menționat în aplicare locală ridică probleme de ordin diferențiat conceptual, motivațional profesional contabil, nemaivorbind de cea lingvistică.

3. Precum toate activitățile contabilitatea trebuie să se bazeze pe o politică de etică bine structurată, concretă, logică, științifică, deslușită, clară, înțeleasă, care să dezvolte patriotismul profesional, demnitatea profesională și identificarea profesională.

4. Actul normativ aferent eticii contabile trebuie elaborat de organele statului în funcție de modelul moral-etice al societății.

5. Legea contabilității și raportării financiare nr. 287 din 15.12.2017, Standardul ocupațional Contabil, Standardul Național de Contabilitate „Politici contabile, modificări ale estimărilor contabile, erori și evenimente ulterioare” trebuie completate cu reglementări aferente eticii contabile profesionale.

Referințe

1. МИСЛАВСКАЯ, Н. А. Институционализация, универсализм и перспективы развития бухгалтерского знания. Учёт. Анализ. Аудит. 2019, Т. 6, № 2, сс. 6-10. ISSN 2408-9303 (Print). ISSN 2619-130X (Online). DOI: 10.26794/2408-9303-2019-6-2-6-10.
2. Instrumentul Bibliometric Național.
https://ibn.idsi.md/ro/ibn_search_result?data_search_0=etica+profesionala&metadata_0=key_title_abstract&from=1998&to=2025
3. Manualul Codului etic internațional pentru profesioniștii contabili.
https://www.mf.gov.md/sites/default/files/legislatie/2023%20IESBA%20HB_RO_Secure.pdf ISBN 978-606-580-105-9.

4. BULGARU, M. Etica profesională – o necesitate pentru activitatea de succes a specialistului. *Studia Universitatis Moldaviae. Seria „Științe sociale”*. 2018, nr. 3(113), pp. 193-202. ISSN 1814-3199, ISSN online 2345-1017.
5. <https://chatgpt.com/>
6. Legea contabilității și raportării financiare nr. 287 din 15.12.2017. În: Monitorul Oficial al Republicii Moldova nr. 1-6/399 din 05.01.2018.
7. Standardul ocupational Contabil, aprobat prin Ordinul Ministrului Finanțelor nr. 131 din 28.10.2021. În: Monitorul Oficial al Republicii Moldova nr. 266-272 din 05.11.2021.
8. Standardul Național de Contabilitate „Politici contabile, modificări ale estimărilor contabile, erori și evenimente ulterioare”, aprobat prin Ordinul Ministerului Finanțelor al Republicii Moldova nr. 118 din 06.08.2013, modificat prin Ordinul Ministerului Finanțelor al Republicii Moldova nr. 48 din 12.03.2019. În: Monitorul Oficial al Republicii Moldova nr. 233-237 din 22.10.2013, Monitorul Oficial al Republicii Moldova nr. 101-107 din 22.03.2019.
9. Hotărârea Guvernului Republicii Moldova cu privire la reforma contabilității Nr. 1187 din 24.12.1997. În: Monitorul Oficial Nr. 88-91 din 30.12.1997.
10. Ordinul Ministerului Finanțelor cu privire la aprobarea și punerea în aplicare a Codului privind conduita profesională a auditorilor și contabililor din Republica Moldova Nr. 29 din 01.03.2001. În: Monitorul Oficial Nr. 29-30 din 15.03.2001 (abrogat).
11. Hotărârea Guvernului cu privire la aprobarea Planului de dezvoltare a contabilității și auditului în sectorul corporativ pe anii 2009-2011 Nr. 1507 din 31.12.2008. În: Monitorul Oficial Nr. 10-11 din 23.01.2009.
12. Hotărârea Guvernului cu privire la aprobarea Planului de dezvoltare a contabilității și auditului în sectorul corporativ pe anii 2009-2014 Nr. 1507 din 31.12.2008, modificat prin Hotărârea Guvernului Nr. 717 din 10.08.10. În: Monitorul Oficial Nr. 148-149 din 17.08.2010.
13. Ordinul Ministerului Finanțelor privind acceptarea și publicarea Standardelor de audit și Codului etic Nr. 64 din 14.06.2012. În: Monitorul Oficial Nr. 177-180 din 24.08.2012.
14. МЮЛЛЕР, Г., ГЕРНОН, Х., МИИК, Г. Учет: международная перспектива: Пер с англ. М.: Финансы и статистика, 2003. 136 с. ISBN 5-256-09089-0, 5-279-02179-2.
15. КРЮКОВА, Т. Ю. Теоретические основы формирования бухгалтерского учета и отчетности в зарубежной практике. Проблемы экономики и юридической практики. 2011, №. 3, сс. 293-299.

MOLDOVAN'S LABOR MARKET AS A DRIVER OF EMIGRATION

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Abstract

The persistent emigration of Moldovan workers poses significant challenges to the nation's socio-economic development. Research findings reveal that the influence of Moldova's labor market conditions on emigration patterns is substantial. The study indicates that economic disparities, including low wages, limited job opportunities, and a lack of career progression, act as significant "push" factors. The research identifies critical shortages of skilled labor in Moldova resulting from emigration and a skills mismatch in the local labor market, exacerbated by inadequate training programs. While policies and initiatives exist to address these issues, inconsistent policy enforcement hinders their effectiveness. These results underscore the need for a comprehensive strategy focused on sustainable development, improved education and training, robust labor policy implementation, and targeted diaspora engagement. Failure to address these systemic challenges risks a continued decline in the nation's workforce and further impedes economic growth. Furthermore, the loss of skilled workers undermines the country's ability to innovate and compete on a global scale. Long-term planning and commitment are essential to reversing these trends and ensuring a prosperous future for Moldova.

In conclusion, this research emphasizes that a multifaceted and sustained effort is critical to transform Moldova's labor market, mitigate emigration pressures, and secure long-term economic stability and growth. It requires not only policy changes but also a cultural shift toward prioritizing workforce development and creating opportunities that retain and attract talent.

Keywords: labor market, emigration, job opportunities, low wages, economic growth

JEL: J11, J21, F22

Introduction

The Republic of Moldova faces a persistent challenge: significant population decline fueled by emigration, a trend exacerbated by global economic forces and internal vulnerabilities. While globalization has opened new trade avenues, it has also highlighted the stark income disparities between Moldova and wealthier nations, creating a powerful pull factor for its citizens seeking better opportunities. This isn't simply a matter of individuals seeking higher wages; it represents a broader systemic issue impacting the country's long-term development.

Literature review

The scholarly investigation of population migration boasts a rich history extending over a century, encompassing diverse theoretical perspectives and empirical analyses. This research draws upon a broad foundation of work by Moldovan, Russian, and international scholars, building on the contributions of key figures such as E.G. Ravenstein, whose early laws of migration continue to inform contemporary understanding, and more recent Moldovan researchers like V. Moshnyaga, T. Tabak, K. Etsko, G. Gorbunova, V. Moraru, and V. Turcan. These researchers, amongst others, offer valuable insights into the complexities of migration, moving beyond simplistic models to explore the multifaceted dimensions of this global phenomenon. Their work encompasses a wide range of analytical approaches, encompassing the socio-economic drivers of migration, the impact of government policies on both emigration and immigration, the experiences of migrants themselves, and the evolving geopolitical contexts that shape migration patterns. In particular, the studies focusing on Moldova's migration flows offer invaluable data and insights into the unique challenges and opportunities presented by this specific national context, including an examination of both the push and pull factors driving emigration, and the long-term consequences of emigration for the Moldovan population and its economy. This research integrates these diverse perspectives to develop a nuanced understanding of the complexities of migration.

Methods of research

This research employed a combination of economic, statistical, political, systemic, and comparative analytical approaches.

Results and discussions

The ease of migration within the region contributes to the outflow. Proximity to Romania and the European Union offers relatively affordable relocation options for Moldovans seeking employment and improved living standards. This geographical advantage facilitates emigration, making it a more accessible choice than migrating to more distant countries like the USA or Canada, which require significantly greater financial and logistical resources. Nevertheless, the lure of higher earning potential and perceived better opportunities in these distant locations does attract a segment of the population. The financial, geographical, and linguistic barriers associated with long-distance migration influence the choices made, but do not negate the underlying economic pressures pushing people to emigrate.

The scale of the population decline is alarming. The reported decrease of 220,000 people in just five years (from 2.64 million to 2.42 million) (National Bureau of Statistics of the Republic of Moldova, 2024) represents a significant loss for a small country like Moldova. This demographic shift isn't solely attributable to low birth rates; mass emigration is a primary driver. While low birth rates and limited immigration contribute, the severity of the decline underscores the urgent need to address the underlying economic and political instability that compels citizens to seek opportunities elsewhere. The factors causing emigration are complex and interconnected, extending beyond simple economic indicators. Factors such as perceived lack of political stability, limited access to quality healthcare and education, and a lack of confidence in the future contribute significantly to the decision to leave.

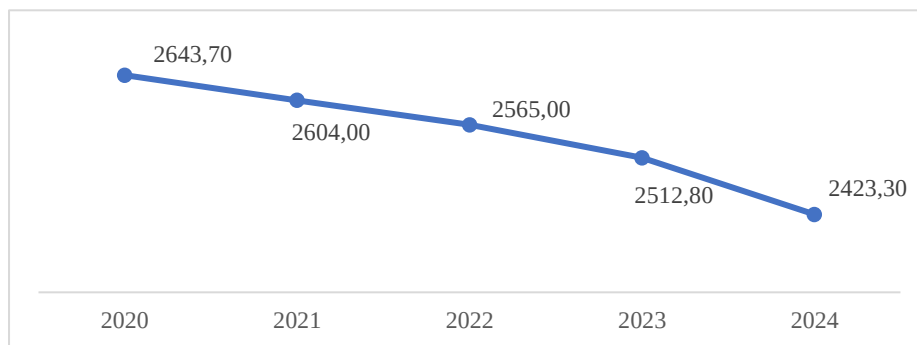


Figure 1. Population with usual residence in the Republic of Moldova, 2020-2024, mln. people

Source: National Bureau of Statistics of the Republic of Moldova. Moldova in figures: Statistical summary, 2024

The economic data for the first half of 2024, while showing some growth in specific sectors, does not fully alleviate the concerns. Growth in certain industries must translate into widespread job creation and improved living standards to effectively counter the pressure to emigrate. Addressing the structural weaknesses within the economy, improving the investment climate, and fostering economic diversification are crucial steps to retaining the country's human capital and securing its future. A comprehensive approach is needed, addressing not only economic factors but also political stability, social development, and opportunities for all citizens to ensure a brighter future within Moldova itself.

Moldova's economic performance during the first six months of 2024 reveals a complex interplay of growth and stagnation across various sectors. The national economy expanded modestly, with a 2.2% increase in Gross Domestic Product (GDP) compared to the same period in 2023, reaching a total of 142.2 billion lei. However, this overall growth masks significant variations in performance across different economic activities (National Bureau of Statistics of the Republic of Moldova, 2024).

Key drivers of this expansion included a robust performance in the domestic market, demonstrating a 5% increase in value added. Further contributing to this positive trend were substantial gains in the energy sector (22.3%), the information and communication technology sector (6.9%), manufacturing (6.2%), finance and insurance (7%), agriculture (6%), and construction (3.9%). This diverse yet uneven growth highlights the need for a more balanced and resilient economic structure.

Conversely, the expansion was hampered by notable declines in several key sectors. Transport and storage experienced a sharp contraction of 10.9%, alongside decreases in real estate transactions (-4.6%), health and social services (-1.5%), and the arts and entertainment industries (-5.1%). This uneven performance underscores the need for targeted policy interventions to support lagging sectors and ensure a more stable economic landscape.

Analyzing the expenditure side of the GDP reveals a similar pattern of divergence. Household consumption and investment in fixed assets contributed significantly to growth, rising 2.6% and 5.9% respectively. This reflects a degree of consumer confidence and private sector activity. However, this positive trend is counterbalanced by a 4% decrease in net exports and government consumption, pointing to potential weaknesses in external trade and public spending.

The industrial sector showed signs of recovery, with an overall production volume increase of 0.7% during the first half of the year. This modest recovery was largely driven by the energy sector (4.2%) and the extractive industries (4.7%). However, manufacturing output experienced a slight decline of 0.2%, with several sub-sectors, including footwear, woodworking, textiles, food processing, and automotive parts, reporting negative growth. In contrast, positive performance was seen in metallurgy, printing, chemicals, metal construction, and furniture manufacturing, showcasing uneven growth within the industrial sector.

The retail trade sector performed strongly, indicating strong consumer demand. Retail sales grew by 11.6%, services to the population surged by 18.8%, and services to businesses saw a 4.8% increase. Wholesale trade, however, remained in decline (-1.7%), albeit at a slower pace than in the previous year. The increased trade volumes positively impacted transport services, with goods transportation rising by 8.2% and passenger transport by 5.8%.

Private investment demonstrated a tentative recovery, with investment in fixed assets increasing by 1.7% to 12.6 billion lei. Companies' own investments increased significantly (13.1%) due to supportive government policies. Road fund investments also experienced strong growth (32.3%). Conversely, investment funded through foreign and domestic loans and public budget allocations continued to decline (-56.1%, -16.5%, and -12.3% respectively). This points to challenges in attracting and securing external and domestic funding sources. Overall, the Moldovan economy shows signs of resilience but faces considerable challenges that require thoughtful policy responses to foster a more robust and balanced economic structure.

Inflation remained within the central bank's target range, closing at 3.8% year-on-year in June 2024, a result influenced by several countervailing pressures. Factors contributing to this relatively stable inflation rate include controlled domestic demand, the benefit of a strong harvest in the preceding year, lower utility costs, and a strengthening of the national currency against the Euro (National Bureau of Statistics of the Republic of Moldova, 2024).

The Moldovan leu demonstrated a mixed performance against international currencies. Although showing a modest decline against the US dollar, the currency appreciated in value against the Euro, signaling some resilience in the face of global economic uncertainty. The national bank's foreign currency reserves, while slightly down from year-end figures, remained at a healthy level, suggesting adequate capacity to manage potential exchange rate fluctuations.

Recent monetary policy adjustments are beginning to have a discernible impact on the financial system. Lower interest rates have stimulated a noticeable increase in credit demand, reflected in a substantial rise in new loans during the first six months of the year. The expanded

credit availability, however, has been accompanied by a decrease in new term deposits, suggesting a shift in the preferences of depositors.

However, some warning signs are apparent in the external sector. The current account deficit widened considerably, driven by a combination of increased domestic demand and a decrease in remittances. This negative trend highlights the ongoing need for policies that strengthen export competitiveness and attract foreign investment. The decline in foreign direct investment is particularly noteworthy, indicating challenges in attracting long-term capital inflows.

Positive labor market trends emerged, with average monthly wages showing a considerable increase. Nominal wage growth exceeded 15%, translating to real terms increase of approximately 10.8%, reaching an average of 13,622.1 lei (approximately €709 or \$767). This improvement was observed across both the public (a 12% real increase) and private sectors (a 10.4% real increase), although the disparity between public and private sector wages remains. This increase, however, needs to be viewed in relation to the cost of living.

Average monthly pensions also received a boost, rising by 7.8% to 3,950.7 lei.

The unemployment situation demonstrated a modest improvement, with the number of unemployed individuals declining by 1.7% compared to the same period the previous year, to around 34,900. However, the unemployment rate remained relatively unchanged at 3.9%, suggesting that underlying structural issues persist within the labor market. A contrasting trend is revealed in registered unemployment figures, which decreased by a significant 36.6% – possibly due to a move towards informal employment.

The cost of living, as measured by the subsistence minimum, increased by a nominal 2% to an average of 2,926 lei per month, though this was offset by inflation resulting in a 1.8% decrease in real terms (Report on the socio-economic evolution of the Republic of Moldova in the first semester of 2024).

Analyzing all this situation a conclusion can be drawn: Moldova's economic performance in the first half of 2024 presents a complex picture, marked by uneven growth and underlying vulnerabilities that pose significant challenges for the nation's future. While the reported GDP increase offers a superficially positive outlook, a closer examination reveals a fragile situation susceptible to external shocks and internal weaknesses.

The modest expansion is not uniformly distributed across all sectors. Certain areas, such as energy and technology, exhibit robust growth, potentially masking deeper problems in other crucial areas that are contracting. Moldova's economic foundation is fragile, excessively concentrated in a few key industries. This dependence creates significant vulnerability to economic shocks. While domestic consumption is rising, the lack of substantial investment foreign or domestic casts doubts on the long-term sustainability of this growth. This points to a lack of confidence in Moldova's economic future, a critical factor demanding immediate attention. The country's reliance on external financing leaves it exposed to global economic volatility and limits its capacity for self-sustaining growth. Attracting stable, long-term investment is paramount. Future economic scenarios are uncertain, ranging from continued (though precarious) growth driven by domestic spending to a potential decline, if necessary, reforms are not undertaken. The absence of long-term investment and the weakness in certain sectors could exacerbate existing challenges, leading to a more serious economic downturn with potentially severe social consequences. Moldova needs to address its economic vulnerabilities through decisive policy action to diversify its economy, improve the investment climate, and build greater resilience.

Without a comprehensive and strategic approach, Moldova faces the risk of long-term economic stagnation and potentially severe social consequences. The economic reveals a mixed picture influencing emigration patterns. While some sectors show growth, suggesting potential for job creation and improved living standards, significant challenges remain that could continue to drive people abroad.

Positive indicators, such as increased retail sales and modest GDP growth, hint at a possible improvement in the overall economic climate. Furthermore, expansion in certain key sectors like energy, IT, and agriculture could eventually create more jobs and opportunities. However, these gains are currently offset by several negative trends.

The contraction in key manufacturing sub-sectors, such as footwear and clothing production, points to substantial job losses and a lack of diversified economic activity. This economic vulnerability is exacerbated by a sharp decline in foreign investment, which directly limits job creation potential and further discourages domestic entrepreneurship. The sluggish performance in sectors like transport and real estate further adds to the unemployment problem.

Therefore, despite some signs of economic recovery, the overall impact on emigration remains complex. While improved economic conditions could potentially retain some, the persistent weaknesses in several key industries, coupled with low wages and limited opportunities, particularly for young and skilled workers, likely will sustain significant emigration. Long-term solutions require broader economic diversification and policies that stimulate job creation and improve the investment climate. Furthermore, non-economic factors like political stability and access to quality social services play a critical role, and should not be overlooked when assessing the drivers of emigration.

A comprehensive analysis of Moldova's socio-economic indicators reveals a strong correlation between the quality of life and the persistent high levels of emigration. The country's economic challenges continue to force many citizens to seek opportunities abroad, highlighting the urgent need for comprehensive policy interventions.

Standard of living encompasses the overall well-being of a population, reflecting their access to goods and services and the extent to which their basic needs are met. It's fundamentally tied to per capita income and the resulting consumption patterns. A robust understanding of a nation's standard of living requires examining a range of interconnected factors.

Key indicators providing a comprehensive picture include birth and death rates, life expectancy, sanitation levels, food consumption patterns, housing conditions, access to education and cultural opportunities, labor conditions and employment levels, income and expenditure balances, consumer prices, transportation availability, recreational opportunities, social security provisions, and the extent to which human rights and freedoms are ensured.

A crucial element in evaluating standard of living is per capita income (table 1), representing the financial resources available to individuals for consumption and investment. This income stream typically reflects an individual's ownership of the factors of production. Individuals providing labor receive wages or salaries; owners of capital receive profits or dividends; and those owning land or other natural resources generate income through rent or royalties. Table 1 reveals that the highest average wages are found in the Information and Communication sector, at approximately 30,509.2 lei. Financial and Insurance Activities follow closely, with average earnings of 23,910.2 lei. Professional, Scientific, and Technical Activities rank third, averaging 14,293.0 lei. The lowest average wages are observed in Accommodation and Food Service Activities.

The distribution of these resources and the resulting disparity in income levels significantly impact overall standard of living. Furthermore, access to credit and financial services plays a crucial role, as does the degree of social safety nets available to those who may be vulnerable to economic shocks or require assistance. Therefore, understanding a nation's standard of living requires a holistic view that goes beyond simple averages and considers the distribution of wealth and the social structures that underpin it.

Table 1. Average wages of Moldovan citizens by sector for 2020-2023

	2020	2021	2022	2023
Agriculture, Forestry, and Fishing	5 167,3	5691,1	6700,7	7982,9
Industry	7 673,6	8242,0	9541,2	11 210,6
Construction	7 728,1	8136,5	9363,0	10 564,6
Wholesale and Retail Trade	7 346,4	7609,9	8960,6	11 152,2
Transportation and Storage	6 647,3	7201,2	8794,9	10 833,3
Accommodation and Food Service Activities	5 105,7	5249,9	6320,5	7676,4
Information and Communication	18 685,3	22 137,7	27 775,8	30509,2
Financial and Insurance Activities	14 555,0	15 746,9	19 795,9	23910,2
Real Estate Activities	6 587,7	7231,1	8180,3	9788,7
Professional, Scientific, and Technical Activities	10 378,1	10 498,9	12 035,1	14293,0
Administrative and Support Service Activities	6 273,7	6 733,3	7 725,9	9525,4
Public Administration and Defense; Compulsory Social Security	9 769,4	10 501,3	12 054,3	13859,7
Education	7 023,3	7 462,3	8 445,5	10 046,2
Health and Social Work	8 718,9	11 109,1	11 729,7	13 647,5
Arts, Entertainment, and Recreation	5 752,8	6269,1	7 310,1	9071,7
Total	8 107,5	8979,8	10 447,3	12 354,7

Source: National Bureau of Statistics of the Republic of Moldova. Living standard of the population.

Available: https://statistica.gov.md/ro/statistic_indicator_details/3

The ongoing economic difficulties are a significant driver of this emigration. While average wages have shown nominal growth (table 2), the cost of living continues to rise, resulting in limited increases in disposable income. Monthly spending averaged 4,228.4 lei in 2023, showing that food and non-alcoholic beverages consumed the greatest share of household budgets (39,7%). Housing, water, electricity, gas, and other fuels constituted the second largest expense category (17,6%). Expenditure on education made up the smallest portion of household budgets (1,2%), impacting the overall development of the nation. According to the National Bureau of Statistics, average consumer prices in September 2024 increased by approximately 0.5% compared to August 2024 and by around 5.0% compared to December 2023. The rise in average consumer prices was primarily driven by increases in food prices (approximately 1.5%, contributing 0.5% to the overall increase) and prices for consumer services (around 0.4%, contributing 0.1% to the overall increase) (National Bureau of Statistics of the Republic of Moldova. Consumer price indices in the Republic of Moldova in September 2024).

Table 2. Household consumption expenditure, 2020-2023

	2020	2021	2022	2023
Total household consumption expenditure, average monthly per capita (lei)	2791,2	2039,5	3711,9	4248,4
including % for:				
Food and non-alcoholic beverages	43,5	41,9	41,1	39,7
Alcoholic beverages and tobacco	2,0	2,0	1,7	1,7
Clothing and footwear	8,8	9,1	8,4	7,8
Housing, water, electricity, gas and other fuels	16,1	15,2	16,3	17,6
Furniture, household equipment and maintenance	5,6	5,7	5,8	5,3
Health	4,7	5,7	5,1	4,4
Transport	5,5	6,5	7,4	7,0
Telecommunications	4,7	4,5	4,0	4,3
Recreation and culture	2,4	2,1	2,6	3,0
Education	0,8	1,0	0,9	1,2
Restaurants and hotels	2,0	2,2	2,2	3,2
Miscellaneous goods and services	4,1	4,2	4,5	4,8
Average monthly per capita cash consumption expenditure (lei)	2571,5	2822,3	3437,8	3978,7

Source: National Bureau of Statistics of the Republic of Moldova. Population incomes and expenditures in 2023.

Available: https://statistica.gov.md/ro/veniturile-si-cheltuielile-populatiei-in-anul-2023-9442_61079.html

This squeeze on household budgets, compounded by factors such as limited access to quality healthcare, education, and social services, contributes to the perception that opportunities for a better life are significantly better elsewhere.

The impact extends beyond the purely economic. The outflow of Moldovan citizens is a multifaceted problem, impacting not only the economy but also social cohesion and future development. Limited job security and career prospects contribute to a sense of uncertainty, driving emigration. This "brain drain" further undermines economic growth, perpetuating the cycle. The geographical proximity to wealthier EU states, particularly Romania, makes leaving relatively easy. The perception of improved living standards and greater opportunities abroad acts as a powerful incentive. Combating this requires a multi-pronged approach: bolstering economic growth, diversifying the economy, and creating more jobs. Simultaneously, investing in social services, education, and healthcare is vital. Promoting entrepreneurship and innovation, while simultaneously strengthening democratic institutions and tackling corruption, is essential. Addressing this requires systemic change not just temporary measures to create a more equitable and prosperous Moldova capable of retaining its citizens.

Moldovan emigration is deeply intertwined with the dynamics of household spending and the affordability of essential goods and services. The relationship isn't simply about stark poverty; it's a complex interplay between income, prices, and aspirations. When the cost of daily living consistently outpaces income growth, Moldovans increasingly perceive limited prospects for a comfortable life at home, fueling the decision to seek better opportunities abroad.

This isn't just about basic needs; it's about aspirations. Even households with sufficient income for essentials may opt to leave if they perceive a stagnant or declining quality of life, or if

their financial resources are largely consumed by necessities, leaving little for discretionary spending. This perception is directly shaped by the ability to fulfill their desired lifestyle – the goods and services they consider essential to a good life.

Significant price hikes, especially for necessities such as food, energy, and housing, directly impact household budgets. A larger portion of income is redirected towards basic needs, shrinking the amount available for other expenses. This financial pressure, particularly for vulnerable families, increases the appeal of seeking economic stability elsewhere. Simultaneously, inflation eats away at savings, further reducing the capacity for individuals to meet their aspirations within the country.

The ramifications extend beyond individual finances. Reduced consumer spending weakens overall domestic demand, potentially leading to business contractions and job losses, creating a vicious cycle that pushes more people toward emigration. The inability to achieve their desired standard of living within the country becomes a major factor in the decision to leave.

Comparative affordability in neighboring countries also influences choices. If equivalent goods and services are demonstrably cheaper or higher in quality abroad, this differential directly impacts consumption choices and significantly adds to the appeal of relocation.

In short, understanding Moldovan emigration requires analyzing the interplay of price pressures, household spending patterns, and broader economic conditions. Effective solutions necessitate a comprehensive strategy that addresses not only price stability, but also income levels, job creation, and access to essential goods and services. Only a holistic approach can foster a prosperous economy and create a future where Moldovans can thrive at home.

Conclusion

To draw a conclusion, it can be said that Moldova's population exodus is a direct result of its persistent economic struggles. This study demonstrates a clear correlation between low living standards and emigration, highlighting the burden of low wages, high costs of living, and inadequate social support on Moldovan households. The exodus of skilled labor and younger generations imperils future economic growth. Insights from qualitative data provide a detailed look at an individual's motivations for emigrating. This all contributes to a repeating pattern of economic decline. Effective remedies necessitate a multi-pronged tactic, with fiscal changes to spark expansion, strong welfare initiatives to elevate living conditions, and policies aimed at preserving local talent. Only with profound, across-the-board reform can Moldova forge a better and wealthier path for its citizenry.

References

1. Moldova in figures : Statistical summary / National Bureau of Statistics of the Republic of Moldova ; editorial board: Oleg Cara (president) [et al.]. – Chișinău : [S. n.], 2024 – . – (Statistica Moldovei / National Bureau of Statistics of the Republic of Moldova, ISBN 978-9975-53-418-5). – ISBN 978-9975-177-27-6. Available: https://statistica.gov.md/files/files/publicatii_electronice/Moldova_in_cifre/2024/Moldova_figures_2024.pdf
2. National Bureau of Statistics of the Republic of Moldova. Consumer price indices in the Republic of Moldova in September 2024. Available: https://statistica.gov.md/ro/indicii-preturilor-de-consum-in-republica-moldova-in-luna-9485_61485.html
3. National Bureau of Statistics of the Republic of Moldova. Inflation rate. Available: https://statistica.gov.md/ro/preturi-9487_4595.html

4. National Bureau of Statistics of the Republic of Moldova. Living standard of the population. Available: https://statistica.gov.md/ro/statistic_indicator_details/3
5. National Bureau of Statistics of the Republic of Moldova. National accounts. Available: https://statistica.gov.md/en/statistic_indicator_details/12
6. National Bureau of Statistics of the Republic of Moldova. Population incomes and expenditures in 2023. Available: https://statistica.gov.md/ro/veniturile-si-cheltuielile-populatiei-in-anul-2023-9442_61079.html
7. Raport privind evoluția social-economică a Republicii Moldova în semestrul I 2024. Available: https://mded.gov.md/wp-content/uploads/2024/10/Raport_2024_T2.pdf

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THE CONTRIBUTION OF COOPERATIVES TO SOCIO-ECONOMIC DEVELOPMENT: CHALLENGES AND PERSPECTIVES

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Abstract

This article analyzes the importance of cooperatives in global, regional, and national contexts, highlighting their impact on sustainable socio-economic development. As an economic model, cooperatives significantly contribute to meeting members' needs while promoting an inclusive and equitable economy. The study examines the historical evolution of the cooperative movement, their structural and operational mechanisms, and successful models implemented across various economic sectors, including agriculture, commerce, finance, and healthcare. It also emphasizes the role of cooperatives in addressing global challenges such as economic instability, climate change, and social inequality. The research underlines how cooperative models adapt to modern changes and maintain their relevance in an ever-evolving global landscape. Through this analysis, it is confirmed that cooperatives can serve as fundamental pillars in building a more sustainable and equitable global future.

Keywords: cooperatives, sustainable development, socio-economic impact, cooperative movement, social innovation, social and solidarity economy, social responsibility, global economic challenges

JEL: A01, G47, S85, M74, Q84, Z94

Introducere

Cooperativele joacă un rol esențial în asigurarea dezvoltării durabile, fiind un model flexibil și sustenabil care poate face față provocărilor contemporane, precum instabilitatea economică, inegalitatea socială, schimbările climatice și vulnerabilitatea comunităților. Spre deosebire de organizațiile tradiționale cu scop lucrativ, cooperativele se concentrează nu doar pe profit, ci și pe satisfacerea nevoilor membrilor lor, promovând astfel o economie incluzivă și echitabilă. Prin natura lor, cooperativele se bazează pe principiile solidarității, auto-organizării și responsabilității sociale, fiind un instrument important pentru dezvoltarea socio-economică la nivel global, regional și local.

La nivel mondial, cooperativele operează cu succes în diverse sectoare, precum agricultură, finanțe, comerț, sănătate și energie, demonstrând flexibilitate și capacitatea de a se adapta rapid la schimbările economice și sociale. Impactul acestora asupra dezvoltării durabile este semnificativ, contribuind nu doar la crearea de locuri de muncă decente și creșterea economică, dar și la protecția mediului și la promovarea unui consum responsabil. În acest context, studiul mișcării cooperative devine crucial pentru identificarea modelor eficiente de creștere durabilă și a soluțiilor la provocările actuale.

Scopul acestui studiu este de a analiza semnificația, domeniul de aplicare și contribuția cooperativelor la dezvoltarea socio-economică în diferite colțuri ale lumii. Principalele obiective ale studiului sunt:

- Monitorizarea evoluției istorice a mișcării cooperative și transformările sale.
- Analiza modelelor moderne de cooperative din diverse țări și regiuni.
- Studiul contribuției socio-economice a cooperativelor la dezvoltarea durabilă.
- Evaluarea condițiilor juridice și instituționale pentru funcționarea cooperativelor.
- Identificarea principalelor provocări și perspective ale mișcării cooperative în secolul XXI.

Metodologia de cercetare. Metode și materiale utilizate

În cadrul acestui studiu, sunt utilizate următoarele metode de cercetare pentru a analiza și evalua contribuția cooperativelor la dezvoltarea socio-economică:

- **Analiza istorică și logică:** studierea evoluției mișcării cooperative în diferite perioade istorice.
- **Analiza comparativă:** compararea activităților cooperativelor din diferite țări și regiuni.
- **Metoda statistică:** evaluarea amplitudinii și eficienței cooperativelor pe baza datelor statistice naționale.
- **Analiza literaturii științifice:** identificarea abordărilor teoretice și problemelor existente în studiile anterioare.

Rezultate și discuții

Istoria cooperativelor și impactul acesteia asupra mișcării cooperative moderne

Apariția mișcării cooperative: Mișcarea cooperativă a luat naștere în secolul al XVIII-lea ca un răspuns direct la schimbările socio-economice provocate de Revoluția Industrială. Primele

cooperative au fost formate de muncitori și mici producători, care, confrunțați cu dificultăți economice și condiții de viață precare, au decis să colaboreze pentru a găsi soluții comune. Scopul acestora era de a îmbunătăți condițiile economice și sociale ale membrilor, printr-o organizare colectivă care să ofere sprijin reciproc și acces mai bun la resurse.

Principalele etape ale dezvoltării cooperativelor:

- Secolul al 19-lea. Rochdale și începutul mișcării: În 1844, în orașul englez Rochdale, a fost fondată Societatea Pionierilor Târgului, prima cooperativă de consumatori de succes, care a stabilit principii fundamentale pentru mișcarea cooperativă.
- Sfârșitul secolului al XIX-lea – începutul secolului al XX-lea. Crearea Alianței Cooperative Internaționale (ICA): Fondată în 1895, ICA a marcat un pas semnificativ în instituționalizarea mișcării cooperativelor, unind cooperativele din întreaga lume sub un scop comun [3].
- Secolul 20. Perioade de criză și război: În perioade de criză economică și război, cooperativele au jucat un rol crucial în asigurarea furnizării de produse și servicii pentru populație, contribuind la stabilizarea economică și socială.
- Secolul 21. Digitalizarea și provocările globale: Cooperativele moderne se confruntă cu provocări precum digitalizarea, globalizarea, și necesitatea dezvoltării durabile, încercând să răspundă nevoilor de mediu, incluziune și echitate [1].

Revoluția Industrială, care a debutat în Marea Britanie la sfârșitul secolului al XVIII-lea, a fost însoțită de urbanizarea rapidă, creșterea numărului de fabrici și deteriorarea condițiilor de muncă pentru clasa muncitoare. În fața exploatării crescânde și a inegalității sociale, au început să apară primele mișcări cooperative, care au jucat un rol crucial în susținerea intereselor muncitorilor și în promovarea justiției sociale.

Unul dintre cele mai emblematice exemple a fost Rochdale Consumer Cooperative, fondată în 1844 de 28 de țesători. Aceștia și-au pus în comun resursele și au început să achiziționeze împreună produse esențiale, ca o soluție la dificultățile economice cu care se confruntau.

Această cooperativă a fost prima care a implementat "principiile Rochdale", care includ:

- calitatea de membru voluntar și deschis;
- controlul democratic de către membri;
- participarea economică;
- autonomie și independență;
- educație, formare și informare [7].

Aceste principii au devenit fundamentul identității cooperative, susținută astăzi de **Alianța Cooperativă Internațională (ACI)**.

În perioada Revoluției Industriale, cooperativele au îndeplinit funcții esențiale: protejarea muncitorilor împotriva speculațiilor și monopolurilor – prin cumpărarea directă a produselor, ocolind intermediarii, prețurile au scăzut, iar fraudă a fost eliminată.

De asemenea, s-au înființat farmacii cooperative, școli și societăți de construcții, care au oferit acces la servicii esențiale, contribuind astfel la reducerea inegalităților sociale [6].

Sprijinul financiar a venit prin bănci cooperative și fonduri de ajutor reciproc, care au oferit împrumuturi în condiții avantajoase [7].

Un alt aspect semnificativ a fost **emanciparea femeilor** – cooperativele implicau adesea femeile în procesul de management, ceea ce a favorizat independența lor economică.

Astfel, cooperativele au devenit nu doar o formă de afacere, ci o mișcare socială care, în contextul transformării industriale, a sprijinit lucrătorii, a redus sărăcia și a pus bazele unei economii mai echitabile.

Pe lângă Marea Britanie, mișcarea cooperativă s-a dezvoltat activ în Franța [9], Germania[8], iar mai târziu s-a răspândit și în Statele Unite [11], Italia [10] și alte țări.

Apariția mișcării cooperative în Moldova

Mișcarea cooperativă din Moldova are o istorie bogată și îndelungată, reflectând dorința populației de a colabora pentru a rezolva împreună problemele economice și sociale. Primele organizații cooperative din Moldova au apărut în 1868, când 200 de persoane s-au unit pentru a înființa societatea de consum "Economii". Scopul acestei comunități a fost de a oferi membrilor bunuri de calitate și accesibile. Această inițiativă a marcat începutul dezvoltării cooperării în regiune [12].

Dezvoltarea cooperării în perioada sovietică:

În perioada sovietică, mișcarea cooperativă din Moldova a fost integrată în sistemul economic uniunial. Cooperarea cu consumatorii a devenit un element esențial al economiei, furnizând populației bunuri și servicii. În această perioadă, activitățile cooperativelor au fost reglementate de autoritățile statului, ceea ce le-a afectat autonomia și principiile de funcționare [13].

Cooperative în Moldova independentă:

După obținerea independenței în 1991, Moldova s-a confruntat cu necesitatea reformării sectorului cooperativ. În 1995, a fost adoptată Legea „Cu privire la cooperativele de consum”, care a stabilit baza legală pentru activitățile cooperativelor de consum din țară, permițând acestora să își împartă contribuțiile pentru a răspunde intereselor și nevoilor membrilor lor [14].

Rolul caracteristicilor globale în dezvoltarea cooperativelor

Cooperativele joacă un rol semnificativ în economia globală, contribuind la dezvoltarea durabilă și la justiția socială. Mai jos sunt aspectele cheie ale impactului lor, cu sursele corespunzătoare:

Organizații cooperative internaționale:

- Alianța Cooperativă Internațională (ACI): Fondată în 1895 la Londra, ACI reunește, reprezintă și deservește cooperativele din întreaga lume, protejând principiile cooperativelor și promovând comerțul internațional [3];
- Asociația Internațională a Băncilor Cooperative (ICBA): Înființată în 1922 ca Comitetul Internațional al Băncilor Cooperative, această organizație reprezintă interesele instituțiilor financiare cooperative la nivel global.

Cooperative din țările dezvoltate și în curs de dezvoltare:

Țări dezvoltate:

În țări precum Franța, sectorul cooperativ a înregistrat o creștere semnificativă a ocupării forței de muncă. Din 2005, ocuparea forței de muncă în cooperativele din Franța a crescut cu 8%, comparativ cu doar 1,5% în întreaga economie.

Țări în curs de dezvoltare:

În aceste țări, cooperativele contribuie la dezvoltarea durabilă prin îmbunătățirea accesului economic și a bunăstării sociale generale [17].

Impactul cooperativelor asupra economiei globale:

Contribuția economică:

Cooperativele oferă locuri de muncă sau oportunități de angajare pentru 280 de milioane de persoane din întreaga lume, reprezentând 10% din numărul total de persoane angajate.

Cifra de afaceri financiară:

Potrivit World Cooperative Monitor 2023, cele mai mari 300 de cooperative și organizații mutuale raportează o cifră de afaceri combinată de 2,409 trilioane USD [18].

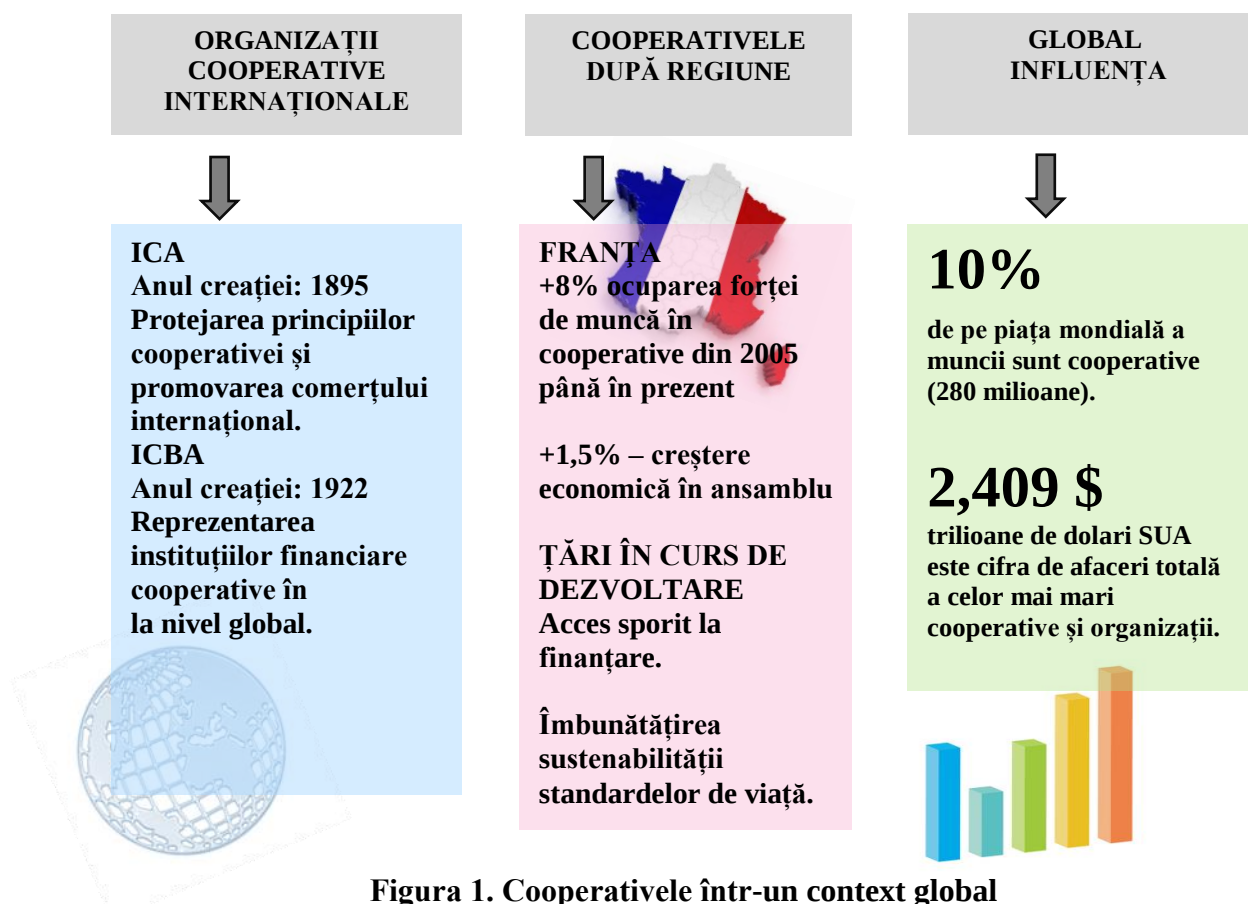


Figura 1. Cooperativele într-un context global

Sursa: elaborată de autori pe baza surselor studiate

Cooperativele continuă să aducă o contribuție semnificativă la economia globală, sprijinind crearea de locuri de muncă, promovând dezvoltarea durabilă și consolidând justiția socială.

Impactul contextului regional asupra activităților cooperativelor

Mișcările cooperative din întreaga lume s-au adaptat condițiilor socio-economice unice ale fiecărei regiuni, generând o diversitate de modele care reflectă nevoile și provocările locale.

Modele de cooperare în diverse regiuni ale lumii:

- Europa: Cooperativele acoperă sectoare cheie ale economiei, de la agricultură la sectorul bancar. De exemplu, în Franța, cooperativele produc 40% din producția agroindustrială a țării.
- America: În Statele Unite, cooperativele sprijină fermierii prin furnizarea de resurse și suport pentru promovarea unei agriculturi durabile.

- Asia: În India, băncile cooperative susțin milioane de mici proprietari de terenuri, iar în Japonia, cooperativele de consum, precum Clubul Seikatsu, sunt foarte populare.
- Africa: În țări ca Kenya și Uganda, cooperativele ajută comunitățile din mediul rural să își pună resursele în comun, facilitând accesul la piețe și la tehnologii.
- Moldova: În Moldova, cooperativele se dezvoltă activ atât în sectorul agricol, cât și în cel de prelucrare. Ele contribuie la asocierea fermierilor pentru utilizarea în comun a echipamentelor, achiziții colective și acces la piețele externe. De asemenea, cooperativele joacă un rol esențial în creșterea ocupării forței de muncă și în reducerea sărăciei din zonele rurale, susținând dezvoltarea sectorului cooperativ [22].

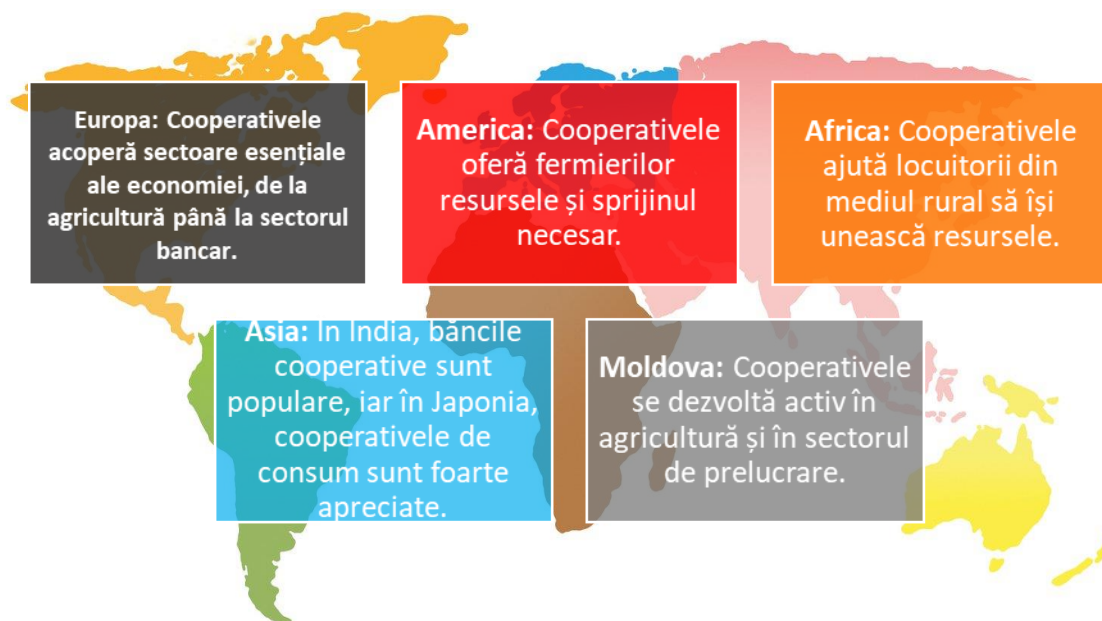


Figura 2. Modele cooperative de regiuni

Sursa: elaborată de autori pe baza surselor studiate

Cooperativele din întreaga lume se adaptează cu succes la realitățile regionale, oferind modele de afaceri durabile și incluzive. Flexibilitatea lor le permite să ia în considerare atât caracteristicile economice, cât și cele culturale ale fiecărei regiuni – de la nevoile agricole la cooperarea socială sau consolidarea fermierilor.

Factorul național al modelului cooperativ

Caracteristicile naționale ale mișcării cooperative variază în funcție de nivelul de dezvoltare economică, tradițiile culturale și reglementările statului. În unele țări, cooperativele sunt o parte integrantă a economiei și vieții cotidiene, în timp ce în altele sunt mai degrabă inițiative de nișă. Exemple de mișcări cooperative naționale de succes:

- **Franța:** Peste 23.000 de cooperative, cu aproximativ 1,3 milioane de angajați. Acestea sunt active în sectoare cheie, precum agricultură, bancar și comerțul cu amănuntul.
- **Italia:** Regiunea Emilia-Romagna se remarcă ca unul dintre centrele mondiale ale economiei cooperative, având 30% din PIB-ul regiunii generat de cooperative.
- **Coreea de Sud:** Începând din 2012, a fost adoptată Legea privind promovarea cooperativelor, iar de atunci au fost înregistrate peste 15.000 de cooperative în domenii diverse, cum ar fi sectorul social, educațional și medical [25].

Interacțiunea cooperativelor cu statul:

Modelele principale de interacțiune dintre cooperative și stat: – Modelul scandinav – statul sprijină activ cooperativele prin oferirea de beneficii și prin participarea la dezvoltarea infrastructurii. – Modelul liberal – autonomia completă a cooperativelor, cu intervenție limitată din partea statului. – Modelul de parteneriat – cofinanțarea activă, participarea statului la programele de ocupare a forței de muncă și inovare [26].

Cadrul legislativ și reglementarea cooperativelor: Fiecare țară are un cadru legislativ propriu:

- Germania: Legea cooperativelor este în vigoare din 1889 și reglementează toate formele de cooperative, de la agricultură la bănci.
- Statele Unite: Nu există o lege federală unică, iar cooperativele sunt reglementate la nivel de stat[28].
- Moldova: Legea nr. 1007-XIV cu privire la cooperativele de consum și Legea nr. 873 cu privire la cooperativele agricole. Accentul este pus pe sprijinirea micilor fermieri [29].

Tabelul 1. Reglementarea cooperativelor

ȚARĂ/ REGIUNE	CARACTERISTICILE MIȘCĂRII COOPERATIVE	MODELUL DE INTERACȚIUNE CU STATUL	CADRUL LEGAL
Franța	23000+ cooperative, 1,3 milioane de angajați. Activ în agricultură, bănci și retail	Model de parteneriat	Legislația națională cooperativă
Italia	30% din PIB-ul regiunii este produs de cooperative	Model de parteneriat	Legislație națională, sprijin la nivel regional
Coreea de Sud	15.000+ cooperative din 2012. Domenii: educație, sănătate, servicii sociale	Model hibrid: sprijin de stat + autonomie	Legea privind promovarea cooperativelor (2012)
Germania	Cooperative de toate formele. Cadru juridic istoric puternic	Modelul instituțional	Genossenschaftsgesetz (Legea Cooperativelor), (1889)
Statele Unite	Cooperativele sunt reglementate la nivel de stat	Model liberal (intervenție limitată)	Legi diferite în fiecare stat
Moldova	Cooperative de consum și agricole, concentrate pe sprijinirea asociațiilor de mici fermieri	Sprijin pentru sectorul rural	Legile nr. 1007-XIV și nr. 873
Scandinavia	Cooperativele sunt susținute activ de stat, iar infrastructura este dezvoltată	Modelul scandinav: beneficii, educație, infrastructură	Legislație națională compatibilă cu legislația UE

Sursa: elaborat de autori pe baza surselor studiate

Mișcările cooperative naționale reflectă realitățile socio-economice și caracteristicile culturale ale fiecărei țări. În unele, cooperativele au devenit parte integrantă a economiei, iar în altele, acestea se dezvoltă ca instrumente de sustenabilitate socială. Modelele de sprijin statal și reglementările legale variază, de la autonomia liberală la parteneriatele instituționale. Această diversitate de abordări confirmă faptul că cooperativele sunt eficiente atunci când beneficiază de o legislație clară și de implicarea activă a cetățenilor.

Impactul socioeconomic al cooperativelor

Cooperativele nu reprezintă doar o formă de afaceri, ci și un instrument esențial pentru dezvoltarea socio-economică durabilă, în special în regiunile în care piața tradițională este ineficientă sau ignoră grupurile vulnerabile.

Importanța existenței cooperativelor: – Oferirea unui sprijin constant lucrătorilor, chiar și în perioadele de criză. – Reinvestirea profiturilor în interesul membrilor săi, nu în favoarea acționarilor externi. – Membrii cooperativelor sunt atât proprietari, cât și utilizatori ai serviciilor. – Cooperativele sunt adesea singura sursă de venit în zonele rurale și îndepărtate.

Contribuția cooperativelor la economie: Cooperativele joacă un rol important în economiile naționale, în special în sectorul agricol, serviciile financiare și comerțul. Activitățile lor nu doar că contribuie la producție și ocuparea forței de muncă, dar susțin și creșterea economică durabilă.

De exemplu: – În Franța, cooperativele produc aproximativ 40% din toate produsele agricole din țară, ocupând poziții cheie în complexul agroindustrial și fiind printre cei mai mari angajatori [23]. – Italia (regiunea Emilia-Romagna) este un lider al mișcării cooperative, unde cooperativele sunt active în construcții, logistică, sănătate și sectorul social. Ele joacă un rol esențial în menținerea locurilor de muncă, în special în perioadele de criză, transformându-se adesea în cooperative de lucrători. – În Moldova, cooperativele agricole se dezvoltă activ, beneficiind de sprijin din partea statului prin diverse mecanisme de subvenționare. Acestea contribuie la asocierea fermierilor pentru utilizarea comună a echipamentelor, achizițiile colective și comercializarea produselor, ceea ce crește competitivitatea și profitabilitatea fermelor mici [31].

Cooperative și responsabilitate socială

Cooperativele se concentrează în primul rând pe interesele membrilor lor și ale comunităților locale. Modelul lor de management „o persoană, un vot” pune un accent puternic pe latura socială a afacerii, contribuind la construirea încrederii și solidarității între membri.

De exemplu:

– În Coreea de Sud, cooperativele joacă un rol esențial în dezvoltarea economiei sociale și solidare a țării. Ele sunt deosebit de active în domeniile educației și serviciilor sociale, contribuind semnificativ la reducerea inegalităților și la creșterea mobilității sociale. Aceste inițiative beneficiază de sprijin din partea statului și sunt implementate ca parte a unor mecanisme financiare durabile [25].

– În Statele Unite, Cooperative Home Care Associates (CHCA) este cea mai mare cooperativă de lucrători din țară, cu peste 2.000 de angajați. Aceasta oferă condiții de muncă decente, formare continuă și participare activă la management, îmbunătățind astfel calitatea vieții angajaților.

– În Moldova, cooperativele contribuie la crearea de locuri de muncă în zonele rurale, participă la formarea profesională și sprijină dezvoltarea infrastructurii, având un impact semnificativ în reducerea sărăciei și a șomajului [33].

Modele de cooperare în dezvoltare durabilă

Cooperativele sunt recunoscute ca un instrument esențial pentru atingerea Obiectivelor de Dezvoltare Durabilă (ODD), în special în domeniile securității alimentare, locurilor de muncă decente, consumului durabil și protecției mediului.

La nivel global, cooperativele contribuie semnificativ la realizarea ODD 8 (muncă decentă), ODD 12 (consum durabil) și ODD 13 (politici climatice), construind economii echitabile și comunități reziliente[34].

De exemplu:

– În Germania, cooperativele energetice (Energiegenossenschaften) se dezvoltă activ, investind în centrale solare și eoliene locale, reducând amprenta de carbon și implicând cetățenii în procesul de tranziție energetică.

– În Moldova, cooperativele implementează practici agricole durabile, contribuind la păstrarea fertilității solului și la creșterea randamentelor, în concordanță cu prioritățile naționale pentru o producție mai curată.

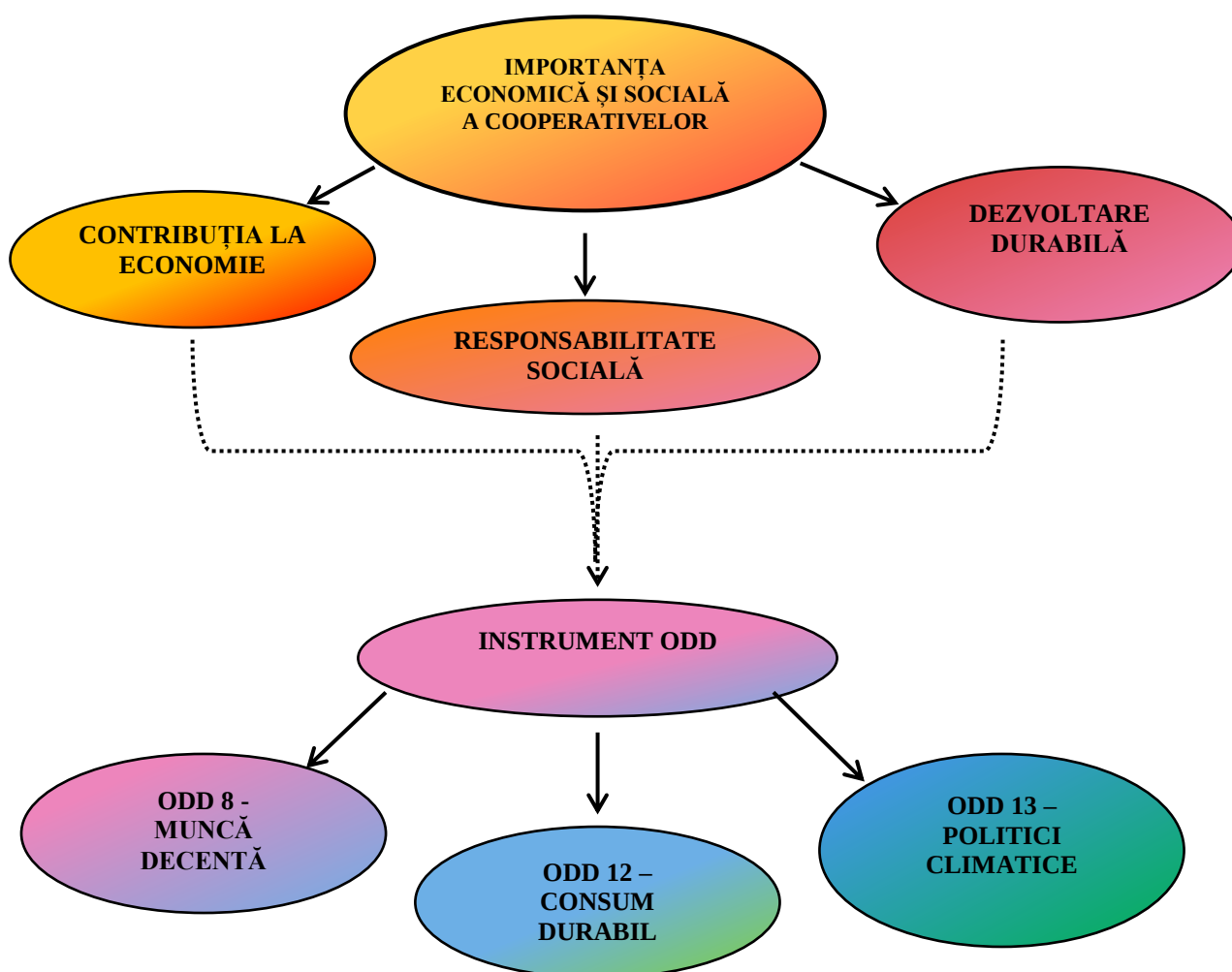


Figura 3. Importanța economică și socială a cooperativelor

Sursa: elaborată de autori pe baza surselor studiate

Cooperativele joacă un rol esențial în dezvoltarea socio-economică durabilă, în special în regiunile în care piețele tradiționale sunt ineficiente. Acestea nu doar că oferă locuri de muncă, dar stimulează creșterea economică și promovează responsabilitatea socială, concentrându-se pe nevoile membrilor și ale comunităților locale. Dezvoltarea cooperativelor, în special în agricultură și alte sectoare, contribuie semnificativ la îmbunătățirea calității vieții, reducerea sărăciei și combaterea șomajului, mai ales în zonele rurale și izolate. Mai mult, cooperativele susțin activ principiile dezvoltării durabile, incluzând securitatea alimentară, ocuparea decentă a forței de muncă și protecția mediului, subliniind astfel importanța lor în atingerea obiectivelor globale de dezvoltare durabilă.

Probleme și perspective pentru dezvoltarea cooperativelor

În urma cercetării subiectului cooperativelor, am ajuns la concluzia că acestea se confruntă cu o serie de provocări ce pot limita dezvoltarea și eficiența lor operațională. Printre cele mai importante dificultăți identificate se numără:

- Lipsa capitalului, un obstacol major ce împiedică creșterea și expansiunea cooperativelor;
- Structura organizațională slabă, care face dificilă utilizarea eficientă a resurselor și coordonarea activităților;
- Lipsa personalului calificat și concurența acerbă cu companiile mari, care poate submina competitivitatea acestora pe piețele interne și externe.

Totuși, există perspective promițătoare pentru dezvoltarea cooperativelor. Inovațiile și parteneriatele strategice pot contribui semnificativ la creșterea competitivității acestora. De asemenea, digitalizarea și educația oferă noi oportunități de extindere a piețelor de vânzare și îmbunătățire a eficienței operaționale, deschizând astfel noi orizonturi pentru viitorul cooperativelor.

Principalele provocări pentru cooperative

În urma analizei problemelor, am identificat mai multe provocări cheie care pot limita dezvoltarea durabilă a cooperativelor. Printre acestea, se numără:

- Barierele legale și de reglementare, care pot împiedica semnificativ crearea și funcționarea cooperativelor, în special în ceea ce privește accesul la finanțare și sprijinul statului;
- Adaptarea la schimbare, o provocare majoră datorată schimbărilor climatice și instabilității economice. Acești factori necesită cooperativelor o mare flexibilitate și capacitatea de a se adapta rapid la noi condiții;
- Gradul de implicare a membrilor, care este esențial pentru funcționarea eficientă a cooperativelor. Am constatat că multe cooperative se confruntă cu o implicare scăzută a membrilor în procesele de luare a deciziilor, ceea ce limitează atât eficiența, cât și capacitatea de dezvoltare.

Inovație tehnologică și digitalizare

Inovația tehnologică și digitalizarea joacă un rol esențial în dezvoltarea cooperativelor, deschizând noi oportunități pentru îmbunătățirea activităților acestora.

Cooperativele pot utiliza platformele digitale pentru a eficientiza mai multe procese. Acest lucru va contribui la reducerea costurilor logistice, la extinderea piețelor de vânzare și la îmbunătățirea coordonării între membrii lor.

De asemenea, utilizarea analizei de date mari (big data) va permite cooperativelor să ia decizii mai informate, ceea ce va duce la îmbunătățirea proceselor de producție și la reducerea costurilor.

În contextul cerințelor moderne ale dezvoltării durabile, cooperativele pot integra practici de agricultură durabilă în activitățile lor. Aceasta va contribui nu doar la îmbunătățirea performanței producției, ci și la protejarea mediului.

Viitorul cooperativelor într-o lume globalizată

Globalizarea oferă atât oportunități, cât și provocări pentru cooperative. În acest context, am ajuns la concluzia că, pentru a juca un rol semnificativ, cooperativele trebuie să valorifice noile oportunități și să se adapteze rapid la condițiile în schimbare:

- **Accesul la piețele internaționale:** Globalizarea permite cooperativelor să își extindă prezența pe piețele internaționale. Produsele și serviciile care respectă principiile dezvoltării durabile și ale responsabilității sociale au șanse mari să fie cerute pe piețele globale, deschizând noi oportunități pentru cooperative.
- **Adaptarea la tendințele globale:** Cooperativele nu doar că se pot adapta la tendințele globale, dar pot deveni și inițiatori ai acestora. De exemplu, cooperativele din domeniul energiei regenerabile și al consumului durabil pot juca un rol esențial în eforturile globale de combatere a schimbărilor climatice.
- **Cooperative de rețea:** Într-o lume globalizată, cooperativele pot colabora și se pot conecta pentru a împărtăși resurse și cunoștințe. Acest lucru le va permite să își extindă influența și oportunitățile de pe piețele internaționale.

În concluzie, cooperativele pot juca un rol semnificativ într-o lume globalizată dacă inovează și se adaptează activ la schimbările din mediul economic și social.

Concluzie

Cooperativele reprezintă mult mai mult decât o simplă formă de management. Ele constituie un model flexibil și durabil, capabil să facă față provocărilor contemporane, de la instabilitatea economică la schimbările climatice. Analizând rolul lor în context global, național și regional, am observat cum cooperativele creează oportunități pentru solidaritate, dezvoltare locală și inovare. Acestea au un impact semnificativ asupra comunităților, promovând accesul echitabil la resurse și contribuind la construirea unor economii mai incluzive și reziliente.

În ciuda dificultăților – resurse limitate, sprijin insuficient și concurență cu marile întreprinderi – cooperativele au demonstrat deja un potențial semnificativ. Este evident că, dacă actorii cooperativi sunt dispuși să se schimbe și dacă instituțiile statale și internaționale acordă sprijinul necesar, cooperativele pot deveni actori cheie în construirea unui viitor mai durabil și mai echitabil, atât în Moldova, cât și la nivel global.

Pentru a-și consolida rolul și a răspunde noilor provocări ale economiei globale, cooperativele trebuie să continue un proces constant de adaptare și modernizare, prin digitalizare, formare continuă și implicarea activă a tinerilor, astfel încât să-și mențină relevanța și sustenabilitatea pe termen lung.

Astfel, cooperativele nu doar că joacă un rol esențial în dezvoltarea socio-economică durabilă, dar și contribuie activ la promovarea unui model economic echitabil și rezilient,

consolidând importanța lor ca piloni fundamentali în construirea unui viitor sustenabil pentru întreaga comunitate globală.

Referințe

- Williams R. (2007). *The Cooperative Movement: Globalization from Below*. Ashgate Publishing. Disponibil: <https://www.perlego.com/book/1567137/the-cooperative-movement-globalization-from-below-pdf> Accesat: 04.04.2025
- Birchall J. (1997). *The International Co-operative Movement*. Manchester University Press. Disponibil: https://books.google.md/books/about/The_International_Co_operative_Movement.html?id=91-ntLeoyckC&redir_esc=y Accesat: 04.04.2025.
- International Co-operative Alliance, ICA. Disponibil: <https://ica.coop/en> Accesat: 04.04.2025.
- Battilani P. & Schröter H. G. (2012). *The Cooperative Business Movement, 1950 to the Present*. Cambridge University Press. Disponibil: <https://files.libcom.org/files/2022-08/Battilani%20et%20al%20-%20The%20Cooperative%20Business%20Movement%201950-present%20%28Libertarian%20Socialism%29%20%28Cooperatives%29.pdf> Accesat: 04.04.2025.
- Curl J. (2009). *For All the People: Uncovering the Hidden History of Cooperation, Cooperative Movements, and Communalism in America*. PM Press. Disponibil: https://archive.org/details/forallpeopleunco0000curl_g4p6 Accesat: 04.04.2025.
- Fairbairn B. (1994). *The Meaning of Rochdale*. University of Saskatchewan. Disponibil: <https://usaskstudies.coop/documents/occasional-papers/meaning-of-rochdale.pdf> Accesat: 05.04.2025.
- MacPherson I. (2007). *One Path to Co-operative Studies*. BC Institute for Co-operative Studies. Disponibil: <https://dspace.library.uvic.ca/items/953600b4-bdef-4890-a9fc-cbb5db21f525> Accesat: 05.04.2025.
- Virtual Museum of cooperatives. Disponibil: <https://www.cooperazione.net/en/virtual-museum/647> Accesat: 05.04.2025.
- Encyclopedia.com. Disponibil: <https://www.encyclopedia.com/history/encyclopedias-almanacs-transcripts-and-maps/cooperative-movements> Accesat: 05.04.2025.
- Biography Luigi Luzzatti Disponibil: https://en.wikipedia.org/wiki/Luigi_Luzzatti Accesat: 05.04.2025.
- Craig J. G. (1993). *The Nature of Co-operation*. Black Rose Books. Disponibil: https://resources.uwcc.wisc.edu/History_of_Cooperatives.pdf Accesat: 05.04.2025.
- S.C. Moraru и O. Ungurean (2016). Кооперативная система как третий сектор экономики в индустриально развитых странах. Disponibil: https://ibn.idsi.md/sites/default/files/imag_file/Cooperativnaia%20sistema%20kak%20tretii%20sector%20ekonomik%20v%20industrialino%20razviti%20stranah.pdf Accesat: 06.04.2025.
- Эволюция законодательства потребительской кооперации (2023). Disponibil: <https://elibrary.ru/item.asp> Accesat: 06.04.2025.
- Закон Республики Молдова о потребительской кооперации (2000). Disponibil: https://base.spinform.ru/show_doc.fwx Accesat: 06.04.2025.
- International Co-operative Banking Association (ICBA). Disponibil: <https://www.icba.coop/about.php> Accesat: 06.04.2025.
- Stephen C. Smith и Jonathan Rothbaum (2013). *Cooperatives in a Global Economy: Key Economic Issues, Recent Trends, and Potential for Development*. Disponibil: <https://docs.iza.org/pp68.pdf> Accesat: 06.04.2025.
- Cooperative Dependency in Developing Countries: A Systematic Literature Review (2023). Disponibil: <https://ocdc.coop/resource-center/cooperative-dependency-in-developing-countries-a-systematic-literature-review> Accesat: 06.04.2025.
- ICA. Facts and figures. Disponibil: <https://ica.coop/en/cooperatives/facts-and-figures> Accesat: 06.04.2025.
- History of the cooperative movement. Disponibil: https://en.wikipedia.org/wiki/History_of_the_cooperative_movement Accesat: 06.04.2025.
- Arifa Sultana(2022). Возникновение кооперативов и их трансформация в Азии, Африке и Южной Америке. Disponibil: https://www.researchgate.net/publication/359576210_Emergence_of_Cooperatives_and_their_transformation_across_Asia_Africa_and_South_America Accesat: 06.04.2025.
- Rebecca Harvey(2024). Model Law boosts co-operative movement in Africa. Disponibil: <https://www.thenews.coop/model-law-boosts-co-operative-movement-in-africa> Accesat: 06.04.2025.
- Sirbu V.(2020) În Cooperarea agricolă: provocări și perspective. Disponibil: <https://ibn.idsi.md/> Accesat: 06.04.2025.
- Coop FR (2021). Panorama des entreprises coopératives. Disponibil: https://www.entreprises.coop/system/files/inline-files/1.Panoramacoop2024-HDweb_2.pdf Accesat: 07.04.2025.
- Professor Vera Zamagni(2023). Lessons for Platform Cooperatives. Disponibil: <https://geo.coop/articles/exploring-italian-social-cooperatives-vera-negri-zamagni> Accesat: 07.04.2025.

25. International Labour Organization (2021). Financial mechanisms for innovative social and solidarity economy ecosystems: The case of the Republic of Korea. Disponibil: [https://www.ilo.org/sites/default/files/wcmsp5/groups/public/%40ed_emp/%40emp_ent/%40coop/documents/publication/](https://www.ilo.org/sites/default/files/wcmsp5/groups/public/%40ed_emp/%40emp_ent/%40coop/documents/publication/Accessat: 07.04.2025) Accesat: 07.04.2025.
26. Birchall J. (2013). Resilience in a Downturn: The Power of Financial Cooperatives. Disponibil: https://base.socioeco.org/docs/wcms_207768.pdf Accesat: 07.04.2025.
27. Genossenschaftsgesetz, 1889. Disponibil: [https://de.wikipedia.org/wiki/Genossenschaftsgesetz_\(Deutschland\)](https://de.wikipedia.org/wiki/Genossenschaftsgesetz_(Deutschland)) Accesat: 07.04.2025.
28. National Cooperative Business Association (NCBA). Disponibil: <https://ncbaclusa.coop/policy-strategies-to-build-a-more-inclusive-economy-with-cooperatives/> Accesat: 07.04.2025.
29. "Legea cu privire la cooperativele de consum" și "Legea privind cooperativele agricole", Ministerul Agriculturii RM. Disponibil: https://www.legis.md/cautare/getResults?doc_id=103728&lang=ru https://www.legis.md/cautare/getResults?doc_id=105574&lang=ru Accesat: 07.04.2025.
30. ILO (2014). Job preservation through worker cooperatives: An overview of international experiences and strategies. Disponibil: https://www.ilo.org/sites/default/files/wcmsp5/groups/public/%40ed_dialogue/%40actrav/documents/publication/wcms_312039.pdf Accesat: 08.04.2025.
31. Diana Cosalic. AIPA Evaluarea FNDAMR pentru anii 2017-2021. Disponibil: <https://aipa.gov.md/sites/default/files/AIPA%20Evaluarea%20FNDAMR%20pentru%20anii%202017%20-%202021%20%28ro%29.pdf> Accesat: 08.04.2025.
32. Caroline Lewis (2017). The nations largest worker-owned business is no longer just an experiment in social justice. Disponibil: https://www.crainsnewyork.com/article/20170131/HEALTH_CARE/170139976/adria-powell-on-leading-cooperative-home-care-associates-in-a-crowded-home-health-market-and-empowering-women Accesat: 08.04.2025.
33. Talent Retention for Rural Transformation Partial Supervision Report(2024). Disponibil: file:///Users/kristinagordeeva/Downloads/MDA_2000002242_SUPERVISION_REPORT_JUL_2024_0018-1260093433-2555.pdf Accesat: 08.04.2025.
34. ООН. Цели в области устойчивого развития. Disponibil: <https://www.un.org/sustainabledevelopment/ru/sustainable-development-goals/> Accesat: 08.04.2025.
35. Википедия. Энергетический поворот. Disponibil: https://ru.wikipedia.org/wiki/%D0%AD%D0%BD%D0%B5%D1%80%D0%B3%D0%B5%D1%82%D0%B8%D1%87%D0%B5%D1%81%D0%BA%D0%B8%D0%B9_%D0%BF%D0%BE%D0%B2%D0%BE%D1%80%D0%BE%D1%82 Accesat: 08.04.2025.

STRUCTURAL SHIFTS IN THE UKRAINE'S FOREIGN TRADE DURING THE WAR WITH RUSSIA

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Abstract

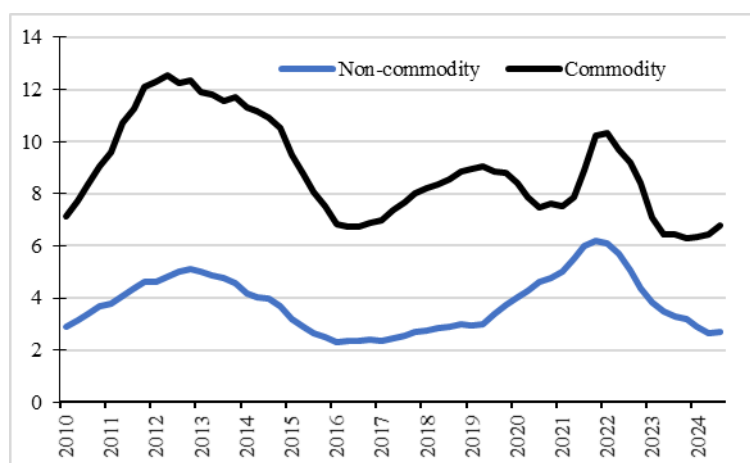
Important determinants of the Ukraine's exports and imports across commodity and non-commodity subgroups are analysed, with a focus on the structural shifts initiated by the war with Russia which erupted in 2014 and evolved into a full-scale invasion in February 2022. Both commodity and non-commodity exports suffered a symmetrical decline in both 2014-2015 and 2022-2024 periods, while similar downwards shifts in the imports of both subgroups are asymmetrical in the latter. Using quarterly data for the 2010-2024 period, it is found that the output growth correlates positively with the dynamics of both exports and imports across the commodity and non-commodity subgroups. As expected, depreciation of the exchange rate contributes to a decrease in the commodity imports, while it is just the opposite for the non-commodity imports. The latest Russian invasion of 2022 has been marked by a decrease in the non-commodity exports combined with an opposite positive effect on the non-commodity imports; no impact on the commodity exports and imports is detected.

Keywords: foreign trade, exchange rate, output, Russian aggression, Ukraine

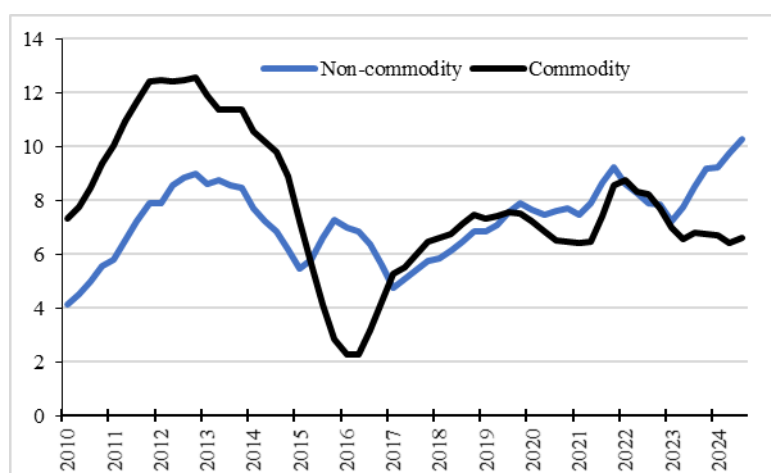
JEL: F14, F31

Introduction

The volume of Ukraine's foreign trade has been on a significant decline since the beginning of Russian aggression in February 2022 (Fig. 1). Among the explanations, both disruptions of the supply chains and changes in income and exchange rate are to be mentioned. In this respect, it is of particular interest to analyse likely differences between determinants of commodity and non-commodity components of exports and imports. It is of importance in the context of qualitative analysis of the shifts in foreign trade, with a reference to potential impact on the post-war reconstruction of the Ukraine's economy. It was common at the beginning of the full-scale Russian invasion of February 2022 to assume that it only strengthened important shifts in the structure of Ukraine's exports and imports, which had been observed since the middle of last decade [3, pp. 125–140]. As the world commodity prices had been on a steep hike since February 2022 [4], it suggested price incentives for commodity exports, although this effect becomes weaker in the presence of domestic price increases [2].



a) exports



b) imports

Figure 1. Exports and imports of commodity and non-commodity goods (in billions of the U.S. dollars), 2010–2024

Note: the commodity group of exports and imports includes agricultural raw commodities, iron and ferrous metals ore and other raw materials. Among the non-commodity components of foreign trade, manufactured goods, foodstuff and clothing are included.

Source: authors' calculations based on the Ukraine's State Statistical Office database

Instability of the world commodity prices cannot but increase risks of its own [1]. Nevertheless experts of WTO are convinced that foreign trade can be an effective tool for stabilisation policies [4]. For this purpose, it is important to account for potential differences between changes in the structure exports and imports in both short run and long run, that is in the post-war period.

The aim of this article is to analyse the impact of the exchange rate and output on the Ukraine's commodity and non-commodity subgroups of both exports and imports, with a control for the realities of the war with Russia. It is important for better understanding of the recent foreign trade dynamics in Ukraine as well as for better assessment of likely exchange rate-based stabilisation policy effects on the disaggregated exports and imports policies.

Results obtained and discussions

With the beginning of Russian aggression in February 2022, a synchronous decline in the value of both commodity and non-commodity exports is observed (Fig. 1a), while the changes in the value of imports across both subgroups had been asymmetrical (Fig. 1b). The value of commodity imports decreased, while just the opposite happened to the value of non-commodity imports. More specifically, import of transport vehicles is responsible for an increase in the value of non-commodity items.

In order to study for the determinants of commodity and non-commodity exports and imports our statistical model presents as follows:

$$\Delta x_t^K = a_0 + a_1 \Delta x_{t-1}^K + a_2 \Delta y_t + a_3 \Delta neer_t + a_4 WAR_t, \quad (1)$$

where x_t^K stands for the value of commodity and non-commodity exports and imports (in billions of US dollars), Δexp_t^{RAW} and Δexp_t^{NONRAW} , Δimp_t^{RAW} and Δimp_t^{NONRAW} , respectively, y_t is the real gross domestic product (index, 1994=100), $neer_t$ is the nominal effective exchange rate (index, 2015=100), WAR_t is the dummy for the period of Russian aggression (1 for 2022Q1:2024Q3, and 0 otherwise), and Δ is the operator of first differencing. Time series for all variables are obtained from the Ukraine's State Statistical Office database (www.ukrstat.gov.ua) and the IMF's International Financial Statistics database (<https://data.imf.org/en/statistics>). Except the nominal effective exchange rate, all other variables are deseasonalized with the X-12 procedure.

It is possible to hypothesize that exports and imports are inertial ($a_1 > 0$). In the specific Ukraine's environment, it is likely that both imports and exports are stimulated by output growth ($a_2 > 0$). If a positive relationship between output and imports is quite standard in the open economy models, the same positive link between output and exports known as “the 45° rule” is not so widespread being a distinct feature mostly of the developing countries. Depreciation of the exchange rate is supposed to stimulate exports ($a_3 > 0$), while constraining imports ($a_3 < 0$). Finally, it is quite natural to assume that realities of the military conflict with Russia are inferior for both exports and imports, regardless of its disaggregated structure.

Our estimates of Eq. 1 with the GMM estimator are presented in Table 1. As indicated by the coefficient of determination R^2 , the explanatory power is the highest for the estimates of export growth for commodities. In other regression models, the explanatory power is much lower. As it is suggested by the coefficients on the lagged dependent variables, inertial are imports of commodity

goods and exports of non-commodity goods. However, the value of both estimated coefficients is rather small. The Durbin–Watson (DW) statistics does not indicate any significant autocorrelation of the residuals. Also, the Augmented Dickey-Fuller (ADF) test confirms that residuals are stationary.

Table 1. Determinants of exports and imports across commodity and non-commodity subgroups

Independent variables	Dependent variable			
	Δimp_t^{RAW}	Δimp_t^{NONRAW}	Δexp_t^{RAW}	Δexp_t^{NONRAW}
Δimp_{t-1}^{RAW}	0.154***	—	—	—
$\Delta imp_{t-1}^{NONRAW}$	—	0.083	—	—
Δexp_{t-3}^{RAW}	—	—	0.167	—
$\Delta exp_{t-2}^{NONRAW}$	—	—	—	0.143**
Δy_t	0.945***	1.137***	2.089***	0.621***
$\Delta neer_{t-1}$	-1.631*	0.482*	—	—
$\Delta neer_{t-2}$	1.155**	—	0.284*	—
$\Delta neer_{t-3}$	—	—	-0.391**	0.292**
WAR_t	-0.150	0.060**	-0.024	-0.076***
R ²	0.16	0.22	0.66	0.22
DW	2.14	1.79	1.84	2.23
ADF	-6.37***	-6.62***	-6.97***	-8.83***

Source: author's calculations

In full accordance with the open economy relationships, import of both commodity and non-commodity goods is strongly related to output growth, with the regression coefficient on Δy_t in the equations for Δimp_t^{RAW} and Δimp_t^{NONRAW} at 0.945 and 1.137, respectively. The relationship between output growth and export of both subgroups is similar, but in this case the output effect is much stronger for export of commodity goods. For a percentage point of output growth, there is an increase of commodity exports by 2,1%, while exports of non-commodity goods increases by just 0,6%. Such results are in support of “the 45° rule”, when export is dependent on domestic production in the first place, with foreign demand being of low importance.

As expected, the depreciation of exchange rate contributes to a decrease in the commodity imports. However, it is not the case for imports of non-commodities as the value of Δimp_t^{NONRAW} increases. It is worth noting that the exchange rate depreciation is associated with an increase in the exports of non-commodity goods (with a three quarters lag), while a similar favourable impact is not observed for commodity goods. Following a weakening of the local currency, export of commodity goods initially increases, but it decreases later on. Commodity exports are on a decline on the sum of three quarters.

Finally, the latest full-scale war with Russia has not led to a decline in imports, as it can be expected. Moreover, there has been an increase in the non-commodity imports. Such an outcome can be explained by a higher demand for arms and military equipment, although a stronger demand for passenger cars could play a role either. To sum up, it is likely that the war with Russia does not have a direct impact on Ukraine's commodity exports, but it has contributed to a significant decrease in the

exports of non-commodity goods. Also, it is worth noting that if we control for a longer war period since 2014 results are much the same but at a lower level of statistical significance.

Conclusions

Our findings suggest that the post-war recovery in the Ukraine's foreign trade dynamics as a prerequisite for a return to the long-term growth path is dependent mainly on the output growth in the short run. Such a feature requires implementation of relevant structural and institutional policies. On the other hand, expected favourable effects of the exchange rate depreciation as a component of the stabilisation policy should not be exaggerated. Although it is likely to stimulate export of non-commodity goods, the exchange rate depreciation brings about a stronger increase of imports of this subgroup. As a result, it implies worsening of the trade balance on this subgroup of foreign trade flows, with a depressing impact on the aggregate demand to follow. To the same extent there is no reason to expect a better balance in trade with commodity goods in the wake of exchange rate depreciation. In the post-war period, a recovery in the export of non-commodity goods is likely to be observed. It seems that there is no strong direct impact of the war with Russia on Ukraine's imports of commodity and non-commodity subgroups, as well as on the commodity exports. However, a negative effect of war activities on Ukraine's foreign trade can be attributed to a steep drop in output as one of the most destructive outcome of the Russian aggression.

References

1. CHOWDHURY, E. The Impact of Commodity Market on the Economy of Developing Countries. In: MPRA Paper No. 119462. – Munich: Munich Personal RePEc Archive (MPRA), 2023. 16 p. <https://mpra.ub.uni-muenchen.de/119462/>
2. HAAKER, M. Macroeconomic Impact of the War in Ukraine and of High Commodity Prices Across Countries. CGD Working Paper No. 652. – Washington, DC: Center for Global Development, 2023. <https://www.cgdev.org/publication/macroeconomic-impact-war-ukraine-and-high-commodity-prices-across-countrie>.
3. PALINCHAK, M., BREZOVYCH, K., MASHKARA-CHOKNADYJ, V., MAYBORODA, Y. The Impact of War on the Reorientation of Trade Flows: The Case of Ukraine. *Regional and Local Studies*. 2023. P. 125–140. DOI: 10.7366/15094995s2310. ISSN 1509-4995 E-ISSN 2719-8049
4. One year of war in Ukraine. Assessing the impact on global trade and development. – Geneva: World Trade Organization, 2023. 22 p. ISBN 978-92-870-7516-1

S6

EDUCATION AND RESEARCH FOR RESILIENT COOPERATIVE FUTURE

EDUCAȚIE ȘI CERCETARE PENTRU UN VIITOR REZILIENT AL COOPERATIVELOR

THE PERFORMANCE OF ITALIAN COOPERATIVE ENTERPRISES DEDICATED TO EDUCATION: QUANTITATIVE RESULTS FROM ANALYSIS OF FINANCIAL STATEMENTS¹

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Abstract

The study uses an analytical approach to examine Italian cooperative enterprises' economic and financial performance in the education sector. The objective is to address knowledge gaps concerning this strategically significant yet under-researched field, particularly from an economic perspective. The survey focused on 2,770 companies classified under the ATECO code 85, with financial statements analysed for 2014-2023. The analysis focused on four size variables: revenues, total assets, equity, and number of employees. The findings indicate a substantial augmentation in cooperatives' mean economic and asset magnitude, accompanied by a pronounced internal polarisation, characterised by a predominance of micro-enterprises and a limited number of substantial enterprises. The data distributions are characterised by high skewness and kurtosis, while the median and mode report central values much lower than the averages. The sector's heterogeneity suggests the need for alternative valuation tools to the classic parameters taken from financial statements, which are often inadequate in the cooperative context due, among other things, to the peculiarities of the rebate to members. The study will inform the construction of a permanent observatory on these companies' economic and financial sustainability.

Keywords: Educational cooperatives, Economic and financial performance, analysis of financial statements

JEL: P13, I20, M4, O16

1. Introduction

Italian cooperative enterprises dedicated to educational services have assumed a significant role in the new millennium. They are engaged in many domains within the sphere of education and training, extending from the earliest stages of childhood. Several factors have propelled this expansion. Legislative reforms have undoubtedly had an impact, as evidenced by introducing new welfare rules in a subsidiary key [12] and those specific to social cooperatives [13]. These reforms recognise the public value of socio-educational activities conducted by private non-profit entities.

In the context of their numerical growth and an increasingly significant role, there is a paucity of studies on the economic and financial dynamics characterising them. However, it is important to note that performance analysis is relevant in this context. These companies operate in a highly regulated environment, often with low operating margins and strong dependence on public resources.

¹ This article is the result of collaborative authorship between the two authors. Guido Migliaccio was responsible for the design of the research, the formulation of the conceptual framework and the identification of the most appropriate methodology for answering the research questions, and the critical outline of the outcomes. The following paragraphs can therefore be attributed to him: "Introduction," "Bibliometric elements and literature review", and "Conclusions". Conversely, Lorenzo Maria Migliaccio analysed the financial statements data and proposed some considerations on the outcomes. It can thus be concluded that the paragraph entitled "Results obtained and discussions" is attributable to him, as are the associated subparagraphs.

Their typicality also gives them a hybrid connotation because they are oriented towards the social mission but linked to economic balances. The risks associated with high debt and consequent managerial fragility are significant [2].

In addition to the points, European bodies pay particular attention to the financial soundness of social economy organisations. This is necessary to ensure continuity, innovation, and quality over time [5].

The evaluation of the performance of social enterprises is a complex undertaking. Such tools would have to be more advanced than traditional ratios and require parameters relating to resilience, management, and consistency with the mission [19]. Nevertheless, it is imperative to recognise that any preliminary approach must be accompanied by precisely identifying its economic dimensions.

The present study aims to address this lacuna by presenting the findings of a quantitative analysis conducted on a sample of financial statements of Italian cooperatives dedicated to education, to measure these companies' economic and financial performance.

2. Bibliometric elements and literature review

2.1. International literature

A preliminary analysis of the international literature was conducted on Scopus in the spring of 2025, employing the following search string: The search terms “cooperative AND company AND education AND performance” should be included in the titles, abstracts, and keywords. A total of eight documents have been identified. However, it should be noted that adding the terms “Italy” or “Italian” to the document in question will render it invalid. This underscores the necessity for a thorough examination of the subject.

The eight documents under scrutiny were published in disparate years, with no evident continuity between them (Figure 1). The earliest document is dated 1969, while the most recent is from 2024.

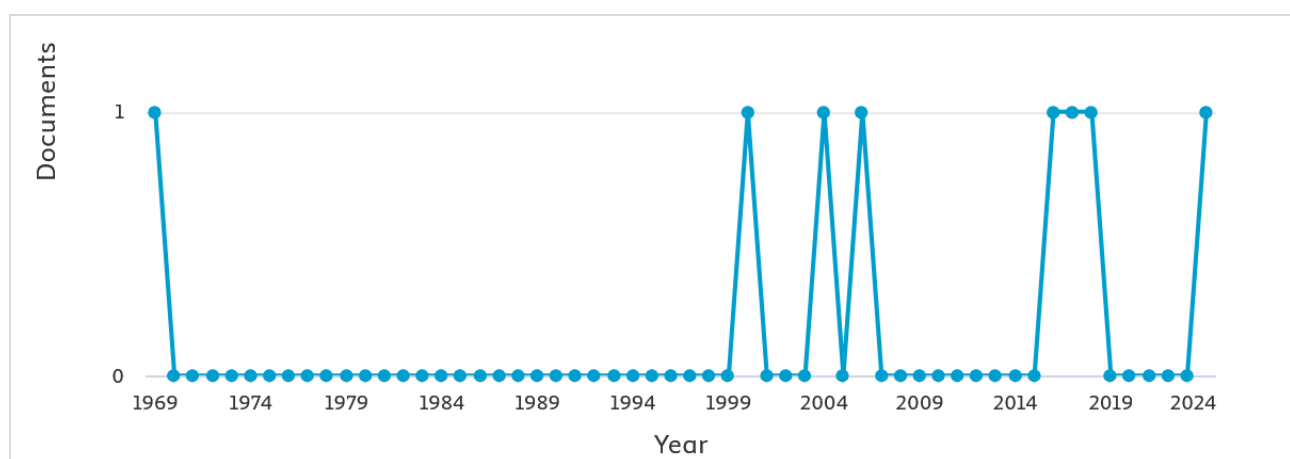


Figure 1. Documents concerning the year of publication

Source: Scopus

Furthermore, there is no focus on specific territorial areas, except for greater attention in the United States of America (Figure 2).

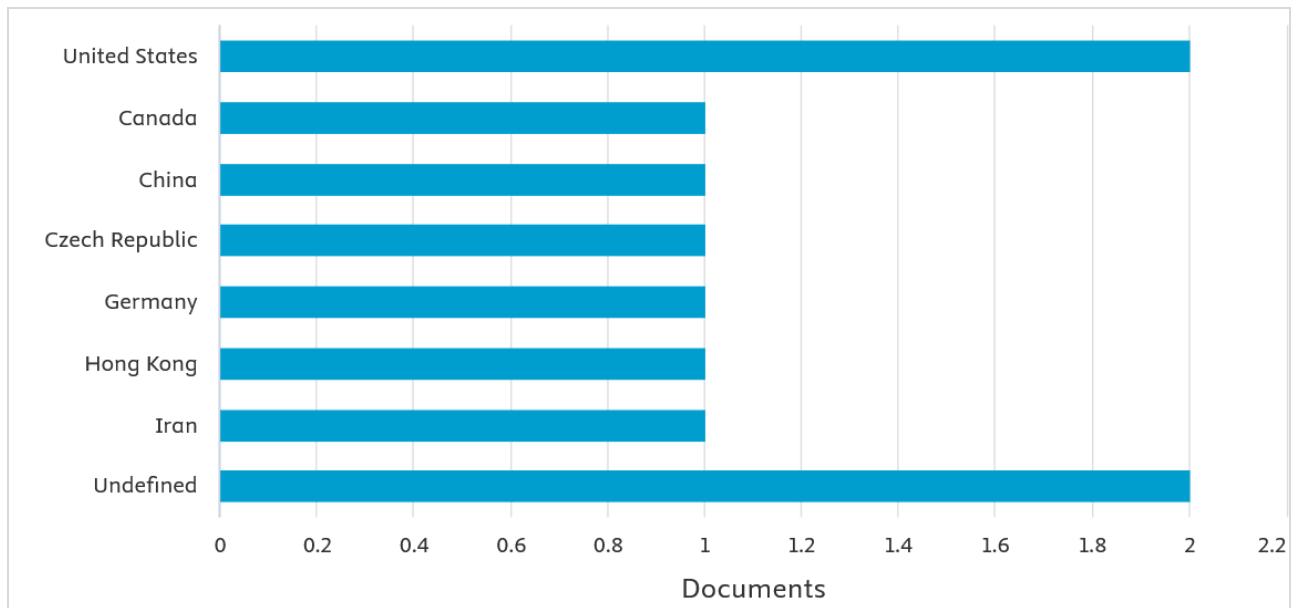


Figure 2. The zonal distribution of documents

Source: Scopus

A limited number of studies have been disseminated exclusively through various scientific periodicals. Most of these publications pertain to the “Business, management and accounting” subject area of Scopus (44.4%), a finding that is unsurprising when considering the term “economic-financial performance” that characterises the title of the research (Figure 3).

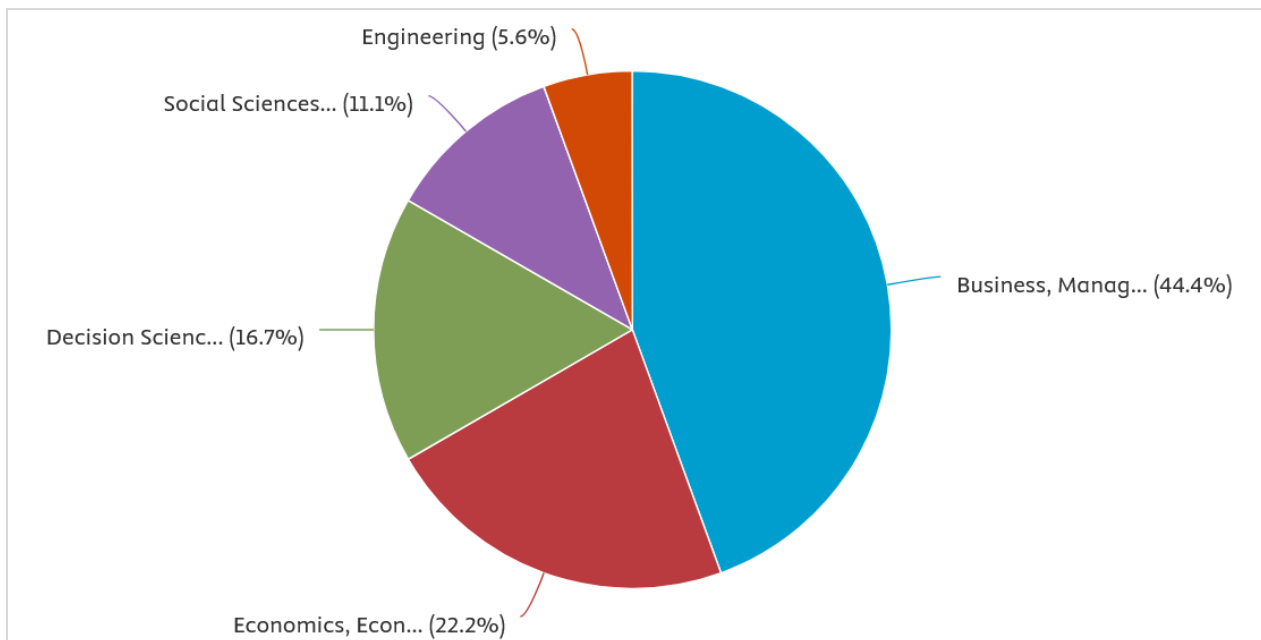


Figure 3. Disciplinary areas

Source: Scopus

The business area is followed by the economic-general area (22.2%), then that of decision-making sciences (16.7%), and so on.

Nevertheless, the extant studies provide relevant insights that inform the development of a solid theoretical and methodological framework.

It is widely accepted among scholars that the logic of profit maximisation should not be regarded as the sole paradigm of business success. This is due to the mutualistic form that characterises these companies.

Chakraborty et al. (2004) [4], for instance, propose an alternative perspective grounded in “humanised” management models, encompassing social responsibility, internal cooperation, spirituality, and the generation of social capital. These models offer a superior means of emphasising the multi-stakeholder orientation and territorial roots.

In an alternative proposal, Jamshidnezhad and Bagherzadeh (2017) [10] proposed a fuzzy model based on indicators weighted by expert knowledge. The most significant factors for performance enhancement are social responsibility and training.

Finally, Gausemeier et al. (2000) [8] introduce a cooperative engineering model that strategically integrates the interaction between different actors in production processes, which is also relevant for planning educational services.

It is evident that, given the nature of the activities in which these cooperatives are engaged, they are well-positioned to contribute to innovative processes, as proposed by Zhang and Ding (2024) [20]. In China, university science parks (public-private cooperatives) have been shown to exert a positive influence on the green innovation of companies, thereby illustrating the capacity of educational cooperatives to function as a catalyst for technological and social development.

The reference to university courses can also be found in the research of Ng and Burke (2006) [14], who analyse the impact of educational cooperation, noting positive effects on the realism of expectations and self-efficacy in students.

Conversely, other studies have emphasised the significance of functional interpersonal relationships, indispensable for optimal performance. For instance, Lam et al. (2016) [11] have demonstrated how interpersonal relationships influence emotions and work performance.

Tomášková and Kaoňovská (2018) [18] also emphasise the importance of cross-functional coordination and the cooperative climate in expanding the service offering.

Finally, Rivlin and Wholey (1969) [17] emphasised the significance of systemic and longitudinal evaluation in compensatory educational programmes, asserting that the most effective interventions are adequately funded and methodologically structured.

The extant international studies, albeit few and lacking in comprehensive scope, suggest that the performance of cooperatives, most particularly in the field of education, should be measured in a multidimensional way. Economic and financial performance must be integrated with social, relational and impact parameters. However, the present study focuses exclusively on the former, thereby postponing the expansion of the scope of the study to future developments.

2.2. Italian literature

The Italian literature not indexed on Scopus lends further support to this hypothesis, as it confirms the growing importance of cooperative enterprises dedicated to educational and training services, especially for the activity of social cooperatives. According to the Istat-Euricse report (2019) [9], social cooperatives are numerous and contribute to added value and employment.

An exhaustive examination of the economic and financial performance of social cooperatives was conducted by Borzaga and Fontanari (2017) [3]. These institutions’ economic and financial solidity can be attributed to the regulatory framework that constrains the distribution of profits, democratic governance, and the presence of qualified managers. However, smaller entities

may encounter challenges in attaining sufficient capital and financial reserves. As the OECD report (2021) [15] indicates, analogous apprehensions have also been expressed. The report identified lower productivity levels than those observed in for-profit companies. However, better social promotion and significant employment development compensate for this deficit, especially in the less economically wealthy territories.

Finally, experiences of social reports, such as that of the DOC Educational cooperative (2020) [6], can be exemplary for evaluating and reporting the various education and training activities.

Further exploration of this economic sector is required. Specific research questions relating to dimensional parameters must be addressed to achieve this.

Research Question 1: What developments have occurred in their market?

Research Question 2: What is the scale of their investments and equity holdings?

Research Question 3: How did the above factors impact employment?

Research Question 4: What are the structural characteristics of the analysed sector?

3. Methodology

To address the questions derived from the necessity to expand knowledge on this segment of cooperative enterprises, an empirical analysis was conducted on a sample of 2,770 Italian companies operating in the education sector. These companies were identified through the ATECO 2007 code, section 85 (“Education”), extended to all the related subcodes. The personal and balance sheet data are extracted from one of the databases managed by the Moody’s company, relating to the decade 2014-2023. Quantitative data have been selected to examine the structural evolution of the Italian educational cooperative sector from a long-term perspective. Regarding dimensional parameters, a selection of four was made:

1. Turnover is an indicator of the value of production and market presence.
2. The total assets are indicative of the capital structure.
3. Equity is a significant factor in financial solidity.
4. The number of employees and the evaluation of employment opportunities are relevant factors in this context.

A ten-year comparative analysis facilitates the identification of general trends, discontinuities, and structural changes in the economic and financial composition of the sector. In this initial phase, the profitability ratios were not given consideration, on account of the difficulties of interpretation related to the accounting of the “rebate” and those of the financial structure, which were the subject of subsequent investigations.

For the companies for which data were available (the number of observations was variable but increasing over the decade), the main descriptive statistics were calculated and interpreted, including: The following statistical functions are to be employed: mean, standard error, median, mode, standard deviation, sample variance, kurtosis, asymmetry, interval, minimum, maximum and sum.

Subsequently, the mean and median were identified as the primary metrics for analysis, and their historical trend was graphically represented. The interpolating line has also been identified, allowing the data to be projected for the following three years. The line was obtained after identifying its equation, and the value of its expressivity was quantified with the index R^2 .

The present paper constitutes the initial phase of establishing a systematic empirical observatory on the economic and financial dynamics of the cooperative education sector in Italy. The observatory will integrate studies that have employed a similar approach, albeit concerning other types of statistical samples [7].

4. Results obtained and discussions

4.1. Turnover

The initial dimensional parameter used was the turnover, which can be more accurately defined as “earned”, given that the values exclude value-added tax. As illustrated in Table 1, the quantitative analysis yielded results that are expressed in thousands of euros.

Table 1. Analytical Data and Descriptive Statistics - Revenue

Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Average	251.6	316.5	306.9	335.1	342.3	359.3	296.5	358.1	409.8	466.7
Std error	17.2	20.0	18.1	20.4	20.4	20.9	18.6	22.2	23.4	27.2
Median	70.0	81.1	91.5	96.8	100.4	105.3	77.4	106.3	125.7	146.6
Mode	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Std deviation	653.6	800.4	733.4	835.4	851.1	887.9	793.2	955.4	1,017.9	1,148.0
Sample variance	427,254	640,663	537,928	697,864	724,350	788,295	6,291,830	9,128,434	1,036,212	1,317,7930
Kurtosis	94.7	64.4	55.1	61.2	61.8	58.8	71.4	89.8	56.6	57.1
Asymmetry	8.0	6.8	6.3	6.7	6.7	6.7	7.2	8.0	6.5	6.6
Interval	11,509.7	12,068.5	9,902.0	11,811.7	11,899.9	11,765.2	11,524.7	16,024.7	13,900.2	15,410.7
Minimum	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Maximum	11,509.7	12,068.5	9,902.0	11,811.7	11,899.9	11,765.2	11,524.7	16,024.7	13,900.2	15,410.7
Sum	363,009	509,286	502,470	564,007	598,762	646,731	539,594	663,470	776,245.8	832,602.9
Observations	1,443	1,609	1,637	1,683	1,749	1,800	1,820	1,853	1,894	1,784

Source: Our elaboration.

As demonstrated in Table 1, there has been an upward trend in the number of observations over the past few years, except for the most recent year, which has shown an unexpected decline. It is regrettable to note that a high amount of data is unavailable, given that the sample consisted of 2,770 companies. The sheer magnitude of the available information can be regarded as indicative of a persistent and pronounced augmentation in market presence, as evidenced by the prevailing upward trend in both the average and median figures, which exhibited a decline exclusively during the year of the pandemic.

To identify these trends with greater clarity and to attempt to delineate the developments that are likely to occur in the following three years, it is necessary to identify the most suitable interpolating line and its representative value (see Table 2).

Table 2. Interpolating line and R²- Revenues

Indicator	Equation	R ²
Average	$y = 16.643x + 252.75$	0.6959
Median	$y = 6.2006x + 66.004$	0.6671

Source: our elaboration

As demonstrated in Figure 4, the broken line of average and median and the interpolating line with the relative projection can be drawn for the following three-year period (2024-2026).

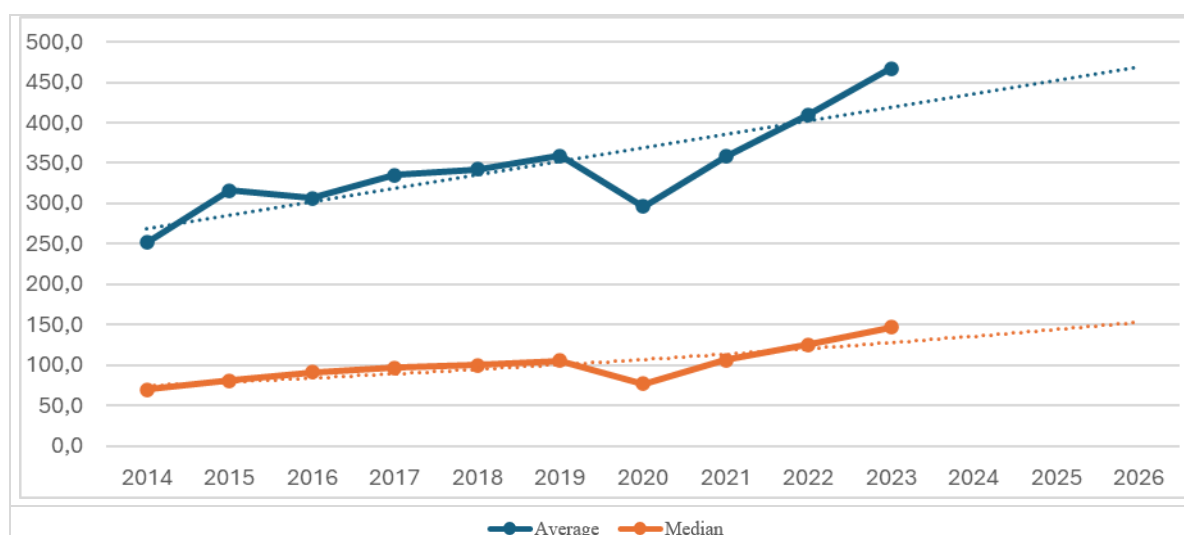


Figure 4. Historical and Forecast Trend Chart - Revenue

Source: Our elaboration

The graph illustrates that the mean values are higher than the median values, indicating a positively skewed distribution. Therefore, the distribution of revenues is influenced by a relatively small number of cooperatives with significantly above-average revenues, while most companies record lower revenues.

Consequently, a limited number of companies possess a substantial market share.

The ten-year upward trend of standard deviation also demonstrates a progressive increase in dispersion among cooperatives over time. In other words, the disparities between cooperatives are becoming increasingly evident. Consequently, some companies are undergoing substantial growth, while others are encountering significant intensified challenges.

4.2. Total assets

It is now necessary to assess the size of these cooperatives, employing the same methodology. Firstly, a summary table is provided, which contains the main descriptive statistics relating to total assets. These statistics are expressed in thousands of euros (see Table 3).

Table 3. Analytical data and descriptive statistics - Total assets

Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Average	280.6	336.0	349.9	366.4	389.1	405.0	434.3	461.5	486.8	529.6
Std error	19.1	21.5	23.9	24.0	25.0	26.2	26.2	27.0	27.6	30.1
Median	68.9	79.4	84.4	87.3	90.2	94.3	116.9	122.9	126.2	142.8
Mode	2.1	3.2	130.3	21.6	25.0	19.4	99.4	20.2	48.7	476.8
Std deviation	725.0	863.6	965.8	983.7	1,046	1,1110	1,1170	1,162.2	1,201.4	1,271.1
Sample variance	525,569	745,889	932,799	967,714	1,094,139	1,234,386	1,247,790	1,350,703	1,443,254	1,615,573
Kurtosis	50.5	46.8	83.5	70.4	63.1	72.1	52.9	50.5	44.5	40.3
Asymmetry	6.4	6.1	7.7	7.2	6.9	7.3	6.4	6.2	5.9	5.6
Interval	7,733.6	10,424.6	16,450.2	14,750.4	14,833.4	16,134.0	14,767.3	14,755	14,793.4	15,883.4
Minimum	0.0	0.0	0.1	0.3	0.1	0.1	0.3	0.2	0.0	1.0
Maximum	7,733.6	10,424.6	16,450.3	14,750.7	14,833.6	16,134	14,767.7	14,755.1	14,793.4	15,884.3
Sum	405,205	540,553.5	572,776.9	616,677.2	680,530.9	729,056.6	790,420.4	855,075	922,029	944,788.1
Observations	1,444	1,609	1,637	1,683	1,749	1,800	1,820	1,853	1,894	1,784

Source: Our elaboration

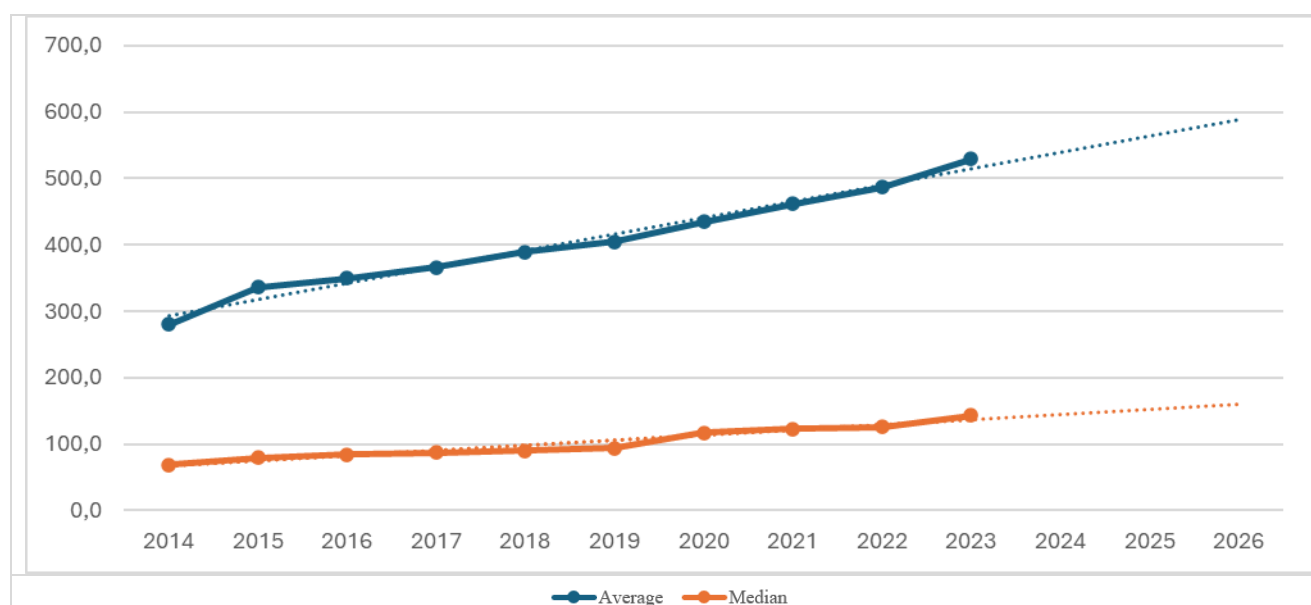
In this instance, the quantity of available data increases over time, albeit not to the same extent as the theoretical maximum. The interpolating line is then identified (Table 4).

Table 4. Interpolating line and R² - Total assets

Indicator	Equation	R ²
Average	$y = 24.692x + 268.11$	0.9811
Median	$y = 7.7486x + 58.709$	0.9455

Source: Our elaboration

The high value of R² is indicative of an interpolating line that is perfectly expressive of the phenomenon. This is followed by a clear graphical representation of the mean and median trend (Figure 5).

**Figure 5. Historical and Forecast Trend Chart – Total Assets**

Source: Our elaboration

The average of total assets demonstrated a consistent growth trajectory, exhibiting an overall increase of 88.7%. The sector underwent significant growth and development over the decade, driven by substantial investments.

However, the median is lower than the average, confirming that the sample is characterised by cooperatives with modest assets and a few large companies.

The 75% increase in standard deviation indicates a substantial increase in variability regarding corporate assets. The range, asymmetry and kurtosis index trend confirms a highly unbalanced distribution “to the right”, with a preponderance of small cooperatives and a small number of huge ones.

To summarise, the sector of Italian educational cooperatives is expanding, but an evident polarisation also marks it.

4.3. Equity

Firstly, the descriptive statistics are presented, with values expressed in thousands of euros (see Table 5).

Table 5. Analytical Data and Descriptive Statistics - Equity

Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Average	49.47	69.46	75.05	81.38	86.29	92.13	104.50	115.36	123.54	141.27
Std error	5.98	6.58	6.88	7.24	7.60	8.18	8.70	9.00	9.93	10.94
Median	7.97	10.78	13.16	14.26	14.98	15.97	24.27	25.99	25.51	30.14
Mode	1.50	1.14	0.53	1.50	81.16	12.20	0.60	63.79	24.54	57.16
Std deviation	227.14	263.82	278.44	297.01	317.70	347.21	371.10	387.55	432.06	462.25
Sample variance	51,594	69,599.4	77,531.3	88,215.2	100,931	120,554	137,716	150,193	186,678	213,674
Kurtosis	93.95	78.24	93.60	111.56	112.67	129.18	123.97	96.30	83.57	70.32
Asymmetry	6.99	7.64	8.14	8.80	8.89	9.58	8.90	8.39	6.63	5.87
Interval	5,636.4	4,918.67	6,068.64	6,348.69	6,767.95	7,332.51	9,247.21	7,340.48	10,962.8	11,389.5
Minimum	-2,172	-1,045.1	-1,247.4	-641.65	-675.03	-1,020.3	-2,666.3	-883.56	-4,672.3	-5,094.2
Maximum	3,464	3,874	4,821.2	5,707	6,093	6,312	6,581	6,457	6,290	6,295.3
Sum	71,428	111,754	122,859	136,969	150,928	165,826	190,186	213,754	233,981	252,024
Observations	1,444	1,609	1,637	1,683	1,749	1,800	1,820	1,853	1,894	1,784

Source: Our elaboration

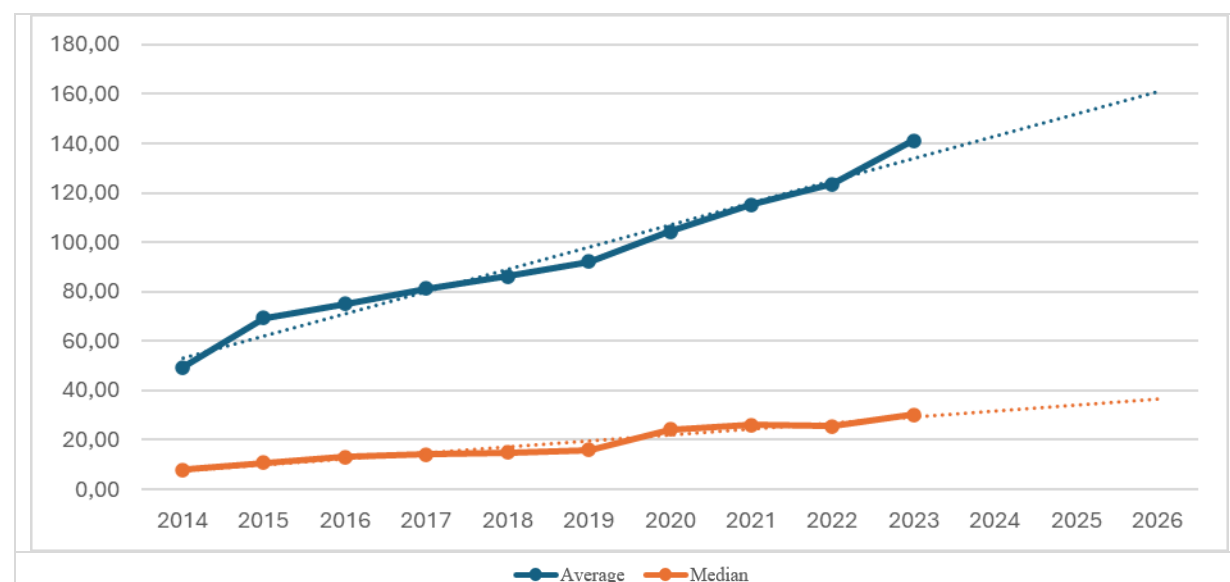
Subsequently, the most suitable equation for the interpolating line is determined (Table 6).

Table 6. Interpolating line and R² - Equity

Indicator	Equation	R ²
Average	$y = 8.9788x + 44.46$	0.9724
Median	$y = 2.4107x + 5.0427$	0.9414

Source: Our elaboration

In this instance, the high value of R² determines an interpolating line perfectly expressive of the phenomenon. As illustrated in Figure 6, this is followed by a clear graphical representation of the mean and median trends.

**Figure 6. Historical and Forecast Trend Chart – Equity**

Source: Our elaboration

The average equity has grown by approximately 185% over a decade, thereby significantly strengthening companies' capital. The median has also increased gradually, resulting in a wider gap between it and the average.

When considered in conjunction with the others, this parameter also confirms the sector's strong polarisation: most cooperatives possess minimal capital, while a few large companies have substantial resources. This finding lends further credence to the hypothesis that a small number of medium-large companies complements a broad base of micro-cooperatives.

The rise in the mean equity value indicates the financial robustness of the educational cooperative sector. However, this is obscured by the presence of significant disparities.

4.4. Employees

The data obtained from the sample are presented in Table 7, with values expressed in units.

Table 7. Analytical Data and Descriptive Statistics - Employees

Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Average	11.62	11.91	12.30	12.11	12.18	12.16	12.27	12.62	13.54	9.95
Standard error	0.61	0.58	0.61	0.61	0.64	0.64	0.64	0.60	0.79	0.52
Median	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	4.00
Mode	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Standard deviation	24.25	23.39	25.03	25.32	26.97	27.17	27.01	25.60	28.96	23.39
Sample variance	587.86	547.13	626.44	641.03	727.59	738.35	729.41	655.15	838.70	547.24
Kurtosis	77.70	43.88	47.28	62.09	81.12	83.88	90.11	57.20	51.81	67.61
Asymmetry	6.98	5.52	5.77	6.40	7.34	7.50	7.82	6.22	5.95	6.73
Interval	417	305	358	414	477	482	448	358	396	396
Minimum	0	0	0	0	0	0	0	0	0	0
Maximum	417	305	358	414	477	482	448	358	396	396
Sum	18,543	19,267	20,448	20,640	21,428	21,687	22,087	22,914	17,976	20,256
Observations	1,596	1,618	1,662	1,704	1,760	1,783	1,800	1,816	1,328	2,036

Source: Our elaboration

Therefore, the equation of the interpolating line is as follows (see Table 8).

Table 8. Interpolating line and R²- Dependents

Indicator	Equation	R ²
Average	$y = -0.0097x + 12,118$	0.0011
Median	$y = -0.0545x + 5,2$	0.2727

Source: Our elaboration

Unfortunately, the interpretative value of the interpolating lines is so minimal. This must be considered during the interpretation of Figure 7, in which the elements are presented in graphical form.

The average number of employees per cooperative remained stable, fluctuating between 11.6 and 13.5 employees, peaking in 2022, but a sudden and unexpected drop to 9.95 in the following year was observed. The underlying cause of the observed phenomenon should be the object of rigorous investigation, with potential causative factors including alterations in the sample or transient effects of an administrative or occupational nature.

It is estimated that at least 50% of cooperatives have fewer than five employees, although a substantial number of companies without employees use the activity of members or external consultants.

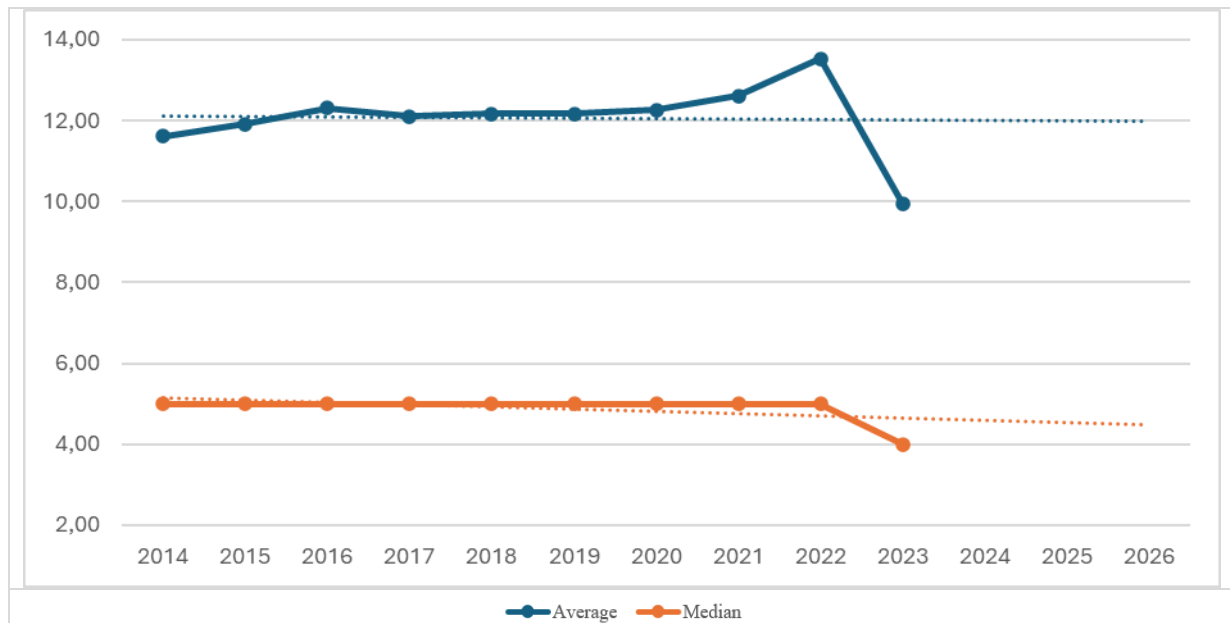


Figure 7. Historical and Forecasted Trend Chart – Employees

Source: Our elaboration

The employment dimension is characterised by a notable heterogeneity in the sample, with a preponderance of substantial companies and a significant presence of small and exceedingly small entities. It is encouraging to observe a favourable trend in employment growth, which is projected to continue until 2022. This expectation is further supported by the observed consistency in the data, which suggests a stable average value, with the possibility of a marginal decline. The validity of this projection is further reinforced by the expectation of continued employment growth beyond 2022, although the data does not provide a clear indication of this.

5. Conclusions

This paper has contributed to understanding the economic and financial dynamics of Italian cooperative enterprises operating in the education and training sector. The financial statements of a sample of 2,770 cooperatives, examined in 2014-2023, were analysed to illustrate a structured picture of their economic and employment dimensions.

The analysis revealed an augmentation in the primary metrics under scrutiny: average income exhibited an escalation of 85%, total assets demonstrated a surge of 88.7%, and equity experienced a substantial growth of 185%. The average number of employees has also increased, albeit marginally. Regrettably, this considerable economic growth has not been accompanied by equivalent employment benefits.

Consequently, the sector is growing, substantiating cooperative enterprises' inherent robustness [7].

However, statistical verifications highlight a heterogeneous reality: the data distributions are highly asymmetrical and characterised by high kurtosis values, confirming a polarised structure. The sector is characterised by a preponderance of micro-enterprises, which coexist with a minority of medium-sized cooperatives. These cooperatives are responsible for generating the largest share of production and employment.

In the present study, the authors have elected to focus exclusively on balance sheet quantities that are readily identifiable and assessable. This decision has been taken to minimise the potential impact of profitability ratios that may be subject to variability due to the accounting of the rebate [16; 1]. The data presented in this study is deemed more dependable for mapping the sector. However, further evaluation tools more adherent to cooperative specificity are required, such as social impact metrics or fuzzy models [10].

The ensuing essay intends to give the reader a comprehensive overview of the extant literature on the subject.

The extant international and Italian literature on the subject, albeit limited in scope, provides ample evidence that the measurement of cooperative performance cannot disregard its multidimensional and contextualised dimension (see [19] and [3]). The Italian educational cooperatives' social and territorial role is of particular significance, which merits consideration in conjunction with financial data. Elements about inclusion, educational quality and the co-production of public value must also be given consideration. The failure to consider these factors constitutes a significant limitation of the present research.

Nevertheless, the results obtained are beneficial for political and operational aspects. The analysis suggests that strengthening the size of the smaller cooperatives is advisable to reduce polarisation and encourage their persistence in increasingly complex and articulated areas.

The Italian educational cooperative sector is expanding and displaying signs of resilience. However, it remains structurally fragile and requires both endogenous and exogenous interventions that employ complex and articulated measurement tools to express its economic and social role more accurately.

References

1. AGCI FRIULI VENEZIA GIULIA. I ristori e le perdite nelle società cooperative. Available: <https://agci.fvg.it/i-ristorni-e-le-perdite-nelle-societa-cooperative/> (Visited 10.05.2025).
2. BORZAGA, C., FAZZI, L. Il ruolo delle imprese sociali nei sistemi di welfare locale. *Politiche Sociali*. 2014, nr. 2.
3. BORZAGA, C., FONTANARI, E. Le performance delle cooperative sociali. *Rivista Impresa Sociale*. 2017. Available: <https://www.rivistaimpresasociale.it/rivista/articolo/le-performance-delle-cooperative-sociali> (Visited 10.05.2025).
4. CHAKRABORTY, S.K., KURIEN, V., SINGH, J., ATHREYA, M., MAIRA, A., AGA, A., GUPTA, A.K., KHANDWALLA, P.N. Management paradigms beyond profit maximisation. *Vikalpa*. 2004, vol. 29(3), pp. 97–117. DOI: <https://doi.org/10.1177/0256090920040308>
5. COMMISSIONE EUROPEA. Social Economy Action Plan. Bruxelles: European Commission, 2021. <https://ec.europa.eu/social/economy> (Visited 10.05.2025).
6. DOC EDUCATIONAL. Bilancio Sociale 2020. Torino: DOC Educational, 2020. https://doceducational.it/wp-content/uploads/2021/11/bilancio-sociale_DocEducational-2020_def.pdf (visited 10.05.2025).
7. FUSCO, F., MIGLIACCIO, G. Crisis, Sectoral and Geographical Factors: Financial Dynamics of Italian Cooperatives. *Euromed Journal of Business*. 2018, vol. 13(2), pp. 130–148. DOI: <https://doi.org/10.1108/EMJB-02-2016-0002>
8. GAUSEMEIER, J., MÖHRINGER, S., WLEKLINSKI, C. Cooperative product engineering: A new understanding of engineering interaction. *ZWF Zeitschrift für Wirtschaftlichen Fabrikbetrieb*. 2000, vol. 95(10), pp. 478–482.
9. ISTAT, EURICSE. Struttura e performance delle cooperative italiane. Rome: Istat, 2019. Available: https://www.istat.it/it/files/2019/01/Rapporto_cooperative.pdf (Visited 10.05.2025).
10. JAMSHIDNEZHAD, A., BAGHERZADEH, F. A fuzzy ranking model to performance assessment of cooperative companies. *Journal of Applied Economic Sciences*. 2017, vol. 12(8), pp. 2388–2398.
11. LAM, C.K., HUANG, X., WALTER, F., CHAN, S.C.H. Coworkers' relationship quality and interpersonal emotions in team-member dyads in China: The moderating role of cooperative team goals. *Management and Organization Review*. 2016, vol. 12(4), pp. 687–716. DOI: <https://doi.org/10.1017/mor.2016.19>
12. LEGGE 328/2000. Legge quadro per la realizzazione del sistema integrato di interventi e servizi sociali. Official Gazette of the Italian Republic.

13. LEGGE 381/1991. Disciplina delle cooperative sociali. Official Gazette of the Italian Republic, n. 93 del 22 April 1991.
14. NG, E.S.W., BURKE, R.J. The next generation at work – business students’ views, values and job search strategy: Implications for universities and employers. Education + training. 2006, vol. 48(7), pp. 478–492. DOI: <https://doi.org/10.1108/00400910610705872>
15. OCSE. La dimensione territoriale della produttività nelle cooperative italiane. Paris: OECD Publishing, 2021. https://www.oecd.org/content/dam/oecd/it/publications/reports/2021/03/the-spatial-dimension-of-productivity-in-italian-co-operatives_812fc9f2/b1dd43d5-it.pdf (visited 10.05.2025).
16. OIC – ORGANISMO ITALIANO DI CONTABILITÀ. Specificità delle società cooperative – Emendamenti ai principi contabili nazionali. 2022. Available: <https://www.mysolution.it/fisco/approfondimenti/commenti/2022/06/societa-cooperative-loic-modifica-alcuni-principi-contabili-barone/> (Visited 10.05.2025).
17. RIVLIN, A.M., WHOLEY, J.S. Education of disadvantaged children. Socio-Economic Planning Sciences. 1969, vol. 2(2–4), pp. 373–380. DOI: [https://doi.org/10.1016/0038-0121\(69\)90032-9](https://doi.org/10.1016/0038-0121(69)90032-9)
18. TOMÁŠKOVÁ, E., KAOŇOVSKÁ, L. Interfunctional coordination in extended conception and offering of services. Scientific Papers of the University of Pardubice, Series D. 2018, vol. 26(44), pp. 233–244.
19. ZAMAGNI, S., VENTURI, P., RAGO, S. Valutare l’impatto sociale. La questione della misurazione nelle imprese sociali. Bologna: Il Mulino, 2015. ISBN 9788815253911.
20. ZHANG, Y., DING, S. How do national university science parks influence corporate green innovation? Evidence from Chinese listed companies. Quantitative Finance and Economics. 2024, vol. 8(4), pp. 757–778. DOI: <https://doi.org/10.3934/QFE.2024029>.

THE CONTRIBUTION OF ITALIAN COOPERATIVE ENTERPRISES TO EDUCATION, TRAINING AND TRAINING PROCESSES: AN OVERVIEW*

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Abstract

This paper investigates the role of Italian cooperative enterprises in educational and training processes, aiming to fill a gap in the scientific literature and make visible a widespread but often marginalised heritage. The investigation is based on an exploratory-descriptive approach that integrates a theoretical-argumentative reading with a bibliometric analysis conducted on the Scopus database. Seven contributions to the social, psychological and human sciences were selected and analysed through semantic visualisations obtained with VOSviewer, highlighting the thematic fragmentation, the absence of cohesive theoretical clusters and the weakness of a shared pedagogical lexicon. In parallel, a structural analysis was conducted on cooperative enterprises operating in the education sector, through the extraction of 2,770 units active in the period 2014–2023, recorded in a Moody’s Analytics database. Integrating

* This paper is the result of the collaborative work of the two authors. However, it is possible to attribute the different paragraphs in relation to the main tasks performed. Sabrina Lucilla Barone conceived and set up the work, outlining its methodological aspects. She also curated the bibliometric and bibliographic analysis, framing the topic in the international scientific panorama and drew the conclusions of the entire work. Therefore, the paragraphs “Introduction”, “Regulatory and policy framework”, “Methodology and epistemological framework”, “Scopus Survey Results”, “Bibliometric mappings”, “Critical re-reading of the evidence emerging from the literature indexed in Scopus” and “Conclusions” can be attributed to her. Guido Migliaccio, on the other hand, researched and elaborated the sector data, processing and commenting on them. Therefore, the paragraph “Geography and structure of educational cooperation” with its subparagraphs must be attributed to him.

scientific sources and empirical data allows us to outline a complex picture of the cooperative contribution to education, highlighting transformative potential and epistemic and institutional criticalities. The results call for greater academic and political attention towards cooperative educational practices, understood as inclusive and generative devices, capable of promoting social cohesion, active citizenship and educational justice in the territories.

Keywords: Cooperative enterprises, Social pedagogy, Bibliometric analysis, Social enterprises

JEL: I20, L31, P13

1. Introduction

The concept of education has experienced and is experiencing a profound metamorphosis, opening beyond the boundaries of formal education to embrace transversal, interconnected and vital dimensions: from lifelong learning to non-formal education, from experiential learning to community learning. In this evolution, the Italian cooperative sector has revealed itself to be a silent but essential protagonist, capable of giving shape to educational devices rooted in the territories, attentive to contexts and capable of intercepting needs often overlooked by public institutions or the for-profit market.

The cooperative enterprise, intrinsically relational and mutualistic by nature, is configured as a fully-fledged pedagogical subject, capable of combining equity with innovation, proximity with social responsibility. Its organisational structure, founded on democratic participation, peer learning, active inclusion of members and intergenerational transmission of knowledge, embodies an implicit pedagogy, oriented towards the integral growth of the person and the generation of human and social capital [4; 21].

Social cooperatives are key nodes in the processes of co-design and co-production of educational services, often operating in synergy with public administrations through agreements, accreditations and partnerships. These entities do not limit themselves to “managing” educational services, but transform them into places of educational care, personalisation of interventions, and construction of significant links and contamination between disciplinary knowledge and life knowledge. At the same time, other cooperative forms - cultural, youth, production-work - contribute to building widespread learning environments, promoting civic literacy, active participation and empowerment of citizens, especially young and vulnerable groups.

However, cooperatives’ contribution to educational processes is not free from contradictions. While offering opportunities for consolidation, institutional recognition risks fueling bureaucratisation and standardisation processes, which can obscure the generative and community components of cooperative action. Furthermore, the limited structural integration between the cooperative world and formal education and training systems raises crucial questions about the epistemic legitimacy, public visibility and long-term transformative impact of such experiences [25].

In this interpretative horizon, this paper offers a critical overview of the role played by Italian cooperative enterprises in the processes of education, instruction and training, to restore visibility to a set of educational experiences often neglected by mainstream analyses, but capable of profoundly impacting the relational and social quality of the territories.

The work focuses on analysing the plurality of cooperative subjects involved, reconstructing the complexity of the educational models implemented and the pedagogical visions that animate them. Particular attention is paid to identifying the main areas of intervention and the interaction

methods between the cooperative system and public institutions, highlighting practices of co-design, customisation of interventions and promotion of educational communities. The investigation also focuses on the social consequences of these experiences, considering both the results achieved and the critical issues that emerged, in a context marked by regulatory constraints and tensions between logics of proximity and instances of standardisation. Finally, the study opens a reflection on the prospects of the cooperative contribution to education, in the light of the sustainable development objectives outlined by the 2030 Agenda and recent European policies on the social economy [6], questioning the transformative potential of cooperatives in outlining more inclusive, equitable and participatory educational scenarios.

2. Regulatory and policy framework

The contribution of Italian cooperative enterprises to education and training is part of a complex and stratified regulatory horizon, reflecting the profound transformations that have occurred in understanding the relationship between the State, civil society and educational responsibility. Social cooperation is therefore configured as an alternative economic actor, but even more as a collective pedagogical subject, capable of generating spaces of learning that are situated, relational and oriented towards social justice.

Law 381/1991 [11] represented an absolute threshold of institutionalisation of the educational role of the cooperative world, favouring the birth and widespread diffusion of experiences in nurseries, kindergartens, centres for minors and in vocational training. In these contexts, cooperative action translated into pedagogical practices rooted in the territories, attentive to emerging needs, often before the traditional public response.

This first regulatory opening was followed by further consolidation with Law 328/2000 [10], which outlined the integrated social interventions and services system. This law valorised cooperation not only as a provider of services but as a competent interlocutor in educational co-design processes, from a perspective of circular subsidiarity. Legitimising the general interest of educational and training services allowed social cooperation to operate in contexts with a high density of social vulnerability or territorial marginality, promoting an education that cares, includes and transforms [18].

The Third Sector Code (Legislative Decree 117/2017) [13] has provided a new framework of meaning and action, making explicit the pedagogical relevance of the activities carried out by social enterprises and encouraging the adoption of innovative educational models, based on co-responsibility between the public and private social sectors. Cooperatives recognised as social enterprises can now access dedicated financing tools (e.g. European structural funds, banking foundations, impact investing), and participate in educational projects financed by the National Recovery and Resilience Plan (PNRR), in the context of “Mission 4 - Education and Research”[20].

At the European level, the Social Economy Action Plan [6] explicitly recognises the potential of social economy enterprises in promoting transversal skills, active citizenship and lifelong learning. In line with the European Skills Strategy 2020 and the Digital Education Action Plan 2021–2027, cooperatives are considered key actors for educational innovation, especially in green and digital transition contexts [4].

At the international level, the United Nations Guiding Document for the 2030 Agenda recognises cooperative enterprises as a strategic vector for achieving the Sustainable Development

Goals, in particular: SDG 4 (Quality Education), SDG 8 (Decent Work and Economic Growth) and SDG 10 (Reduction of Inequalities). In this direction, the International Year of Cooperatives 2025, proclaimed by the UN, represents a symbolic and operational opportunity to relaunch the pedagogical value of cooperation in the global political and scientific debate [15; 16].

However, despite the growing recognition at the regulatory and programmatic level, critical issues remain: the fragmentation of regulations between the various institutional levels; territorial inhomogeneities in accreditation systems; the lack of effective devices for evaluating the educational impact of cooperative actions. Added to this is a specific weakness in structuring participatory monitoring paths, which could enhance the most significant experiences and guide future policies.

It is therefore urgent to intensify the dialogue between education and the social economy, strengthening the spaces for action research, highlighting the synergies between universities, schools, and cooperation, and promoting the practice of co-constructed evaluation. Only in this way will it be possible to recognise cooperation not as a simple provider of services, but as a subject generating meaning, bonds and new forms of educational citizenship.

3. Methodology and epistemological framework

The research is based on an exploratory-descriptive approach, aimed at critically and systematically questioning recent scientific production regarding the contribution of cooperative enterprises to educational, training and scholastic processes.

In a perspective that intertwines pedagogical gaze and social sensitivity, it was decided to combine a theoretical-argumentative reading with a bibliometric analysis conducted on the international database Scopus, to detect trends, recurring thematic areas, lexical evolutions and main authorial networks on the topic.

The methodology adopted combines, therefore, two levels of investigation: on the one hand, a theoretical and argumentative review of the academic literature in the educational and cooperative fields; on the other, a bibliometric survey carried out on the Scopus database, selecting exclusively documents about the areas of social sciences, psychology, arts and humanities. The search returned a small but significant corpus of seven publications, whose thematic and lexical distribution was analysed according to their ability to reveal conceptual nodes, interpretative orientations and emerging trajectories. The string used for the query - *“Italian cooperative enterprises education”* - was applied to the title, abstract and keywords fields, to intercept the literature most relevant to the educational focus of this contribution. Data processing was conducted using the VOSviewer software [24], which allowed us to visualise the semantic and authorial relationships within the selected corpus, making the connections between the research’s themes, concepts and protagonists tangible. Bibliometrics, far from being reduced to a quantitative exercise, is intended as a hermeneutic tool capable of providing a structured but dynamic image of the field of study, making visible the emerging conceptual nuclei and the still unexplored epistemic gaps. This approach also allows us to detect the interdisciplinarity of cooperative discourse in the educational field, highlighting the intertwining of pedagogical, economic, sociological knowledge and public policies.

A second level of quantitative-descriptive investigation accompanies this first line of analysis to provide a structural overview of Italian cooperative enterprises active in the education sector. To this end, data were extracted from a Moody’s Analytics database [5] relating to 2,770

enterprises operating from 2014 to 2023, identified by the Ateco 2007 Code, macro-category 85: Education. All the relevant subcodes were included to cover the entire range of educational and training services: from nursery school to university, from sports and recreational courses to technical, cultural and professional training activities.

The breakdown of the subcodes analysed includes, among others, 85.10.00 (preschools), 85.20.00 (primary education), 85.31.10 and 85.31.20 (middle schools and high schools), 85.42.00 (university education), 85.59.20 (vocational training courses), and 85.60.01 (school guidance).

The integration between bibliometric analysis and structural reconnaissance allows for correlating the epistemic horizon of scientific production with the empirical configuration of the cooperative fabric operating in the educational sector, offering an articulated, situated and potentially generative vision.

In line with the qualitative and pedagogical paradigm of educational research, this approach aims to valorise what is said about cooperatives and what is not yet thematised, in the awareness that every bibliographic gap can translate into a heuristic and planning opportunity.

The data analysis - both bibliometric and anagraphic-organisational - is accompanied by critical reflections, capable of grasping the connection between scientific production, operational configurations and the transformative horizon of cooperative education in the contemporary Italian context.

4. Scopus Survey Results

4.1. Temporal distribution of scientific production

The temporal trend of publications indexed in the Scopus database was analysed to understand the evolution of academic interest in Italian cooperative enterprises concerning educational processes. Figure 1 displays the distribution of documents published from 2008 to 2020, providing a first look at the consistency and continuity of scientific production over time.

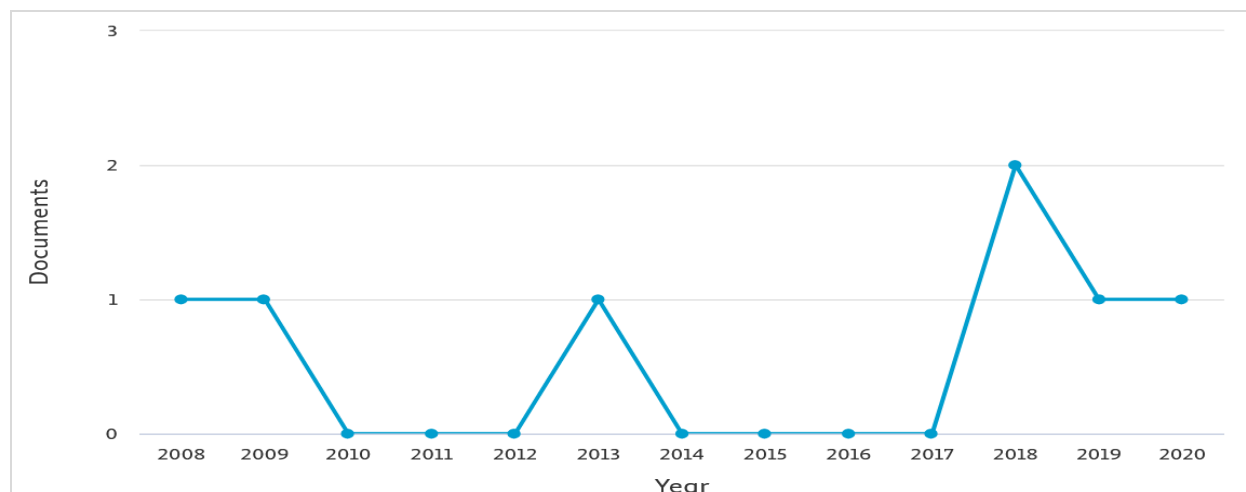


Figure 1. Evolution of scientific production

Source: Scopus

The temporal distribution highlights a discontinuous and unsystematic scientific production, which seems to emerge episodically rather than be structured. The absence of linear growth or

consistency over time highlights a structural weakness of the field of study, which struggles to establish itself as an autonomous and consolidated research area. The long-time intervals without publications, such as those between 2010 and 2012 or between 2014 and 2017, testify to a low production density, but above all reveal the absence of a cohesive and stable scientific community that continuously dedicates itself to the topic.

However, these gaps should not be read exclusively as a sign of irrelevance, but rather as traces of a karst interest, which emerges in response to specific solicitations of the social, political or educational context. The isolated appearance of some studies can therefore be interpreted as a symptom of a cultural urgency that, although still marginal, becomes visible occasionally in the international literature. At the same time, it cannot be excluded that the poor representation of documents may also depend on the intrinsic limits of the Scopus database, which tends to favour English-language and international journals, potentially excluding relevant contributions published in national venues or different languages.

Therefore, this fragmented and unequal temporal distribution calls for a broader reflection on the need to consolidate research in this area and promote greater visibility and systematisation of studies through targeted editorial strategies, interdisciplinary collaborations, and investments in scientific dissemination on a transnational scale.

4.2. Geographical distribution of scientific production

Mapping scientific production by country of affiliation of the authors reveals a surprisingly broad distribution, although characterised by single and sporadic contributions. The graph below (Figure 2) summarises this distribution.

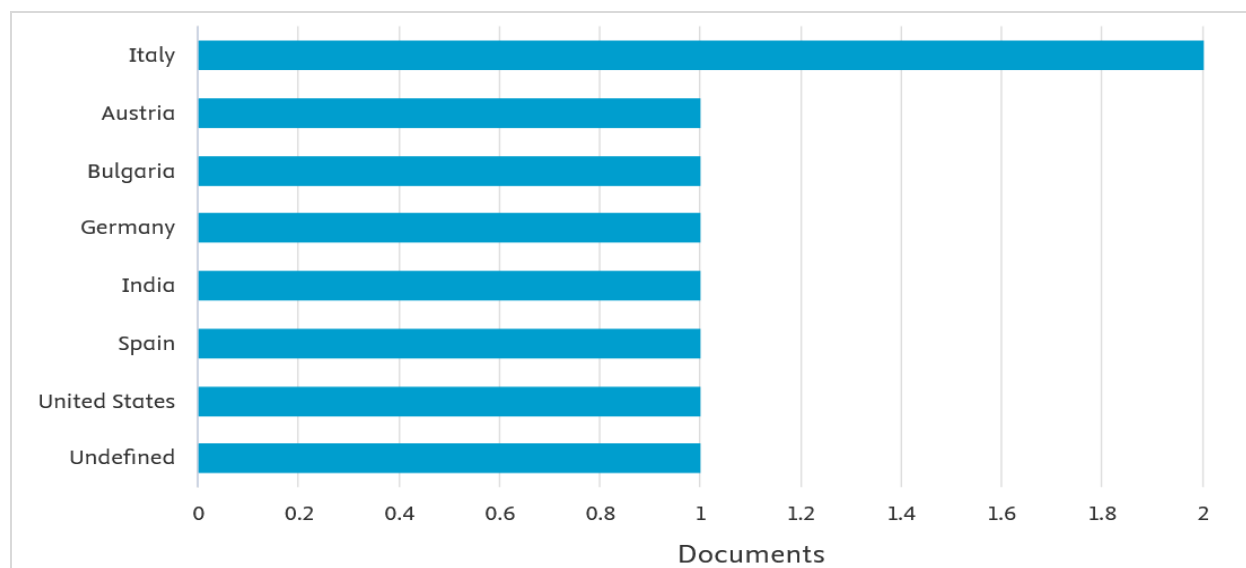


Figure 2. Documents by country or territory

Source: Scopus

Italy confirms itself as the most represented country, with two publications out of seven, indicating a certain geographical-cultural proximity to the topic discussed, which finds a fertile ground for reflection and experimentation in the Italian context. However, it is significant to note how other countries - including Austria, Bulgaria, Germany, India, Spain and the United States -

have also produced at least one significant contribution, suggesting an international diffusion of interest in the relationship between cooperative enterprises and education, albeit lacking systemic coherence.

This fragmentation indicates the absence of a solid transnational research network, since there are no persistent thematic nuclei or structured dialogues between academic centres in different countries. On the contrary, the production appears dispersed and probably linked to individual initiatives or local projects not included in a shared theoretical or comparative framework. In this sense, the data “Undefined”, which refers to an authorship not identified territorially, further reinforces the idea of a fully structured literature.

This panorama offers both a challenge and an opportunity. On the one hand, it highlights the urgency of building a more cohesive and dialogic field of studies; on the other, it allows us to glimpse the possibility of starting future international collaborations, capable of connecting currently isolated approaches and perspectives. In this sense, activating inter-university research networks and promoting thematic calls capable of valorising this latent plurality is desirable.

4.3. Editorial typologies as a mirror of a dispersed field

The graph (Figure 3) shows the typological distribution of scientific contributions relating to Italian cooperative enterprises in the educational field.

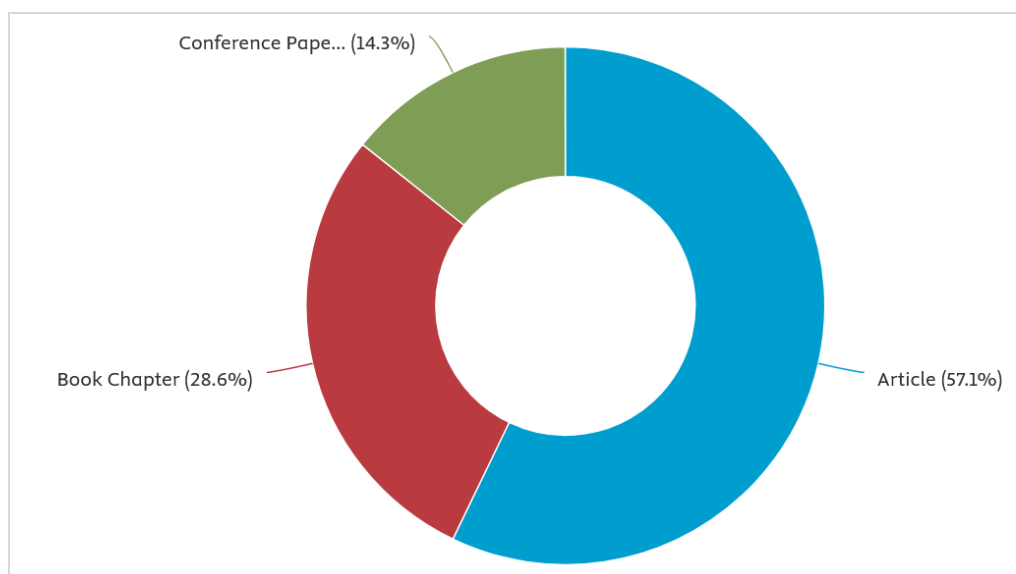


Figure 3. Documents by type

Source: Scopus

Although indicating a predominance of journal articles (57.1%), followed by book chapters (28.6%) and a smaller number of contributions in conference proceedings (14.3%), the numerical data hides much deeper and more complex dynamics. The prevalence of articles could suggest an attempt, still embryonic, to legitimise the theme within the more traditional channels of academic communication. However, the absence of an exclusive concentration on sector journals denotes a heterogeneous dissemination that struggles to build a cohesive disciplinary identity.

The significant weight of the chapters in the volume, often the result of collective editorial projects, suggests that the topic is addressed mainly in interdisciplinary contexts or thematic collections, rather than in dedicated and continuous scientific venues. Rather than testifying to

marginality, this data highlights the still hybrid and partly peripheral nature of the research, whose visibility depends more on the curatorial will than on a consolidated epistemic need.

Finally, the smaller percentage represented by conference papers should not be read only as an indicator of poor dissemination in the public or academic sphere, but as a sign of a scientific community struggling to form an active and dialogic network. In other words, there is a lack of a stable connective tissue, made up of meetings, comparisons and periodic debates, capable of giving continuity and resonance to this line of studies. Also for this reason, rather than a cohesive corpus, the picture returns the image of a scattered archipelago, made up of individual voices that still struggle to form a system.

5. Bibliometric mappings

5.1. Isolated voices in a silent chorus: the fragile eco-system of quotations

Table 1 presents the most cited publications and offers useful indications for understanding the dynamics of building a scientific community still in the process of being defined, in which some contributions attract greater attention, thus acting as points of reference over time.

Table 1. Most cited documents

N.	Document	Quotes
1	Messina (2018)	22
2	Tzanova (2020)	7
3	Arroyo Gonzalez (2009)	7
4	Fichter Wolf (2008)	4
5	Bandini (2013)	3
6	Sinha (2018)	0
7	New (2019)	0

The citation picture returned by this short list confirms the strong discontinuity already highlighted. Messina's work (2018), with its 22 citations, emerges as a gravitational point, a rare reference that catalyses attention and perhaps attempts at systematisation. However, the rest of the distribution shows a field dotted with weak presences, with some contributions that remain completely unheard, such as those of Sinha (2018) and New (2019), and others that obtain only a faint echo. This imbalance is not only quantitative, but symptomatic of a deeper problem: the absence of a solid scientific community, which dialogues, cites, contests and renews itself.

In a mature research environment, vitality is also measured in the movement of ideas, in their capacity to generate response, criticism, and extension. Instead, the citational immobility draws a fragile and disaggregated map, where ideas seem to be born and dissolve without leaving significant sedimentations. However, this silence, more than a defect, can also be read as a possibility: the space for a new voice, for a work that does not fit into a consolidated trail but contributes to founding one. In this latency lies perhaps the greatest and most fruitful challenge for those who want to contribute thoughtfully to this field today.

5.2. Most cited authors and centrality in the scientific debate

Table 2 collects the authors with the highest number of citations in a limited but significant corpus of documents. Although each author contributed only one work, the differences in the

citation data provide a fascinating insight into the impact and resonance of the voices involved in the debate.

Table 2. Most cited authors (1 document each)

Author	Quotes
White, Francesca	22
Short, Marcello	22
Fenelli, Antonio	22
Frost, Omar CG	22
Gullo, Salvo	22
Messina, Irene	22
Mosconi, Andrea	22
Orlinsky, David	22
Sambin, Marco	22
Arroyo Gonzalez, Rosario	7
Salvador Mata, Francisco	7
Tzanova, Slavka	7
Fichter Wolf, Heidi	4
Bandini, Gianfranco	3
Banerjee, Sutripta	0
New, Rebecca S.	0
Sinha, Sridipa	0

The analysis highlights a first compact nucleus of authors (led by Francesca Bianco and colleagues), each credited with 22 citations, probably referring to a co-signed work that has obtained a visibility superior to the other contributions. This concentration suggests that the scientific influence is not so much distributed as polarised around a few references in the context under examination. In the background are other authors - such as Tzanova and Arroyo González - who, although detached in quantitative terms, testify to an international opening of the debate, with contributions coming from heterogeneous academic contexts.

The presence of authors with zero citations (Sinha, New, Banerjee) does not represent a sign of irrelevance, but rather an indicator of recent or marginal publications, which have not yet found an echo in the secondary literature circuit. It is a field still being structured, and, therefore, this data invites us to consider the “long times” of scientific reception and the possibility that some contributions become relevant only in later phases. In other words, the distribution of citations not only measures the quality of the contents, but also reflects the dynamics of visibility, network and accessibility within a still fragmented scientific community.

The observed citation asymmetry reflects the absence of a solid and structured epistemic community, but at the same time signals a fertile space for future theoretical and comparative systematisations, starting from the thematic nodes traced by the most cited contributions.

5.3. From words to links: semantic map of a fragmented field

The bibliometric analysis of the keywords associated with the publications in the corpus allowed us to build a semantic map that helped identify the recurring conceptual nuclei and the links between them. Table 3 presents the keywords ordered according to the Total Link Strength (TLS),

an indicator that expresses the strength of the links between the terms within the conceptual network, highlighting both their frequency and centrality in the scientific discourse.

Table 3. Keywords by TLS

Keyword	Occurrences	TLS
Cooperative behavior	2	49
Human	2	49
Humans	2	49
Questionnaire	2	49
Italy	4	43
Learning	2	39
Article	1	26
Cognition	1	26
Cognitive processes on written composition	1	26
Computer system	1	26
Creativity	1	26
Cultural factor	1	26
Culture	1	26
Information center	1	26
Interdisciplinary communications	1	26
Interpersonal communication	1	26
Language	1	26
Linguistics	1	26
Motivation	1	26
Priority journal	1	26
Psychology	1	26
Psychology, social	1	26
Research	1	26
Social aspect	1	26
Sociocultural processes on written composition	1	26
Spain	1	26
Training	1	26
Written language	1	26
Adult	1	23
Clinical competence	1	23
Cooperation	1	23
Cross-sectional studies	1	23
Cross-sectional study	1	23
Education	1	23
Female	1	23
International cooperation	1	23
Internationality	1	23
Bad	1	23
Personal therapy	1	23
Psychotherapy	1	23
Psychotherapy training	1	23
Self-assessment	1	23
Self-assessment	1	23

Statistics and numerical data	1	23
Supervision	1	23
Surveys and questionnaires	1	23
Trainee development	1	23
Bologna [Emilia-Romagna]	1	13
Christians	1	13
Collaborative course development	1	13
Collaborative development	1	13
Cooperative sector	1	13
Cooperative works	1	13
Curriculum Vitae	1	13
Resume designs	1	13
Emilia-Romagna	1	13
Engineering education	1	13
Eurasia	1	13
Europe	1	13
Higher education	1	13
Knowledge	1	13
Knowledge society	1	13
Learning outcome	1	13
Lisbon [Portugal]	1	13
Lisbon	1	13
Malaysia	1	13
Master's degree	1	13
Nanoelectronics	1	13
Nanotechnologies	1	13
Open educational resources	1	13
Portugal	1	13
Southern Europe	1	13
University sector	1	13
Educational theory	1	4
Teachers' organisation	1	4
Teaching method	1	4
20th century	1	4
Maria Montessori	1	3
Positive schooling India	1	3
Rabindranath Tagore	1	3

The emergence of keywords such as *cooperative behaviour*, *human(s)* and *questionnaire*, all with the maximum TLS value (49), suggests a prevalent attention to methodological and psychological dimensions rather than a structured pedagogical elaboration of cooperation. In this sense, the surveyed publications seem to question the educational theme in a collateral manner, through interpretative lenses derived from other disciplines, such as applied psychology, cognitive sciences, and quantitative studies on training.

Although not surprising, a relevant element is the high TLS associated with the term *Italy* (43), which signals a strong geographical anchoring of scientific production to the Italian reality. This data is consistent with the thematic focus of the research, but it also gives an image of an

interest that is still limited to local contexts and poorly inserted into a structured international theoretical framework.

Terminological dispersion is evident in the long list of keywords with only one occurrence and a reduced TLS, including heterogeneous terms such as *nanoelectronics*, *Maria Montessori*, *engineering education*, *personal therapy*, *southern Europe* and *Rabindranath Tagore*. This variety denounces the absence of a shared and consolidated lexicon, a typical feature of emerging or peripheral fields, in which different disciplinary approaches, isolated case studies and local lexicons overlap. This semantic fragmentation makes it challenging to identify a common scientific language capable of supporting the construction of a coherent and recognisable epistemological identity.

Furthermore, the coexistence of keywords related to different domains - educational (*training*, *learning*, *teaching method*), psychological (*motivation*, *self-evaluation*, *psychotherapy*), geographical (*Portugal*, *Malaysia*, *Bologna*), and technological (*open educational resources*, *nanotechnologies*) - testifies to the multiplicity of interpretative trajectories through which the theme of cooperation is addressed. However, this plurality does not translate into a theoretical convergence, but rather into a conceptual polychromy that struggles to become a system.

Overall, the reconstructed semantic network outlines a cognitive eco-system still in its germinal phase, characterised by weak ties and an absence of strongly connected theoretical clusters. The resulting image is that of a field of studies searching for its synthesis, where conceptual incursions remain episodic and where there is no common theoretical framework capable of organically linking the contribution of cooperative enterprises to educational processes. In this latency, however, lies a potential heuristic fruitfulness: the open space for future conceptual elaborations, a more precise definition of the pedagogical lexicon of cooperation, and the development of integrated paradigms between education, mutualism and social justice.

In confirmation of the evidence that emerged, the visual map in Figure 4, generated through the VOSviewer software [24] and based on the entire set of keywords detected, provides a synthetic but effective representation of the conceptual network that emerged from the keywords associated with the analysed corpus. It offers an overall view of the semantic articulation, highlighting both the distribution of the terms and the strength of the links between them, measured through the TLS.

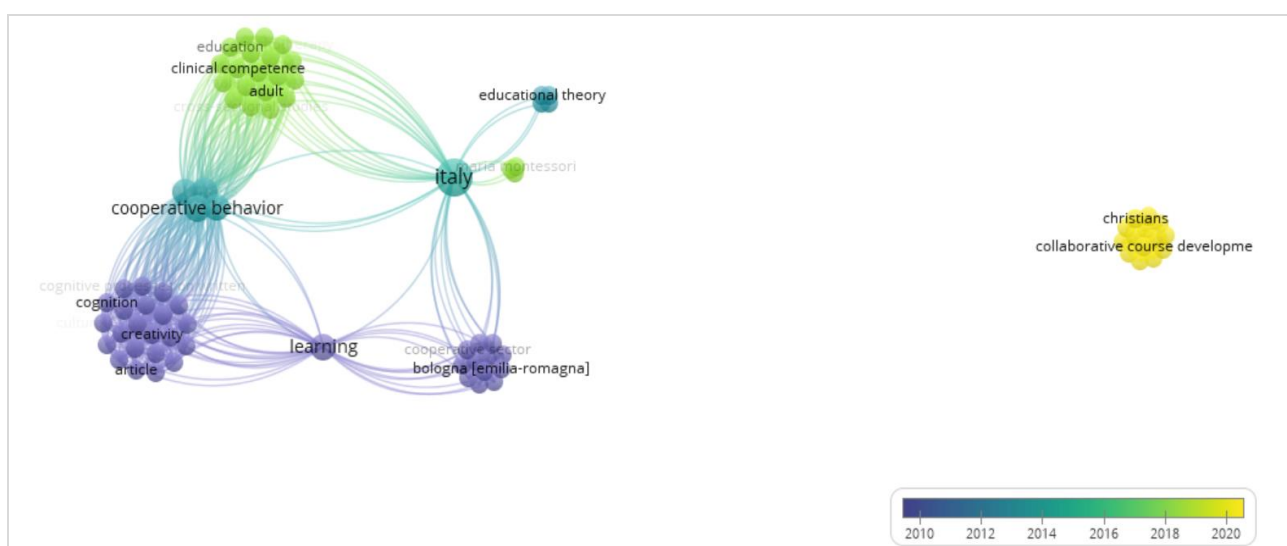


Figure 4. Keywords

Source: VOSviewer

The cluster organisation, represented through colour codes, highlights some denser and more interconnected nuclei (e.g. *cooperative behaviour, learning, Italy*), around which a heterogeneous lexicon is distributed that reflects the field's multidisciplinary and still consolidating nature. However, the presence of thematic subsets that are poorly connected, as in the case of the isolated group including *collaborative course development* and *Christians*, confirms the fragmentation already widely highlighted. The temporal colour scale (located at the bottom right) also signals these themes' recent but discontinuous emergence in scientific production.

It is important to reiterate that this first representation includes all the key words that emerged from the bibliometric analysis, including the most marginal or isolated ones and, therefore, gives back the image of a dispersed semantic field, in which theoretical incursions do not always converge in a coherent or shared vision.

To further refine the analysis, Figure 5 shows a targeted selection of keywords to highlight the most relevant conceptual connections concerning this contribution's pedagogical and cooperative focus. This second visualisation allows us to focus our gaze on those terminological nodes most representative of educational reflection, offering a more targeted and potentially more interpretable reading concerning the epistemic structure of the field.

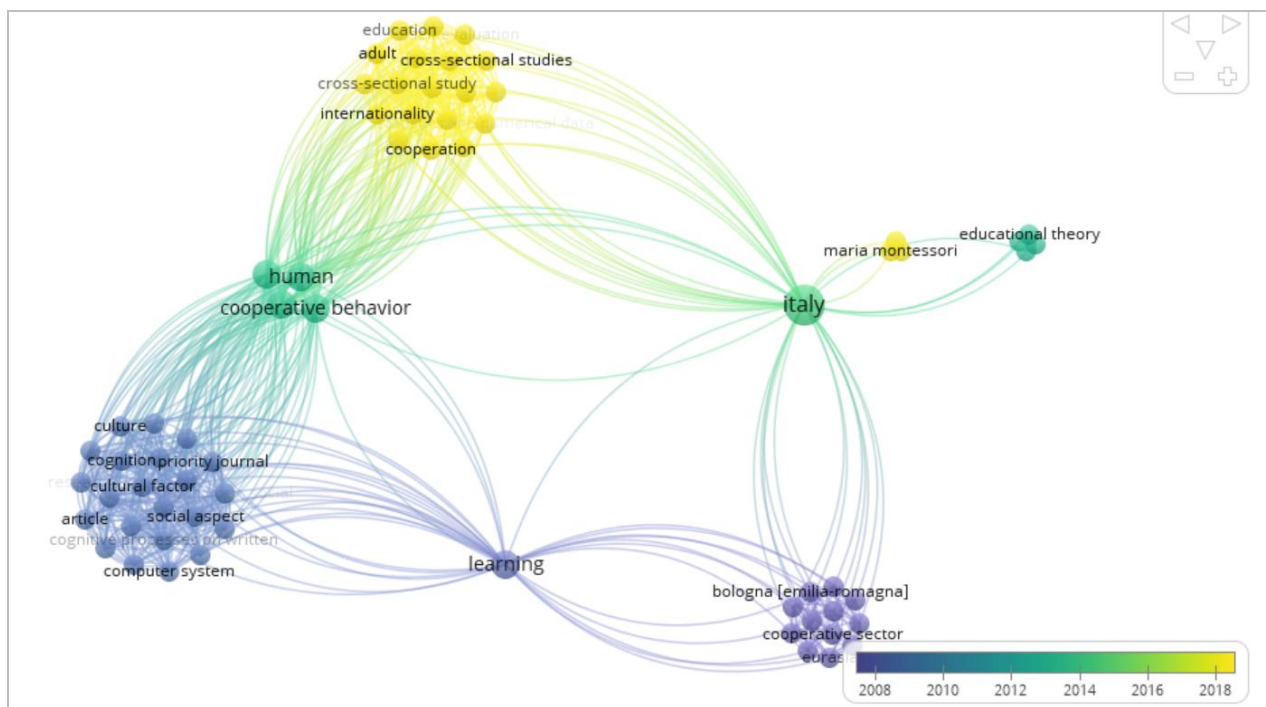


Figure 5. Selected keywords

Source: VOSviewer

The central node constituted by the term *Italy*, connected to entries such as *educational theory*, *Maria Montessori*, *cooperation*, *cross-sectional study*, *education* and *internationality*, shows a geographical and theoretical polarisation around Italian specificity, accompanied by references to historical pedagogical approaches and the comparative dimension.

A second cluster, focused on *cooperative behaviour*, *human* and *learning*, highlights the intertwining of cooperative learning's relational, cognitive and experiential dimensions. This network section recognises references to situated educational practices and non-formal learning contexts, often based on proximity dynamics and human interaction.

Of particular interest is the position of the keyword *Bologna (Emilia-Romagna)*, which, although located in a peripheral area of the network, signals the importance of local contexts and educational territories in structuring cooperative models. Its connection with the *cooperative sector* reinforces that cooperative educational experiences are rooted in specific social and cultural ecosystems, characterised by a strong participatory vocation.

From a temporal point of view, the chromatic scale highlights how many selected keywords are placed between 2012 and 2018, with a slight anticipation in the cluster oriented towards cognitive and technological disciplines. This suggests that the most excellent conceptual activity occurred immediately following the global economic crisis, confirming the activating role played by educational cooperation in moments of transition and social reorganisation.

Undoubtedly, the map shows a less fragmented network than the general visualisation, but at the same time, it still lacks a stable theoretical centre of gravity. The connections appear more numerous and coherent, but not yet sufficiently structured to allow a shared pedagogical vocabulary to emerge. This leads to the need to strengthen conceptual and methodological convergences in the field of studies on educational cooperation, favouring the construction of a more robust theoretical framework, capable of making the contribution of cooperative enterprises in training processes visible and scientifically legitimised.

6. Critical re-reading of the evidence emerging from the literature indexed in Scopus

Although limited in number, the analysis of the publications selected on the Scopus database highlights a plurality of approaches through which the contribution of cooperative enterprises and practices is thematised in Italian educational contexts. The documented experiences can be traced back to three main areas: historical cooperative pedagogy, territorial models with shared governance, and forms of interinstitutional cooperation in academic and professional contexts.

The first area of historical and political-pedagogical origin is represented by the contribution of Bandini [2], who analyses the experience of the Educational Cooperation Movement (MCE) [19], inspired by Célestin Freinet [9]. In this framework, cooperation is configured as a tool for emancipation and democratisation, opposing authoritarian teaching models and promoting the teacher's figure as an agent of social transformation. However, the diffusion of MCE practices has proved to be heterogeneous and limited, mainly confined to primary school and lacking systemic recognition at an institutional level [19]. This fact raises questions about the political and organisational conditions necessary to transition from alternative pedagogical practices to structured and recognised educational models.

A second contribution, that of New [14], delves into the pedagogical model developed in Reggio Emilia, highlighting its cooperative dimension as a constitutive and not an accessory element. In this case, cooperation is declined not only as a teaching method but as a form of participatory institutional governance, rooted in a democratic culture developed in the post-war period. The *Reggio Emilia Approach* [17; 7] demonstrates how educational practices can become catalysts for active citizenship and social inclusion, thanks to co-design between school, families and communities. However, the strong localisation of the model and its difficulty in transferring to different contexts limit its systemic impact, suggesting the need to reflect on the scalability and adaptability of cooperative models in the educational field.

The third area concerns structured cooperation in higher education and vocational training. The contribution of Tzanova [23] describes a project for the joint development of curricula in the nanotechnology sector, involving Italian universities and Asian and European partner institutions. The experience documents the potential of transnational cooperation for educational innovation but also highlights the managerial and epistemic complexity of such paths, often hindered by cultural, regulatory and organisational misalignments.

In parallel, the article by Messina et al. [12] highlights the transformative value of cooperation in professional training courses, concerning the training of therapists. The cooperative dimension is expressed here in the form of horizontal training relationships (supervision, peer learning), highlighting how intra-institutional dynamics of a collaborative nature strongly influence the perceived quality of the training experience. In this sense, cooperation appears not only as an organisational asset, but as an actual epistemic and ethical practice, based on the co-construction of knowledge and mutual recognition.

These experiences confirm the multifaceted and contextual nature of cooperative practices in education, which can generate innovation, inclusion, and participation. However, their heterogeneity and fragmentation - both theoretical and operational - raise the question of the need for a shared framework capable of systematising and valorising emerging practices. The absence of a common epistemological framework hinders the construction of a cohesive scientific community, limiting the visibility and recognition of cooperatives as structural pedagogical subjects within educational systems.

7. Geography and structure of educational cooperation

In completing the reading of educational cooperation in Italy, in addition to the bibliometric survey and mapping the sectors of activity, a structural reading of the companies active in the territory is essential. Two dimensions prove to be strategic in grasping the consistency and vitality of the sector: the legal form assumed by the cooperatives and their geographical distribution on a national scale. These elements, far from mere descriptive data, provide a snapshot of how cooperative realities are constituted, take root and develop in different local contexts while offering valuable clues about the enabling (or inhibiting) conditions of widespread, fair and sustainable cooperative educational development.

To this end, data extracted from a Moody's Analytics database [5] were analysed, relating to a total of 2,770 companies active in the decade 2014–2023. The selection was based on the Ateco 2007 Code, particularly concerning the macro-sector 85: Education, including all its subcodes, to provide a picture as detailed and representative as possible of the variety of educational services attributable to cooperative action.

The Ateco 85 Code includes a broad spectrum of activities that span the entire range of educational paths, from nursery school to university and professional education, up to non-formal training and education support areas. In detail, the categories surveyed include:

- 85.10.00: preparatory level education, such as nursery schools and special schools attached to primary school;
- 85.20.00: primary education (elementary schools);
- 85.31.10 – 85.31.20: lower secondary education (middle schools) and general upper secondary education (lyceums);

- 85.32.01 – 85.32.09: secondary technical and vocational training, including driving, flying, sailing and art schools;
- 85.41.00: higher technical education and training (IFTS);
- 85.42.00: university and post-university education, academies and conservatories;
- 85.51.00 – 85.52.09: sports, recreational, dance and cultural training courses;
- 85.53.00: Driving schools and pilot schools;
- 85.59.10 – 85.59.90: people's universities, vocational training courses, language courses, and other educational services not elsewhere classified;
- 85.60.01 – 85.60.09: school counselling, orientation and educational support activities.

This classification allows for mapping the sectoral extension of cooperative education, in traditional school and academic paths, as well as in extracurricular and lifelong learning ones. The breadth of the codes included also allows to grasp the different ways cooperative enterprises are inserted in educational systems: from the direct management of schools and training centres to the promotion of complementary and inclusive activities, to the provision of guidance, consultancy and support services.

Therefore, the aggregate data analysis aims to provide a structural reading of these realities, in terms of legal status, corporate forms, geographical distribution and chronology of incorporation, to outline the salient features and evolutionary dynamics of educational cooperation in Italy in the last decade.

7.1. Legal status: a vulnerable stability

The first element analysed concerns the legal status (Table 4) of the surveyed cooperatives, which constitutes a fundamental indicator for evaluating the organisational stability and economic sustainability of the entities active in the educational sector.

Table 4. Legal Status

Active	2753
Active (with insolvency proceedings)	1
Active (Insolvency Status)	16
Total	2770

Of the 2,770 entities analysed, almost all (2,753 companies, equal to 99.4%) are active without any reports of legal-financial criticalities, a symptom of a notable stability of the sector: cooperative enterprises in the field of education possess, on average, a solid organisational structure and the ability to remain in business over time.

However, there are 17 cases (0.6%) of critical situations:

- 1 active company with insolvency proceedings underway;
- 16 companies in formal insolvency.

Although numerically limited, these cases signal the presence of residual fragilities, which can be traced back to various factors: small organisational size, poor capitalisation, exposure to regulatory changes or difficulties in the relationship with the public system.

The high percentage of active enterprises reinforces the idea of a vital sector, characterised by operational continuity and resilience, in line with the social function attributed to educational

cooperatives. This data can be further interpreted considering the legal forms and territorial distribution analysed in the following sections.

7.2. Legal forms

The legal form chosen by cooperative enterprises operating in the education sector is a significant indicator of their institutional identity, ability to adapt to regulations, and the strategic vision that guides them. The analysis of the distribution of legal forms among the 2,770 cooperatives active in the period 2014-2023 (Table 5) allows us to reflect not only on the legal structure of the organisations, but also on the logics of sustainability, governance and social purpose that guide their choices.

Table 5. Legal form

Small Limited Liability Cooperative Company	4
Limited Liability Cooperative Company	24
Limited Liability Cooperative Company by Shares	2679
Cooperative consortium society	15
Social Cooperative	47
Small cooperative	1
Total	2770

Observing the data reveals a clear predominance of the Limited Liability Cooperative Company by Shares, with 2,679 units, which alone represents 96.7% of the total. This legal form is the organisational standard in the sector. Its marked diffusion indicates a structural preference for agile corporate models, with limited liability and capable of reconciling the mutualistic nature with streamlined operational needs. This choice reflects, in reverse, the need to operate in an often complex regulatory and administrative context, in which management simplification becomes a survival strategy and an efficiency one.

On the other hand, the marginal presence of social cooperatives, which only number 47 units, appears surprising. Considering the educational sector falls entirely within the purposes set out in Law 381/1991 [11], this low incidence opens critical reflections. It could be a consequence of the greater rigidity required to access this qualification, or a deliberate strategy by the founders, who prefer to maintain a more generic legal profile to benefit from a broader range of operational and financial opportunities. This discrepancy between declared purposes and adopted legal form highlights a certain distance between educational vocation and legal recognition of the social function, raising questions about the relationship between cooperative identity and regulatory recognisability.

The residual presence of other forms, such as the 24 limited liability cooperative companies, the 15 consortium cooperatives, the four small, limited liability cooperative companies and the only small cooperative, although not significantly affecting the quantity, signals attempts at diversification and, perhaps, experiments with more complex cooperative networks. In particular, the presence of consortium cooperatives suggests the possibility of organisational structures based on the networking of services and coordination between cooperative entities, hypothesising an evolution towards more robust consortium models, capable of responding to the growing demand for territorial governance in educational services.

This data outlines a cooperative educational panorama that is highly standardised from a formal point of view, but rich in latent tensions and signs of transformation. The almost total adherence to a single legal form does not express a pure uniformity of identity, but rather the attempt to mediate between educational ideals, regulatory constraints and economic sustainability, allowing a glimpse of the possibility of new organisational and legal developments that are more in line with the inclusive and community purposes of the world of educational cooperation.

7.3. Map of social demand and territorial responses

The distribution of educational cooperatives on the Italian territory (Table 6) reveals their close connection with local social needs, accessibility to services and opportunities for socio-economic development.

Table 6. Geographical location

NORTH		CENTER		SOUTH and ISLANDS	
Aosta Valley	2	Tuscany	108	Campania	380
Piedmont	88	Umbria	28	Abruzzo	48
Liguria	37	Marche	38	Molise	20
Emilia-Romagna	146	Lazio	231	Apulia	305
Lombardy	259			Basilicata	40
Trentino-Alto Adige	85			Calabria	191
Veneto	105			Sicily	540
Friuli Venezia Giulia	36			Sardinia	83
Total North	758	Total Center	405	Total South and Islands	1607
Total ITALY 2770					

The analysis of the geographical data, which disaggregates the 2,770 cooperative enterprises into three macro-areas (North: 758, Centre: 405, South and Islands: 1607), highlights a significant imbalance that deserves careful consideration.

With 58% of cooperatives located in the South and the Islands (1,607 out of 2,770), an apparent prevalence is observed compared to the North (27.4%) and the Centre (14.6%) of the country. This distribution, apparently counterintuitive compared to the traditional greater presence of the cooperative economy in the Northern regions, can be interpreted as an indicator of social compensation: educational cooperation expands where the public system encounters difficulties in responding effectively to the training demand, or where the socio-economic fabric presents structural fragilities that require integrative and subsidiary interventions.

Regions such as Sicily (540 cooperatives), Campania (380) and Puglia (305) show a cooperative density that suggests a strong use of community initiatives to support education, in a context often characterised by inequalities, school dropouts and lack of services. This data is part of a broader discussion on the social and compensatory function of cooperation, which in the southern territories seems to be configured as an organised response of civil society to unsatisfied educational needs.

On the other hand, the cooperative presence in the northern regions, although solid in absolute numbers (Emilia-Romagna: 146; Lombardy: 259; Veneto: 105), takes on a more institutionalised profile and is integrated into the regional welfare and training systems, probably with greater historical roots and a more structured relationship with public bodies.

The geographical reading, overall, returns the image of a cooperative educational ecosystem that is highly adaptive and reactive to local needs, but also exposed to dynamics of territorial imbalance that reflect the asymmetries of the country, both in terms of resources and educational policies.

The analysis of the table relating to the legal status of educational cooperatives according to their date of incorporation (Table 7) allows us to outline an interesting diachronic reading of the sector's vitality, its resilience and moments of most significant expansion. The table distinguishes between active cooperatives, active cooperatives with insolvency procedures, and active cooperatives in a state of declared insolvency, thus offering a cross-section of the stability and endurance of the cooperative model over time.

Table 7. Date of incorporation/ Legal status				
Date of constitution	Active	Active (with insolvency proceedings)	Active (State of insolvency)	Everyone
From 1900 to 1920	3		0	3
From 1921 to 1940	1		0	1
From 1941 to 1960	2		0	2
From 1961 to 1980	80		1	81
From 1981 to 2000	495		8	503
From 2001 to 2005	267		2	269
From 2006 to 2010	626		1	627
From 2011 to 2015	578	1	3	582
From 2016 to 2020	406		0	406
From 2021	295		1	296
Everyone	2,753	1	16	2,770

The longitudinal data analysis highlights a progressive growth of the educational cooperative sector, with a significant expansion starting from the 1960s. The most flourishing period is between 1981 and 2015, during which 1,684 cooperatives were established out of 2,770, or over 60% of the sample. In particular, the 2006–2015 phase stands out as the most dynamic, with 1,209 new establishments. This growth can be traced back to a favourable political-educational context, marked by structural reforms, processes of regionalisation of services and a progressive recognition of the third sector's role in managing the educational offer.

Since 2015, a moderate decline in the rate of new incorporations has been observed: 406 between 2016 and 2020, and 296 from 2021 to date. However, these values remain significant, especially considering the socio-economic challenges faced in the period, from the global pandemic to the economic crisis and the digital transition. This stability suggests a maturation process of the sector, capable of addressing systemic changes with adaptive capacity and sustainable planning.

From the point of view of financial solidity, the overall picture appears reassuring: only 16 cooperatives (equal to 0.6% of the total) are currently insolvent, while only one is involved in a formal insolvency procedure. These data confirm a relatively high level of management stability, despite structural fragilities, which particularly affect the most economically disadvantaged areas of the country.

No less significant is the data relating to the historical presence of cooperatives founded before 1980, which amount to 87 units. These entities, which have survived over time, represent an active memory of the educational role of cooperation, often developed in marginal contexts or the absence of adequate coverage by public intervention.

In conclusion, the data confirm that cooperative enterprises in the educational field have gone through a phase of consolidation and institutionalisation since the 1980s, parallel with the crisis of the centralised state model and the progressive valorisation of horizontal subsidiarity. Its structural resilience, combined with a low rate of insolvency, highlights not only efficient management, but also a strong ethical-social motivation that guides many of these experiences: these are realities capable of responsible self-management, operational continuity and community roots, in which the educational purpose is harmoniously combined with economic sustainability [3].

8. Conclusions

This study has provided a complex and articulated image of the role played by Italian cooperative enterprises in the processes of education, instruction, and training, confirming their transformative potential and epistemic and structural fragilities. The integrated analysis between bibliometric sources and empirical data has allowed us to highlight, on the one hand, the vitality of educational practices rooted in the territories and capable of responding to emerging social needs; on the other, the weakness of a field of studies that is still fragmented, lacking a shared pedagogical lexicon and a cohesive scientific community.

On a conceptual level, the experiences analysed reveal a plurality of approaches - historical, institutional, formative - which, although heterogeneous, share a common tension towards a more inclusive, relational and participatory education. Cooperatives are configured as pedagogical actors, capable of generating situated learning environments, integrated into local contexts and oriented towards social justice. However, this potential is often hindered by processes of bureaucratisation and poor integration with formal educational systems, which limit their visibility and systemic impact.

The bibliometric survey on Scopus highlighted a discontinuous and poorly interconnected scientific production, characterised by isolated academic initiatives and an absence of consolidated theoretical nuclei. The semantic dispersion detected in the conceptual maps underlines the urgency of building a shared vocabulary that supports the epistemic legitimacy of the cooperative contribution to education. In this scenario, there is a need to promote interdisciplinary research networks capable of systematising and valorising emerging practices.

From a structural point of view, the data collected by the Moody's Analytics database shows an extensive, resilient and deep-rooted cooperative fabric, with a significant presence in Southern Italy, testifying to the compensatory function of cooperation in contexts of territorial vulnerability. The almost totality of active companies and the prevalence of the legal form "Cooperative limited liability company for shares" indicate an organizationally stable sector, but perhaps still too tied to regulatory adaptation logics rather than an explicitly recognised educational project.

Italian cooperative enterprises are generative educational devices, capable of combining territorial proximity and social innovation. However, to translate this potential into lasting transformative impact, it is necessary to strengthen institutional recognition, promote the construction of shared theoretical frameworks and invest in pedagogical research oriented towards co-design, participatory evaluation and educational justice. In this sense, the International Year of

Cooperatives 2025 represents a precious opportunity to relaunch the pedagogical value of cooperation and to promote a new season of research and educational action based on reciprocity, collective responsibility and the alliance between school, community and territories.

References

1. ARROYO GONZÁLEZ, R., SALVADOR MATA, F. Research on cognitive, social and cultural processes of written communication. *Cognitive Processing*. 2009, vol. 10(3), pp. 263-268. DOI: <https://doi.org/10.1007/s10339-009-0255-1>
2. BANDINI, G. For a cooperative and socially committed school: The dissemination and reworking of Célestin Freinet's pedagogy in Italy. *History of Education and Children's Literature*. 2013, vol. 8(2), pp. 357-376. Macerata: University of Macerata Editions.
3. BORZAGA, C., FAZZI, L. The role of social enterprises in local welfare systems. In: *Social Policies*. 2014, no. 2.
4. BORZAGA, C., GALERA, G. Social enterprises and their eco-systems: developments in Europe. Brussels: European Commission, 2016.
5. BUREAU VAN DIJK, AIDA – Computerised Analysis of Italian Companies [online database]. Bureau van Dijk – A Moody's Analytics Company. Available at: <https://aida.bvdinfo.com> (visited 17.05.2025).
6. EUROPEAN COMMISSION. Social Economy Action Plan. 2021. Available: <https://ec.europa.eu/social/economy> (visited 10.05.2025).
7. FARINACCI, V., PRESTIANNI, C. John Dewey's Art as Experience and the Reggio Emilia Approach: Comparing Philosophical-Pedagogical Perspectives. *Research in Pedagogy and Didactics*. 2022, vol. 17(3), pp. 105–128. ISSN 1970-2221. <https://doi.org/10.6092/issn.1970-2221/14919>
8. FICHTER-WOLF, H. Cooperation among colleges and universities in border regions: A learning opportunity for the development of a European knowledge area. *AVAILABLE* 2008, no. 173(2), pp. 34–46. DOI: <https://doi.org/10.1080/02513625.2008.10557009>
9. FREINET, C., FREINET, E. *Birth of a Popular Pedagogy*. Rome: Editori Riuniti, 1973. 220 p.
10. LAW 328/2000. Framework law for the creation of the integrated system of social interventions and services. *Official Journal of the Italian Republic*.
11. LAW 381/1991. Regulation of social cooperatives. *Official Journal of the Italian Republic*, no. 93 of 22 April 1991.
12. MESSINA, I., GELO, OCG, SAMBIN, M., BIANCO, F., MOSCONI, A., FENELLI, A., CURTO, M., GULLO, S., ORLINSKY, D. Trainees' self-evaluation of their development as psychotherapists: An Italian contribution to an international collaborative study on psychotherapy training. *Clinical Psychology and Psychotherapy*. 2018, vol. 25(2), pp. 338–347. DOI: <https://doi.org/10.1002/cpp.2165>
13. MINISTRY OF LABOR AND SOCIAL POLICIES. Third Sector Code - Legislative Decree 117/2017. Rome, 2017.
14. NEW, RS The cultural politics of childhood education for democracy in Reggio Emilia's childhood services. In: *Educating for Social Justice in Early Childhood*. London: Taylor & Francis, 2019, pp. 100-113. DOI: <https://doi.org/10.4324/9780429283970-8>
15. UN. *Transforming our world: the 2030 Agenda for Sustainable Development*. New York: United Nations, 2015.
16. UN. Resolution adopted by the General Assembly on the International Year of Cooperatives, 2025. New York: United Nations, 2023.
17. PAOLELLA, F. Loris Malaguzzi's Pedagogy: For a History of the Reggio Emilia Approach. *Experimental Journal of Freniatria*. 2013, vol. 137(1), pp. 95–112. ISSN 0035-6796. <https://doi.org/10.3280/RSF2013-001006>
18. PAVOLINI, E. *New Social Policies. Welfare Systems between Institutions and Civil Society*. Bologna: Il Mulino, 2003. 432 p. (Series: Il Mulino/Ricerca). ISBN 978-88-15-09032-4. DOI: 10.978.8815/143655.
19. PETTINI, A. *Origins and development of educational cooperation in Italy: from the CTS to the MCE (1951-1958)*. Milan: Emme Edizioni, 1980. 320 p. ISBN 978-88-294-0001-2.
20. NATIONAL RECOVERY AND RESILIENCE PLAN (PNRR). Mission 4 – Education and Research. Rome, 2021.
21. SENNI, C. *Social Cooperatives and Education: Experiences and Perspectives*. Milan: FrancoAngeli, 2020.
22. SINHA, S., BANERJEE, S. Two visions of positive schooling. In: *Positive Schooling and Child Development: International Perspectives*. Singapore: Springer, 2018, pp. 421–435. DOI: https://doi.org/10.1007/978-981-13-0077-6_22
23. TZANOVA, S. Internationalized master degree education in nanoelectronics in Asian universities. In: CARDOSO, A., ALVES, GR, RESTIVO, T. (eds). *IEEE Global Engineering Education Conference (EDUCON)*. Los Alamitos: IEEE Computer Society, 2020, pp. 37-40. DOI: <https://doi.org/10.1109/EDUCON45650.2020.9125369>
24. VAN ECK, NJ, WALTMAN, L. Software survey: VOSviewer, a computer program for bibliometric mapping. *Scientometrics*. 2010, vol. 84(2), pp. 523–538. ISSN 0138-9130. <https://doi.org/10.1007/s11192-009-0146-3>
25. ZANDONAI, F., FAZZI, L. *Social Enterprises in Italy. Identity and Development in a Comparative Perspective*. Rome: Carocci, 2011.

INTEGRATING COOPERATIVE PRINCIPLES INTO ENGLISH LANGUAGE EDUCATION: A CURRICULUM FRAMEWORK FOR VOCATIONAL AND ADULT LEARNERS IN EUROPE

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Abstract

This paper proposes an innovative curriculum framework that integrates cooperative principles into English language education, with a focus on vocational and adult learning contexts. Recognizing the dual need for language proficiency and civic engagement, the curriculum is designed to foster both communicative competence and an understanding of cooperative values such as solidarity, democratic participation, and social responsibility. Drawing on task-based learning and content and language integrated learning (CLIL) methodologies, the proposed curriculum uses authentic materials and real-world scenarios related to cooperative enterprises to enhance learner motivation and contextual relevance. The paper outlines key modules, including cooperative history, governance, and sustainable development, all taught through English. It also emphasizes collaborative learning strategies that mirror cooperative practices, such as peer teaching, group projects, and community-based assignments. By aligning language education with the broader goals of social inclusion and sustainable development, this curriculum supports the lifelong learning agenda and contributes to the empowerment of individuals within cooperative systems. The proposal is particularly relevant for countries like the Republic of Moldova, where cooperatives play a vital socio-economic role.

Keywords: Cooperative Education, English Language Teaching (ELT), Vocational Training, Lifelong Learning, Content and Language Integrated Learning (CLIL), Social Inclusion

JEL: I20, I21, I25, I28

Introduction

This paper proposes a curriculum framework that aligns English language learning with cooperative values such as solidarity, mutual aid, and participatory governance. The rationale stems from the recognition that cooperatives—democratic enterprises rooted in community and sustainability—offer a rich context for meaningful language use and critical thinking. By embedding cooperative themes into language instruction, learners not only develop communicative competence but also engage with real-world issues that enhance their sense of agency and inclusion.

Europe is an interconnected and multilingual country and the integration of cooperative principles into English language education represents a timely and socially responsive innovation. Vocational and adult learners often face the dual challenge of acquiring language proficiency while also dealing with complex socio-economic environments that demand civic engagement, collaboration, and adaptability. Traditional language curricula, however, frequently overlook the potential of education to foster democratic participation and social responsibility.

Through this study, we want to propose a curriculum designed on task-based learning and content and language integrated learning (CLIL) methodologies, using authentic materials and scenarios from cooperative enterprises. This approach ensures contextual relevance and learner motivation.

A case study conducted in a rural vocational school in southern Italy demonstrated how adult learners, despite limited English proficiency, achieved meaningful outcomes by engaging in a CLIL project rooted in their agricultural experience and local cooperative networks. The practical, task-based nature of the project fostered motivation, collaboration, and real-world language use.

The paper key modules—such as cooperative history, governance, and sustainable development—emphasize collaborative learning strategies that mirror cooperative practices. Moreover, the proposed framework is particularly relevant across Europe, where cooperatives contribute significantly to social cohesion and economic resilience, making this curriculum a valuable tool for lifelong learning and empowerment.

Results obtained and discussions

Curriculum Purpose and Vision

The curriculum proposed is based on the idea of fulfilling two urgent educational needs: English language proficiency and civic and, in particular, cooperative values.

In vocational and adult education, learners often look for practical, socially relevant content that connects language learning to their life experiences and professional aspirations. Cooperatives—democratic, member-owned enterprises—offer a compelling thematic foundation for such a curriculum. They embody principles of solidarity, equity, and sustainability, which meet also European goals of social inclusion and participatory citizenship.

By integrating cooperative themes into English language instruction, the curriculum not only enhances linguistic competence but also promotes critical awareness and active engagement. Learners are encouraged to think critically about their roles within communities and workplaces, fostering a sense of responsibility and empowerment.

Finally, this dual focus aligns with the European Union’s emphasis on lifelong learning, democratic participation, and the social economy.

Methodological Framework: Task-Based Learning and CLIL

The curriculum is grounded in two complementary pedagogical approaches: Task-Based Learning (TBL) and Content and Language Integrated Learning (CLIL).

Task-Based Learning emphasizes the use of meaningful, goal-oriented tasks that mirror real-life language use. In this curriculum, tasks are designed around cooperative scenarios—such as planning a community initiative, simulating a cooperative board meeting, or analysing a case study of a successful European cooperative. These tasks promote authentic communication, critical thinking and problem-solving, and collaboration.

CLIL allows learners to acquire language through the study of subject content—in this case, cooperative studies. Modules such as “History of the Cooperative Movement,” “Principles of Democratic Governance,” and “Sustainable Development in Cooperatives” are taught in English, enabling learners to build both subject knowledge and language skills simultaneously. This approach increases interdisciplinary learning and motivation and it is relevant particularly for adult learners who value practical skills.

Together, TBL and CLIL create a dynamic, learner-centered environment that mirrors the participatory ethos of cooperatives. The integration of authentic materials—such as cooperative charters, interviews with members, and EU policy documents—further enhances the curriculum’s

relevance and depth. For instance, students learn how to read and describe charts, how to stand a job interview, how to apply for a job, how to write a formal email and make their writing relevant and concise and avoid misunderstanding. Moreover, they learn the lingo and how to interact in a professional context.

There is an urgent need to make schools more current and responsive to a rapidly changing world. For this reason, the Italian education system is undergoing a profound transformation—not only in the disciplinary curriculum of individual subjects and in the organization of interdisciplinary learning units (UDAs), but also in teacher training.

On the PNRR Futura platform, funded by the European Union, there are training courses for teachers—such as *Innovamenti Metodologie*—that promote a teaching approach focused on the development of real, transferable skills. These courses encourage methodologies like debate, social service learning, and inquiry-based learning.

We are witnessing a true pedagogical revolution that places students at the center of the learning process, empowering them to become autonomous learners capable of navigating and adapting to new challenges.

Module Design: Integrating Cooperative Themes

The curriculum is structured around thematic modules that reflect the core values and operational principles of cooperatives. Each module is designed to build both language proficiency and content knowledge, using English as the medium of instruction. The following are key modules included in the framework (Table 1):

Table 1. Module Design: Integrating Cooperative Themes

Module Design	Focus Area	Key Activities
1. Introduction to Cooperatives	Origins, definitions, and types of cooperatives; role in European economies.	Reading cooperative charters, watching interviews, vocabulary-building exercises.
2. Democratic Governance and Participation	Decision-making processes in cooperatives.	Role-plays, simulations of assemblies/board meetings, practicing persuasive and formal communication.
3. Sustainable Development and Social Responsibility	Cooperatives' role in sustainability and social equity.	Analyzing sustainability reports, presentations on green initiatives, writing opinion pieces.
4. Cooperatives in the European Context	Diversity and impact of cooperatives across Europe.	Case studies, comparing models, discussing EU policies supporting the social economy.

1. Introduction to Cooperatives

Learners explore the origins, definitions, and types of cooperatives, with a focus on their role in European economies. Activities include reading cooperative charters, watching interviews with cooperative members, and vocabulary-building exercises.

2. Democratic Governance and Participation

This module introduces learners to decision-making processes within cooperatives. Through role-plays and simulations of general assemblies or board meetings, learners practice persuasive language, negotiation, and formal communication.

3. Sustainable Development and Social Responsibility

Learners examine how cooperatives contribute to environmental sustainability and social equity. Tasks include analyzing sustainability reports, preparing presentations on green initiatives, and writing opinion pieces on ethical business practices.

4. Cooperatives in the European Context

This module highlights the diversity and impact of cooperatives across Europe. Learners engage with case studies from different countries, compare cooperative models, and discuss EU policies supporting the social economy.

Each module incorporates listening, speaking, reading, and writing activities, ensuring a balanced development of language skills. Assessment is formative and project-based, encouraging reflection and real-world application.

Developing a plan, engaging in learning and practice, receiving feedback, reflecting, and conducting auto-evaluation are ongoing processes essential for educational success (Figure 1).



Figure 1. Project Based Formative Assessment

Source: developed by the authors based on the research conducted

Collaborative Learning Strategies

In alignment with cooperative principles, the curriculum emphasizes collaborative learning as both a pedagogical strategy and a reflection of cooperative practice. Key strategies include: peer Teaching, group projects, community-based assignments and reflective journals (Figure 2).

These strategies foster a sense of shared responsibility, mutual support, and active participation—mirroring the democratic ethos of cooperatives. They also create a more inclusive and motivating learning environment, particularly for adult learners who bring diverse experiences and perspectives to the classroom.



Figure 2. Collaborative Learning Strategies

Source: developed by the authors based on the research conducted

Alignment with Italian Civic Education Policy

Italy has recently reinforced its commitment to civic education through the updated *Nuove Linee guida per l'insegnamento dell'Educazione Civica*, DM183 issued by the Ministry of Education and Merit (MIM) in September 2024. These guidelines, effective from the 2024/2025 academic year, mandate that all school curricula integrate civic education across disciplines, emphasizing three core areas: the Constitution, sustainable development, and digital citizenship. The reform underscores the transversal nature of civic education, urging schools to embed civic values not as a standalone subject but as a cross-curricular priority.

This national directive aligns closely with the proposed curriculum framework, which integrates cooperative principles—such as democratic participation, social responsibility, and sustainability—into English language education. By doing so, the curriculum not only supports language acquisition but also fulfills the broader educational mandate of forming responsible, informed, and active citizens. The emphasis on real-world tasks, community engagement, and collaborative learning mirrors the pedagogical vision outlined by the MIM (Ministry of Education and Merit), making this curriculum particularly timely and relevant within the Italian and broader European educational landscape.

The need to integrate civic education into school curricula, indeed, is strongly promoted at the European level. The institutions of the European Union and the Council of Europe emphasize the importance of educating conscious, active, and responsible citizens who can participate in democratic life and contribute to social cohesion. Through recommendations, resolutions, and

common reference frameworks, Europe encourages member states to develop educational pathways that include democratic citizenship, human rights, and digital citizenship as essential competencies for the 21st century.

The Role of Cooperatives in Italy

Cooperatives are a cornerstone of Italy's socio-economic landscape. According to *ISTAT's report Struttura e performance delle cooperative italiane (Structure and Performance of Italian Cooperatives)*, cooperatives operate across diverse sectors, with particularly strong representation in social services, agriculture, retail, and manufacturing. These enterprises not only contribute significantly to employment and GDP but also embody values of inclusivity and resilience.

The chart below illustrates the distribution of cooperatives by sector, highlighting the prominence of social services and agriculture (Figure 3):

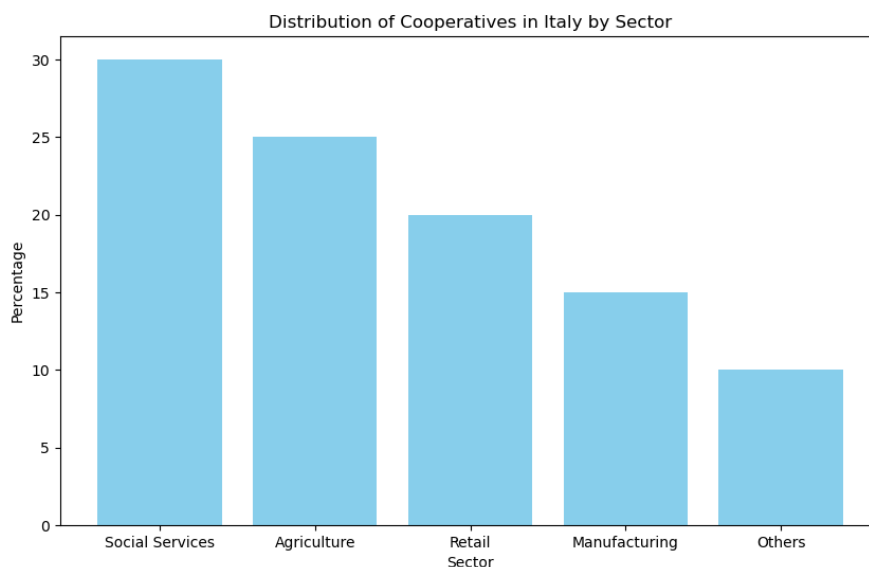


Figure 3. Distribution of Coopertavies in Italy by sector

Source: developed by the authors based on the *ISTAT's report Structure and Performance of Italian Cooperatives for 2019*

Cooperatives are especially prevalent in regions such as Emilia-Romagna and Trentino-Alto Adige, where they play a key role in local development. Their inclusive governance structures often lead to higher participation of women and youth, and their commitment to sustainability aligns with national and EU priorities. These characteristics make cooperatives an ideal thematic foundation for educational curricula that aim to foster both language skills and civic engagement.

AI and Multilingual Curriculum Development in Line with DigComp

The integration of Artificial Intelligence (AI) into education offers transformative potential for developing multilingual, inclusive, and digitally aligned curricula. In line with the *European DigComp Framework and Italy's National Strategy for Digital Skills*, AI can support the creation of adaptive learning environments that personalize language instruction, promote civic engagement, and enhance digital literacy.

AI-powered tools can assist educators in designing multilingual content that reflects cooperative values and civic themes, automatically translating and adapting materials to suit learners' linguistic and cultural backgrounds. This is particularly relevant in vocational and adult education, where learners may come from diverse linguistic communities. AI can also facilitate real-time feedback, automated assessment, and interactive simulations that mirror cooperative decision-making processes, thereby reinforcing both language and civic competencies.

Moreover, the Italian government's emphasis on digital inclusion—evident in initiatives like *Repubblica Digitale* and the expansion of *Punti Digitale Facile*—underscores the importance of equipping all citizens with the skills to navigate digital environments.

Embedding AI into cooperative language education not only aligns with these national priorities but also prepares learners to participate actively in a digitally connected, multilingual Europe.

Case Study: a CLIL project for Adult students

During the 2024/2025 school year, a group of adult learners enrolled in an evening course at a vocational upper secondary school specializing in agricultural studies in Ariano Irpino, Campania, took part in a CLIL (Content and Language Integrated Learning) project that was integrated with a Task-Based Learning (TBL) approach.

Ariano Irpino is a rural area whose economy is deeply rooted in agriculture, and the students—ten working adults (four women and six men) with an average age of 40—were primarily employed in the agricultural sector. The curriculum focused on sector-specific language (microlanguage) related to agricultural enterprises and production processes. The CLIL project, titled “DOP Olive Oil in Ariano Irpino”, engaged students in researching and presenting, in English, the production process of DOP-certified olive oil, including an analysis of local agricultural cooperatives. The project proved highly engaging, as many students owned and worked on their own olive groves, allowing them to draw on their prior knowledge and real-life experience. Despite their initial weaknesses in English, the opportunity to put language into practice through meaningful tasks significantly boosted their confidence and contributed to successful learning outcomes.

To further enrich the learning experience, AI tools were introduced in the classroom to support content generation, guide debates, and facilitate research. Students used AI to draft texts, explore relevant vocabulary, simulate interviews, and search for useful data related to olive oil production and certification. This integration of technology not only enhanced digital literacy but also encouraged autonomous learning and critical engagement with the subject matter.

The educational benefits of this activity were significant and directly support the principles outlined in the proposed curriculum framework.

Firstly, the project fostered intrinsic motivation by connecting language learning to students' personal and professional lives.

Secondly, it promoted collaborative learning, as students worked in pairs and small groups to complete tasks, share expertise, and support one another—reflecting cooperative principles such as mutual responsibility and shared goals.

Thirdly, the task-based structure encouraged active learning and critical thinking, as students had to analyze, synthesize, and communicate complex information in a foreign language. Finally, the project enhanced language proficiency in a meaningful context, preparing students not only for their final exam but also for real-world communication in professional settings. This case

study illustrates how integrating CLIL and TBL within a cooperative framework—supported by AI—can make language education more relevant, inclusive, and empowering for adult vocational learners.

Conclusions

This paper has proposed an innovative curriculum framework that integrates cooperative principles into English language education, specifically tailored for vocational and adult learners across Europe. By aligning language instruction with the values of solidarity, democratic participation, and social responsibility, the curriculum addresses both linguistic and civic competencies—two essential pillars of lifelong learning in the 21st century.

Grounded in task-based learning and CLIL methodologies, the curriculum leverages authentic materials and real-world cooperative scenarios to enhance learner engagement and contextual relevance. The modular design—covering cooperative history, governance, sustainability, and European case studies—ensures a comprehensive and interdisciplinary approach to language education. Furthermore, the emphasis on collaborative learning strategies mirrors the participatory ethos of cooperatives, fostering a classroom culture of mutual support and shared responsibility.

The curriculum's relevance extends beyond national borders, offering a flexible and values-driven model that supports the European Union's goals for inclusive education, social cohesion, and sustainable development. By empowering learners with both language skills and cooperative awareness, this framework contributes meaningfully to the development of active, informed, and socially engaged citizens across Europe.

References

1. JACOBS, G., KIMURA, H., FARRELL, T. Cooperative Learning and Teaching, Second Edition. English Language Teacher Development. 2nd ed. Amazon, 2022. ISBN 9781953745347.
2. RICHARDS, J.C., RODGERS, T.S. Approaches and Methods in Language Teaching. Chapter 16: Cooperative Language Learning. Cambridge University Press, 2001. pp. 192–203. ISBN 9780521008433. <https://doi.org/10.1017/CBO9780511667305.020>.
3. GILLIES, R.M. The Teacher's Sourcebook for Cooperative Learning. Corwin Press, 2007. ISBN 9781412937641.
4. UZMA, F., SUMARNI, S. Cooperative Learning in the English Language Learning: A Systematic Review. ELLIC Journal, Universitas Negeri Jakarta. 2023. Available at: <https://jurnal.unimus.ac.id/index.php/ELLIC/article/viewFile/12551/7134>
5. ALZUBI, A.A., NAZIM, M., AHAMAD, J. Examining the Effect of a Collaborative Learning Intervention on EFL Students' English Learning and Social Interaction. Journal of Pedagogical Research. 2024, vol. 8(2). <https://doi.org/10.33902/JPR.202425541>
6. SEMANTIC SCHOLAR. Exploring Studies on Cooperative Principle in English Language Teaching. Available at: <https://pdfs.semanticscholar.org/121d/b51038415261a46cac615d2a61be731d780c.pdf>
7. GILLIES, R.M. Cooperative Learning and Learning Communities. In: Pedagogies to Enhance Learning for Indigenous Students. Springer, 2022. pp. 123-140. ISBN 978-3-031-04590-5. Available at: https://link.springer.com/chapter/10.1007/978-3-031-04590-5_8
8. GILLIES, R.M. A Historical Review of Collaborative Learning and Cooperative Learning. TechTrends. 2022. ISSN 8756-3894. Available at: <https://link.springer.com/article/10.1007/s11528-022-00823-9>
9. JOHNSON, D.W., JOHNSON, R.T. Cooperative Learning and Social Interdependence Theory. In: Theory and Research on Small Groups. Springer, 2002. pp. 9-35. ISBN 0-306-47144-2. Available at: https://link.springer.com/chapter/10.1007/0-306-47144-2_2
10. AI in Education, Cambridge University Press & Assessment. <https://www.cambridge.org/news-and-insights/Cambridge-brings-research-backed-AI-to-classroom> (visited 08.06.2025).
11. A Task-based Approach. <https://www.teachingenglish.org.uk/professional-development/teachers/knowning-subject/articles/task-based-approach> (visited 10.05.2025).

12. Teaching History through English – A CLIL Approach. Cambridge English. <https://www.cambridgeenglish.org/images/168750-teaching-history-through-english-a-clil-approach.pdf> (visited 08.06.2025).
13. CLIL – Content and Language Integrated Learning. <https://mim.gov.it/clil1> (visited 08.06.2025). MINISTRY OF EDUCATION AND MERIT (MIM), Italy. Linee guida per l'insegnamento dell'Educazione civica. Available at: <https://www.miur.gov.it/web/guest/educazione-civica> (visited 08.04.2025).
14. ISTAT. Struttura e performance delle cooperative italiane. 2021. Available at: <https://www.istat.it/it/files/2021/06/Struttura-e-performance-delle-cooperative-italiane.pdf> (visited 08.04.2025).
15. REPUBBLICA DIGITALE, Italy. National Strategy for Digital Skills. Available at: <https://repubblicadigitale.innovazione.gov.it/> (visited 08.04.2025).

COLLABORATION BETWEEN SCHOOLS AND SOCIAL COOPERATIVES. THE CASE STUDY OF THE “MEDAGLIE D’ORO INSTITUTE” IN ITALY

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Abstract

The “Medaglie d’Oro” State Comprehensive Institute of Salerno collaborates with various social cooperatives that provide specialist educational support services. These services promote autonomy and inclusive education for pupils with disabilities enrolled in schools at all levels. A particularly significant partnership has been established with the social cooperative’s “Il Deltaplano” consortium, which provides the school with specialised professionals working alongside teaching staff. Four specialist assistants from the Consortium are assigned to our Institute, supporting eight pupils with disabilities for six hours per week. Thanks to the presence of highly qualified personnel provided by the Consortium, there has been a marked improvement in the learning outcomes, social interaction, and inclusion of pupils with disabilities. It can be stated that the outcomes of this service are overwhelmingly positive, contributing to a balanced development from biological, psychological, and social perspectives. This approach aligns with the bio-psycho-social model developed by the World Health Organisation in 2001, as outlined in the International Classification of Functioning, Disability and Health (ICF).

Keywords: Social cooperatives, Consortium of Social Cooperatives, Specialist assistant, Pupils with disabilities

JEL: I21, P13, L31, I38

Introduction

Social cooperatives are entities within the Third Sector that address collective needs and pursue social aims. They fall under the broader category of cooperatives, which are characterised by two fundamental features: variable capital and a mutualistic purpose. The latter implies that the organisation is not profit-oriented [4]. From a legal perspective, social cooperatives are private enterprises and are thus governed by private law.

Social cooperatives are established through a public deed in the presence of a notary, who subsequently registers them with the Companies Register held by the Chamber of Commerce, Industry, Handicraft and Agriculture and in the Register of Cooperatives. Legislation provides for the following categories of social cooperatives:

- A. those providing personal services and involved in the management of social, health, and educational services;
- B. those engaged in various activities to integrate disadvantaged individuals into the workforce;

C. mixed-type cooperatives, incorporating both A and B.

The main sectors in which social cooperatives operate are social services, healthcare, and education. The case study examined in this paper focuses on the educational sector. Collaboration between schools and social cooperatives takes the form of a shared provision of specialist support assistants supplied by the cooperatives [1].

The legal foundation for the role of the specialist assistant is found in Article 13, paragraph 3, of Law No. 104/1992, which states: “In schools of all types and levels, while maintaining the obligation of local authorities to provide support for personal autonomy and communication for pupils with physical or sensory disabilities - as per Presidential Decree of 24th July 1977, No. 616 and its subsequent amendments - support activities are guaranteed through the assignment of specialised teachers” [13].

The need for specialist assistance is certified within the Functional Diagnosis by a child neuropsychiatrist, while the Individualised Educational Plan (IEP) specifies the weekly hours required by the pupil, in agreement with all members of the Operational Working Group (GLO).

The importance of planning and individualisation is reaffirmed through the Individualised Educational Plan (IEP), a tool recognised by both national policy and international research for its impact on student outcomes [5].

The role of the specialist assistant contributes to the broader process of educational inclusion for pupils with disabilities, providing support particularly in autonomy, communication, and socialisation.

The local authority, in this case, the Municipality of Salerno, allocates funds based on requests for service activation. Managing entities (Consortia, Cooperatives, etc.), listed in an official register of accredited organisations, are then engaged by families.

Several types of disabilities require specific expertise, from sensory disabilities to behavioural dysregulation and intellectual disabilities (genetic syndromes, ASD, and in some cases, ODD and ADHD), all of which are recognised under Article 13 of Law 104/1992.

Clarification is needed regarding the functions of the autonomy assistant:

Firstly, they are not a support teacher. They collaborate with the assigned teacher, without assuming a decision-making role in instructional planning.

Nor are they school support staff, as their work focuses on complex rather than basic autonomy.

They are best described as complementary, not alternative, figures within the educational team. The tools employed by the specialist assistant include observation and active participation in the educational process, both of which positively influence the inclusion process and enrich the affective dimension of the student-teacher relationship.

The primary functions of the autonomy and communication assistant for children with sensory or psycho - physical disabilities include:

Promoting the child’s autonomy by employing techniques to develop motor skills, from basic (walking, dressing, self-care) to more complex abilities.

Acting as a communication facilitator, helping the child acquire communication skills that enhance interaction with peers and adults.

Supporting socialisation, with particular attention to the child’s social and emotional well-

being in the classroom context.

These activities involve collaboration in the structuring, drafting, and regularly reviewing the Individualised Educational Plan [3; 9].

The Consortium of social cooperatives “Il Deltaplano” has provided specialist educational assistance for years. Professionals are assigned to pupils based on profiles that the Local Health Authority identified and detailed in the IEP. The specific competencies required - and possessed by educational assistants - include:

- *Autonomy Assistant*: promotes autonomy in learning processes and basic and socio-relational skills; supports the teaching team through simplified and structured materials, compensatory tools, and dispensatory measures;
- *Augmentative and/or Alternative Communication Assistant*: facilitates communication, and consequently learning and relationships between the pupil and their environment [14];
- *ABA Technician*: supports autistic pupils in acquiring functional behaviours that improve communication, community participation, and academic performance [16];
- *LIS Interpreter*: supports students with hearing impairments by translating between spoken language and sign language;
- *Braille Expert/Tiflodidactic Specialist*: supports blind or visually impaired students in achieving autonomy and social interaction, using adaptive learning tools.

Educational assistants in the communication area identify pupils' communication needs and propose (or enhance) augmentative and alternative communication tools, such as communication boards, PECS symbols, signs, visual supports, electronic communicators, and software-equipped devices. These tools facilitate academic learning and foster social interaction and emotional expression. Long-term goals include integrating the pupil's communication methods within their environment and reducing behaviour linked to communicative difficulties.

Educational assistants working in autonomy focus on developing motor and emotional expression skills and supporting task execution and lab/motor activities, starting from the individual's strengths.

ABA technicians operate under a supervisor's and rehabilitation therapists' guidance to adapt home-based intervention plans to the school context. They address all areas of pupil development - communication, socialisation, autonomy, academic skills, and behaviour regulation, - using strategies like prompting and positive reinforcement to reduce behaviours such as task avoidance, attention-seeking, or escape responses. The aim is the generalisation of learned skills.

Given the many variables in the school setting, objectives must be tailored to specific environmental conditions.

Tiflodidactic experts help visually impaired students study various subjects using adapted materials and assistive devices. These aids include hardware and software allowing non-sighted individuals to interact with a PC and engage in structured learning.

LIS communication specialists, trained in sign language translation, play a crucial role in academic and social inclusion by providing a visual-gestural language alternative to speech.

Within this framework, the role of the autonomy and communication assistant has evolved beyond basic support to facilitation and pedagogical mediation, aligning with contemporary perspectives in inclusive education [10].

The Consortium also ensures the presence of a Coordinator, who oversees the entire service, from initial communication with the Municipality and families, to contact with schools for intervention planning, staff selection based on required qualifications, and ongoing supervision of the educators.

The procedure involves the Municipality forwarding the names of pupils as families choose the service provider. The Coordinator then contacts families to gather information and schools to plan weekly schedules. The most suitable professional is assigned, with continuity prioritised when possible. Once assigned, the professional is introduced to the family and the school. The Coordinator communicates the start of service and schedules to all parties.

The Coordinator collects monthly attendance records, signed daily by the co-teacher, and uses these records to address service issues and potential solutions. Monitoring is done through monthly educator meetings, institutional check-ins, and phone contact with school and family stakeholders.

The Coordinator manages all school communication regarding absences, substitutions, timetable changes, and makeup sessions. Throughout the school year, they support assistants with access to educational materials and software for various areas of intervention.

The Coordinator also attends team meetings and GLOs, contributing to intervention planning and participating in technical meetings for more complex cases. Assistants are encouraged to liaise with all professionals involved in a pupil's development to ensure cohesive support.

In addition, the Coordinator, an expert in educational processes and intervention strategies, organises annual training programmes. These focus on real-life challenges faced by assistants and are designed to encourage practical exchange between professionals and teachers, offering strategies and operational guidance.

At the end of the academic year, the Coordinator provides final reports upon request, summarising each intervention, achieved objectives, encountered challenges, and hours delivered.

Regarding public institutions, the Coordinator communicates with the Municipal contact person, submitting the initial documentation (staff assignments, CVs, qualifications), monthly progress reports, and end-of-year documentation, including vouchers and service hours.

Capacity-building efforts led by the Consortium's Coordinator align with the recommendations of SIPeS [15].

“To achieve educational, developmental, and growth objectives, it is essential that every person involved in a child's journey is engaged and fully accountable in their role. The idea is capacity building: enabling all stakeholders to contribute to children's development according to their professional remit. No pedagogical success is possible without a collaborative educational system - an ecology of inclusion - where each actor bears equal responsibility based on their training and technical background. In such an ecosystem, no one is ever alone. Rather, it consists of interconnected subsystems working synergistically, communicating, deciding, acting, and reflecting together [11]. These ecosystems support schools in various contexts and counter a “siloe” vision, instead promoting a holistic and integrated view of inclusion. Ultimately, inclusion involves all actors within and beyond the school- teachers, operators, assistants, and all are fully accountable for the inclusive process. Inclusion cannot simply be delegated; it requires shared involvement and equal treatment of all parties” [8].

Results obtained and discussions

The State Comprehensive Institute “Medaglie D’Oro” in Salerno is a public educational institution comprising three school levels: nursery (early childhood), primary, and lower secondary education. In the current academic year (2024/2025), the student population numbers approximately 1,079 pupils, distributed across the various school levels as shown in the tables below.

General Data – Nursery School of the “Medaglie D’Oro” Comprehensive Institute Class Structure for the 2024/2025 Academic Year Conclusions

Number of part-time sections: 25 hours (a)	Number of full-time sections: 40 hours (b)	Total number of sections (c = a + b)	Number of children enrolled as of 1st September 2024	Number of children in part-time sections (d)	Number of children full-time sections (e)	Total number of children (f = d + e)	Of those with disabilities	The average For section (f / c)
1	11	12	292	16	276	292	12	24.3

General Data – Nursery School of the “Medaglie D’Oro” Comprehensive Institute Class Structure for the 2024/2025 School Year

	Number of 24-hour classes (a)	Number of standard-time classes (27 to 30 hours per week) (b)	Number of full-time classes (40 hours per week) (c)	Total number of classes (d = a + b + c)	Pupils enrolled as of 1st September 2024 (e)	Pupils in 24-hour classes (f)	Pupils in standard-time classes (27 to 30 hours per week) (g)	Pupils in full-time classes (40 hours per week) (h)	Total number of pupils (i = f + g + h)	Of those with disabilities	Difference between enrolled and attending pupils (l = e – i)	Average number of pupils per class (i / d)
First	/	3	4	7	142	/	62	80	142	2	/	20,2
Second	/	4	3	7	132	/	78	54	132	3	/	18,8
Third	/	4	3	7	138	/	81	57	138	6	/	19,7
Fourth	/	6	2	8	138	/	97	41	138	5	/	17,2
Fifth	/	4	2	6	125	/	78	47	125	8	/	20,8
Total	/	21	14	35	675	/	396	279	675	24	/	19,2

General Data – Lower Secondary School of the “Medaglie D’Oro” Comprehensive Institute

First	/	2	/	2	36	/	36	/	36	4	/	18
Second	/	3	/	3	58	/	58	/	58	2	/	19
Third	/	1	/	1	18	/	18	/	18	1	/	18
Totale	/	6	/	6	112	/	112	/	112	7	/	18,6

Human Resources of the “Medaglie D’Oro” Comprehensive Institute

The school staff of the Institute, which includes employees from the nursery, primary, and lower secondary school levels, is assigned by the Territorial Office of the Salerno Education Authority according to the actual number of sections and classes. The teaching staff allocated for support has been internally distributed based on the characteristics outlined in the Functional Diagnoses of pupils with disabilities. School support staff (*School Collaborators*) are allocated across the different school buildings according to the structure of the facilities, the school hours provided, the number of classes or sections, and the age of the pupils. The staffing situation for teaching and non-teaching personnel (ATA) for the 2024/2025 school year is as follows:

School Staff Data of the “Medaglie D’Oro” Comprehensive Institute	
Academic Year 2024/2025	
<i>Leadership Staff</i>	
Headteacher	1
<i>Teaching Staff</i>	<i>Numeros</i>
Full-time permanent teachers	78
Part-time permanent teachers	10
Full-time permanent special education teachers	25
Part-time permanent special education teachers	1
Full-time temporary teachers (contract until 30th June)	4
Part-time temporary teachers (contract until 30th June)	2
Full-time temporary special education teachers (contract until 30th June)	7
Part-time temporary special education teachers (contract until 30th June)	2
Full-time permanent religion teachers	3
Temporary religion teachers (annual appointment)	5
<i>Total Teaching Staff</i>	<i>137</i>
<i>Non-Teaching Staff</i>	<i>Number</i>
Administrative and General Services Director (DSGA)	1
Full-time permanent administrative assistants	5
Part-time permanent administrative assistants	1
Full-time temporary administrative assistants (contract until 30th June)	1
Part-time temporary administrative assistants (contract until 30th June)	2
Permanent school support staff (collaboratori scolastici)	16
Temporary school support staff (annual contract)	0
Temporary school support staff (contract until 30th June)	3
<i>Total ATA Staff</i>	<i>29</i>

Structural Resources of the “Medaglie D’Oro” Comprehensive Institute

From a structural perspective, the premises of the Institute, in addition to classrooms and administrative offices, include the following facilities:

Medaglie d’Oro School Building:

- n.1 science laboratory
- n.1 computer laboratory
- n.1 multipurpose room
- n.1 gymnasium
- n.1 library
- n.1 creative workshop (currently used as a classroom)
- n.1 canteen

Giacomo Costa School Building:

- n.1 gymnasium
- n.1 science laboratory
- n.1 theatre
- n.1 canteen.

Specialist staff from the “Il Deltaplano” Consortium of Social Cooperatives operating within the Medaglie d’Oro Comprehensive Institute.

The specialist educational assistants from the Consortium of Social Cooperatives “Il Deltaplano” conducted their activities at the “Medaglie d’Oro” State Comprehensive Institute in Salerno during the 2024/2025 academic year. Four professionals were engaged, supporting eight pupils with disabilities across different school levels, specifically within early childhood education and primary school.

The methodology adopted for assessing the impact of the role of specialist assistants from social cooperatives within educational institutions consisted of a comparative analysis between the Individualised Educational Plans (IEPs) of students with disabilities at the beginning of the academic year and the final evaluations compiled at the end of the year by the Operative Working Group (Gruppo di Lavoro Operativo). This approach aimed to identify the changes that occurred during the reference period. Specifically, a comparison was carried out between the initial IEPs of the eight pupils with disabilities enrolled at the “Medaglie d’Oro” Comprehensive Institute in Salerno and their Final IEP Evaluations discussed by the Operative Working Group on 12th May 2025, with the full participation of all relevant stakeholders. The analysis revealed substantial improvements across several supervised developmental areas, namely:

- Relational, interactive, and social skills;
- Communication and language;
- Autonomy and orientation;
- Cognitive, neuropsychological, and learning domains.

Following a thorough review of the documentation and extensive discussion during the formal Operative Working Group session, it was confirmed that the observed positive outcomes in the developmental progress of pupils with disabilities were attributable not only to the support provided by the specialised teaching staff but also to the contribution of the specialist assistants. Indeed, the specialist assistant’s presence, who highlighted strategies for addressing critical issues and managing problem behaviours, enabled the support teacher to intervene in a more targeted and effective manner during crisis episodes. This, in turn, allowed the teacher to focus their energy more effectively on their role’s educational and didactic aspects.

Conclusions

The case study of the “Medaglie d’Oro” Comprehensive Institute in Salerno highlights the application of a coordinated, multidimensional approach to support pupils with disabilities. This model resonates with the ecological framework proposed by Booth and Ainscow, wherein inclusive pathways are structured around dynamic stakeholder interaction [2].

Given the overwhelmingly positive outcomes resulting from the provision of specialist educational assistance, thoroughly documented in the preceding Operational Working Group (GLO), during the final meeting of the academic year, the continuation of specialist assistance resources for all students with disabilities is supported by the “Il Deltaplano” Consortium. This confirmation applies to the subsequent school year.

The positive results observed across various dimensions attest to the effectiveness of the intervention, aligning with the bio-psycho-social model introduced in 2001 by the World Health Organisation (WHO) through the International Classification of Functioning, Disability and Health

(ICF) [17]. Furthermore, synergistic collaboration between schools and local services reflects one of the fundamental principles advocated by the Belgian educator and neurologist Jean Ovide Decroly, widely regarded in educational literature as a pioneer in studying so-called “irregular” children [6; 7].

The case study concerning the partnership between the Istituto Comprensivo “Medaglie D’Oro” and the “Il Deltaplano” Consortium highlights a notably positive impact on inclusive outcomes that is not evident in cases where specialist assistance is absent from the support network for students with disabilities.

Statistical reports confirm that inclusive outcomes are significantly enhanced when adequate professional support is in place [12].

References

1. BOCCI, F., CATARCI, M., FIORUCCI, M. (eds.) Educational inclusion: A study on the role of the specialist assistant in upper secondary school. Roma: Roma Tre Press, 2018.
2. BOOTH, T., AINSLOW, M. The new Index for Inclusion: Pathways for learning and participation in schools. Roma: Carocci, 2014.
3. COMUNE DI ROMA. Municipal Resolution No. 80/2017, Art. 11.
4. COTTINI, L. Special education and school inclusion. Roma: Carocci, 2011.
5. CRONBACH, L. J. Designing evaluations for educational and social programs. San Francisco: Jossey-Bass, 1982.
6. DECROLY, O. The function of globalisation and teaching. Firenze: La Nuova Italia, 1953.
7. DECROLY, O. General notions on the emotional development of the child. Firenze: La Nuova Italia, 1955.
8. DI MICHELE, P., ZAGNI, B. For a new ecology of inclusion: The school system and specialist assistants for autonomy and communication. L'integrazione scolastica e sociale. 2022, vol. 21(4), pp. 92–123. ISSN 1129-8575.
9. DI MICHELE, P. Disability and school inclusion: A study on autonomy and communication assistants. L'integrazione scolastica e sociale. 2020, vol. 19(3), pp. 129–130. ISSN 1129-8575.
10. GUGLIELMUCCI, S. The role of the AEC: From assistance to facilitation for pupils with special educational needs. Roma: Alpes Italia, 2017.
11. IANES, D., CRAMEROTTI, S., FOGAROLO, F. The New Individualised Education Plan (IEP) from a Bio-Psycho-Social and Ecological Perspective. Trento: Erickson, 2021.
12. ISTITUTO NAZIONALE DI STATISTICA (ISTAT). School inclusion of pupils with disabilities: Academic year 2020–2021. Available at: <https://www.istat.it/it/archivio/265364> (visited 18.05.2025).
13. MIUR. Note Prot. No. 3390 – Subject: Basic assistance for pupils with disabilities. 2001. Available at: https://archivio.pubblica.istruzione.it/news/2001/prot3390_01.shtml (visited 18.05.2025).
14. PAVONE, M. Educational inclusion: Pedagogical guidance for disability. Milano: Mondadori, 2014.
15. SIPeS – SOCIETÀ ITALIANA DI PEDAGOGIA SPECIALE. Official statement on the development of the professional profile of the socio-pedagogical educator supporting autonomy and communication in school inclusion. 2023. Available at: <https://s-sipes.it/educatore-professionale-per-il-sostegno-allautonomia-e-alla-comunicazione/documento-ufficiale-della-societa-italiana-di-pedagogia-speciale-sipes/> (visited 18.05.2025).
16. VACCARO, D. Training pathways for severe disability for teachers and educators. Gaia Publishing – Periscopio. 2007.
17. WORLD HEALTH ORGANIZATION. International Classification of Functioning, Disability and Health (ICF). Ginevra: WHO, 2001.

DIALECTICAL METHODS IN ACCOUNTING RESEARCH

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Abstract

In the process of cognition and practical activity, humanity sets certain goals and tasks. To implement these intentions, a method must be used - that is, effective approaches and principles of theoretical research and practical action must be identified. Without a method, no scientific or practical tasks can be solved. The method is largely

determined by the phenomena being studied, which possess their own regularities. Each field of science or practice develops its own specific methods.

Scientific philosophy has developed its universal method of cognition - materialist dialectics, which provides the key to understanding all areas of reality in nature, society, and thought - the world as a whole.

The laws and methods of dialectics are based on specific categories and concepts. Philosophical categories are concepts that reflect the general features and relationships, aspects, and properties of reality. The main ones include: the particular (individual) and the general, content and form, essence and phenomenon, cause and effect, necessity and chance, possibility and actuality. Each of these categories, with their objective nature, is extremely important for practical and cognitive activity, and for scientific research in various fields of technical-technological and socio-economic knowledge.

The laws and methods of dialectics are universal. This universality is of critical importance in understanding the most diverse phenomena of the world.

Thus, the use of dialectical methods in philosophy plays an essential role in the development of other sciences, such as management, marketing, finance, accounting, economic analysis, and other fields. In this paper, the author seeks to identify and develop the close relationship between dialectical methods and categories of cognition, and the methods and elements characteristic of accounting, with the aim of its improvement and development.

Keywords: *dialectics, methods of cognition, categories, accounting, accounts and double-entry, induction and deduction*

JEL: M41

Introduction

The research in this paper is based on the examination of fundamental phenomena specific to the concepts, classification, valuation, and recognition of economic and accounting elements; the use of tools; adherence to rules, techniques, and methods of organizing and maintaining accounting records; and the preparation of financial statements.

Scientific research is grounded in the spatial dialectical method of understanding the state and movement of matter through its fundamental elements: induction and deduction, analysis and synthesis, grouping and classification, sampling and comparison, primary and secondary, the manifestation of the particular in the general and vice versa, and others.

Results obtained and discussions

Any science in the field of material reality is not only a system of laws but is also based on certain categories - on the most general concepts developed in the course of each science's evolution, forming its foundation and essence. For example, chemistry is based on such categories as atom, molecule, chemical element, and reaction; mechanics on mass, energy, and force; economics on goods, value, profitability, and so on. In accounting and auditing, the basic categorical concepts include assets, liabilities, cost, capital, double-entry, accounts, documentation, control, income, expenses, profit, and others.

Various categories across the spectrum of sciences in human society are interconnected and share content with general philosophical categories that reflect the general features, relationships, aspects, and properties of reality. Among these are the categories of matter and consciousness, as well as movement, space, and time. Dialectical categories such as the particular and the general, content and form, essence and phenomenon, cause and effect, necessity and chance, possibility and actuality play an essential role in all sciences.

In this age of great scientific achievement, profound philosophical generalizations are indispensable. The tremendous growth of scientific and technological progress and its rapid

evolution demand a close alliance between philosophy - the science of sciences - and the specific disciplines. Philosophy helps one properly orient themselves in the objective world, consistently perceive its material nature, and apply the dialectics of nature in specific scientific research.

However, in the interest of fairness and objectivity, it must be noted that dialectical techniques and methods, the conceptual content of general scientific categories and elements, and their direct and symbolic continuity and connection with specific scientific-practical studies such as monographs, dissertations, and articles are insufficiently disclosed. At best, these methods are reduced to a mere listing of basic general scientific techniques and elements without demonstrating their concrete theoretical and practical implementation in the respective research. This applies to scientific fields such as economics, management, statistics, marketing, accounting, auditing, and others.

The aim of this paper is to partially address this issue by exploring the interconnection and interdependence between general scientific principles and the impact of dialectical methods, elements, and categories on the conceptual definitions of accounting methods and techniques. It also seeks to promote their creative scientific and practical development and application in improving accounting and financial reporting, based on the accountant's professional judgment and prestige.

Let us now turn to the categories of induction and deduction. Induction is a set of rules that allow for the transition from the particular to the general, from knowledge of individual facts to understanding the law underlying those facts. Deduction is the opposite method - it reflects the transition from the logical understanding of a general law to specific facts or phenomena, i.e., deriving specific knowledge from general principles. Induction and deduction are interconnected, complement each other, and cannot exist independently. These dialectical methods interact spatially through the prism of subjects and elements by means of their comprehension in accounting, where development is based on business transactions (facts), reflected in primary documents and accumulated (inductively) into significant general categories such as assets, liabilities, debtors, creditors, balance sheet, financial statements, and others.

Through the inductive dialectical method, the accountant seeks to meet all fair and objective requirements and rules in order to achieve a reliable final result - useful for managerial decision-making. The set of requirements and rules used in induction within the accounting system is reflected through standard prescriptions for organizing and maintaining current records and reporting.

Accounting policies developed by accountants for each fiscal year serve as a program for the implementation and observance of the inductive method based on general accounting standards and principles.

The deductive method is based on the qualitative and critical study of general business indicators, through analysis and identification of positive and negative actions in accounting practices. Thus, general categories and their deductive content are understood and developed into specific, individual elements. For example, profitability is used to explore the factor structure of profit; through profit, the impact of income and expenses is determined; and these are critically evaluated to identify the positive and negative effects of specific business actions or facts.

Similarly, the inductive and deductive essence is present in other key economic elements such as accounts receivable and payable, accounting entries and double-entry bookkeeping, equity,

the balance sheet, and others. Each reflects the interrelation and interdependence of the general within the particular and the need for understanding through structural content.

Therefore, the use of inductive and deductive methods in organizing accounting and financial reporting is highly relevant and necessary in scientific and practical research, especially in the context of globalization and standardization.

Equally significant in dialectical cognition are the concepts of logical reasoning in the form of analysis and synthesis. Analysis represents the intellectual process of breaking a subject or phenomenon into its constituent elements, while synthesis is the opposite process - the reconstruction of the whole from analytically derived parts.

When considering the concepts of synthesis and analysis in the theory and practice of accounting systems, their important role in the creative process of improving the scientific and practical organization of analytical and synthetic accounting and reporting becomes clear. To obtain reliable information in real synthetic reporting, it is essential to have a properly structured and implemented plan of synthetic accounts and subaccounts, along with their analytical components - such as articles and sub-articles.

Through synthesis and analysis, the microcosm of the economic condition and development of the entity, enterprise, or organization is reflected.

The scientific specialty “Accounting, Auditing, Economic Analysis” is in itself a synthetic combination of individual analytical components, each expressing a complex of scientific concepts and directions - specifically in accounting, auditing, and economic analysis. Each of these components is closely connected and interdependent, even though accounting, auditing, and economic analysis have their own specific subjects and methods of study.

For example, in accounting, there are synthetic categories composed of analytical elements that form a coherent whole. This structure is evident in the relationships between the balance sheet and its component groups - assets and liabilities - and their subsequent breakdown into individual items and sub-items. The aim of scientific research in this context is to thoroughly study the impact of each analytical component on the overall favorable balance sheet position of the enterprise.

From the perspective of analysis and synthesis, other objects and phenomena in accounting can also be studied - such as the system of accounts and double-entry bookkeeping, the structural content of automated accounting processes, managerial and financial accounting systems, and many other areas of accounting improvement.

Another significant philosophical category is the content and form of an object or phenomenon. Every content has a corresponding form, just as every form reflects its corresponding content. Content represents the set of elements and processes that constitute a given object or phenomenon, while form reflects the structure and organization of that content. Dialectics views content and form as a unity - they are inseparable. For example, a balance sheet cannot exist without the content of its relevant sections, groups, and items of assets and liabilities. Accounts with debits and credits cannot exist without accounting entries.

The goal of scientific research in accounting is to ensure the appropriate form of accounting objects and phenomena through the accurate reflection of their content, in the interest of effective operational management and informed decision-making.

One of the most relevant and meaningful philosophical categories is cause and effect, which are observed in the constant interaction of phenomena. A phenomenon that generates another as a

result of interaction is called the cause; the resulting phenomenon is the effect. The cause always precedes the effect.

In accounting, as in other social phenomena, cause and effect often manifest themselves. The consequences of errors, incorrect entries, and violations of standards and legal regulations are caused, in many cases, by insufficient knowledge, low qualifications of accounting specialists, or lack of high-quality professional judgment. In other cases, they may result from deliberate actions and abuse by company personnel. The effect is the result of corresponding flawed causes.

In accounting, as in other socio-economic phenomena, cause and effect are closely interrelated and inseparable. It is important that scientific research enables the anticipation and timely prevention of negative effects by eliminating their corresponding causes. This ensures that actions are directed only toward favorable outcomes - the positive effects of well-understood and properly influenced causes.

It is also important to highlight the significance of other dialectical methods of cognition in general scientific research within economic fields of knowledge, including accounting, auditing, and economic analysis. These include the processes of grouping and classification, sampling and comparison, recognition of the primary and secondary.

In the accounting system, grouping and classification of assets and liabilities are always present, aimed at focusing attention on their impact on preservation and rational use in economic and financial activities. Depending on their absolute or relative proportion, the primary and secondary, the essential and non-essential, are determined. This is especially evident in factor analysis of synthetic indicators such as profitability, profit margin, inventory turnover, return on assets, capital intensity, and others.

Conclusion

In conclusion, this paper emphasizes the significant and multifaceted role played by the influence and skillful application of dialectical methods, categories, and elements of cognition in theoretical and practical scientific research - particularly in accounting, but equally in other areas of social knowledge.

References

1. Law on Accounting and Financial Reporting No. 287 dated December 15, 2017. Monitorul Oficial No. 1-6 of January 5, 2018.
2. Afanasyev, V.G. Fundamentals of Philosophical Knowledge. Publishing House of Socio-Economic Literature. Moscow, 1963, 400 p.
3. Bilukha, M.T. Fundamentals of Scientific Research. "Vyshcha Shkola" Publishing, Kyiv, 1997, 272 p.
4. Viorel Țurcanu. Cost Calculation. ASEM, Chișinău, 2001, p.116.
5. Lamykin, I.A. Accounting. "Filin" Publishing, Moscow, 2000, 517 p.
6. Sokolov, Ya.V. Accounting: From Origins to the Present. Moscow: "Audit", "UNITY" Publishing, 1996, 640 p.
7. Tudor Tuhari. Accounting of Trade Operations. UCCM, Chișinău, 2002, p.216.
8. Hendriksen, E.S., Van Breda, M.F. Accounting Theory. Translated from English under the editorship of Prof. Ya.V. Sokolov, Moscow: Finance and Statistics, 1997, 576 p.

THEORETICAL COORDINATES REGARDING ACADEMIC ETHICS AND INTEGRITY (Part I)

COORDONATE TEORETICE PRIVIND ETICA ȘI INTEGRITATEA ACADEMICĂ (Partea I)

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Abstract

The code of ethics and professional deontology in the university environment is a document, a component that completes the University Charter. It basically represents a moral contract between the members of the academic community, which is focused on specific principles of professional and moral conduct. Ethics is centered on the aspects of moral human relations and common coexistence. Ethics has as fundamental elements activities and actions based on moral norms. The ethical value is found in the quality of collective and individual actions and interactions. For the first part, we aimed to present a set of theoretical concepts and to provide a synthetic exposition of the values and principles that govern the academic university environment.

Keywords: University Charter, Code of Ethics, ethics, integrity, principles, university, values, moral values

JEL: K10

1. Introducere

Specificul sistemului de studii Bologna constă în:

A. compoziția etapizată al acestuia;

B. sistem comun de credite;

C. suplimentul de diplomă.

A. Raportat la compoziția etapizată a sistemului Bologna, cele trei etape se prezintă astfel:

- ✚ Etapa I, este aferentă studiilor de licență, care se poate desfășura pe o perioadă de trei sau de patru ani;
- ✚ Etapa II, vizează studiile de masterat, care pot fi de un an sau de doi ani;
- ✚ Etapa III, este destinată pentru studiile de doctorat.

B. sistem de credite de studii este unul comun și este denumit sistem de credite de studii transferabile (ECTS), care permite când este cazul:

- ✚ mobilitatea studentilor;
- ✚ posibilitatea de echivalare a studiilor;
- ✚ etc. care

C. suplimentul de diplomă dă posibilitatea pentru:

- ✚ îmbunătățirea sistemului de învățământ;
- ✚ permisibilitatea comparării diplomelor;
- ✚ comparabilitatea calității calificărilor în baza diplomelor obținute;
- ✚ susține competitivitatea sistemului de studii comunitar;
- ✚ susține competitivitatea sistemului de studii europen la scară internațional;
- ✚ permisibilitatea comparării diplomelor;
- ✚ armonizarea la reglementările și standardele comunitare;

- + integrarea pe piața comună a muncii;
- + etc.

O prezentare sintetică a sistemului de studii Bologna o prezentăm în Figura 1.

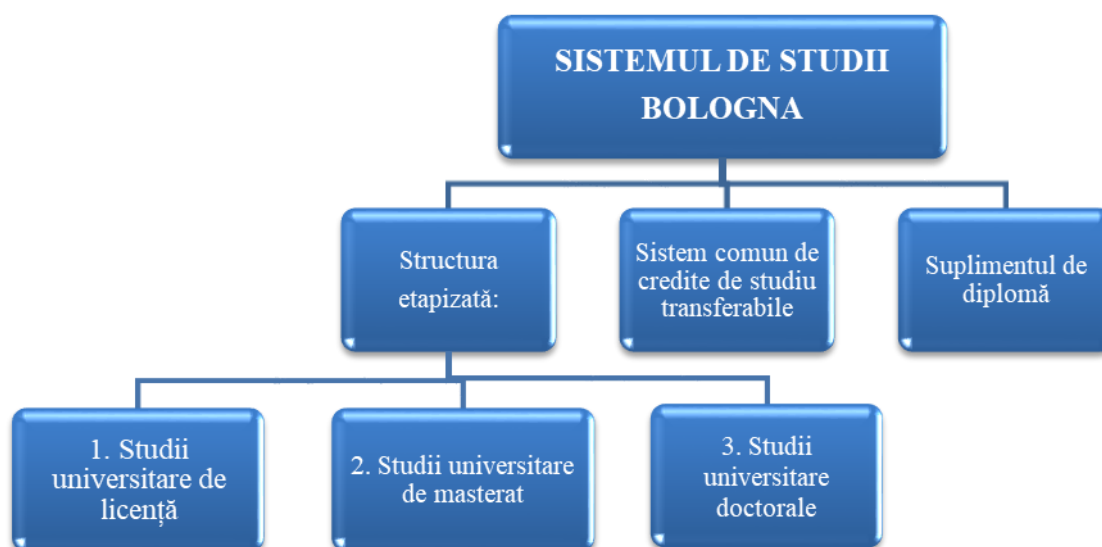


Figura 1. Sistemul comunitar de învățământ Bologna

Sursa: Autor

La baza acestui sistem de învățământ stau un set de principii și de valori, după care se ghidează.

Rezultate și discuții

Procesul Bologna presupune armonizarea la valorile și principiile pe care le promovează Codul etic. Aceste principii sunt prezentate sintetic în Tabelul 1.

Tabelul 1. Principii academice

Nr. crt.	Denumirea principiilor
1	Principiul libertatea academică.
2	Principiul autonomia personală.
3	Principiul dreptatea și echitatea .
5	Principiul meritul .
6	Principiul profesionalismul.
7	Principiul onestitatea și corectitudinea intelectuală.
8	Principiul transparența.
9	Principiul respectul și toleranța.
10	Principiul responsabilitatea.
11	Principiul bunăvoința și grija față de oameni.

Într-o manieră schematică, aceste principii sunt prezentate în Figura 2, astfel:



Figura 2. Valorile și principiile academice

Sursa: Autor

Cadru conceptual. Definiții

Pentru înțelegerea conceptelor teoretice, prezentăm într-o manieră sintetică o parte a conceptelor și definițiilor acestora care privesc aspectele generale de etică și integritate academică.

Tabelul 2. Concepte și Definiții

Nr. crt.	Conceptul	Definiția
1	Cartă	1. Act destinat a consemna unele privilegii și libertăți fundamentale ale unor clase sau păături sociale și a servi drept constituție unui stat. 3. Act care stă la baza organizării și funcționării unei organizații internaționale.
2	Magna Charta Universitatum Europaeum	La data de 18 septembrie 1988 la Piazza Maggiore din Bologna a fost semnată de către 430 de rectori
3	Cinste	1. Merit moral sau social care atrage după sine nume bun, prestigiu. 2. Recunoaștere a meritelor cuiva, manifestare exterioară a prețuirii, a respectului pentru cineva.
5	Face cinste	A oferi cuiva într-un local, plătindu-i consumația. ¹
6	În cinste	A primi în dar, cadou, plocon ²
7	Climat universitar	Starea din mediul universitar
8	Codul de etică și deontologie profesională universitară	Contract moral între studenți, profesori, personalul administrativ și comunitatea universitară în ansamblu, contribuind la coeziunea membrilor universității și la formarea unui climat universitar întemeiat pe cooperare și competiție și la creșterea prestigiului Universității.
9	Compromis	1. (Despre oameni) Cu reputația pătată. 2. Primejduit, stricat.
10	Deplinătate	Faptul de a fi deplin, desăvârșit. ³
11	Desăvârșit	Ajuns la perfecțiune. ⁴
12	Deontologie	1. Doctrină privitoare la normele de conduită și la obligațiile etice ale unei profesii. 2. Compartiment al eticii care se ocupă cu studiul normelor și obligațiilor specifice unei activități. ⁵
13	Dezonorat	Care și-a pierdut onoarea; care s-a făcut de rușine.
14	Discreditat	Care și-a pierdut creditul, considerația, bunul renume. ⁶
15	Etică	1. Principiile și concepțiile de bază din orice domeniu al gândirii și activității practice. 2. Ansamblu de norme în raport cu care un grup uman își reglează comportamentul pentru a deosebi ce este legitim și acceptabil în realizarea scopurilor. ⁷
16	Etică	1. Studiul teoretic al principiilor și concepțiilor de bază din orice domeniu al gândirii și activității practice. 2. Ansamblu de norme în raport cu care un grup uman își reglează comportamentul pentru a deosebi ce este legitim și acceptabil în realizarea scopurilor. ⁸
17	Etic	Privitor la <u>etică</u> , de etică, bazat pe etică, conform cu etica. ⁹

¹ cinste - definiție și paradigmă | dexonline² cinste - definiție și paradigmă | dexonline³ deplinătate - definiție și paradigmă | dexonline⁴ desăvârșit - definiție și paradigmă | dexonline⁵ deontologie - definiție | dexonline⁶ discreditat - definiție și paradigmă | dexonline⁷ etică - definiție și paradigmă | dexonline⁸ etică - definiție și paradigmă | dexonline⁹ etică - definiție și paradigmă | dexonline

18	Etica universitara	Principii și concepții de bază din mediul academic
19	Independența	Independența este: 1. Independența raționamentului – starea de spirit care permite exprimarea unei opinii fără a fi afectat de influențe ce compromit raționamentul profesional, permițând unui individ să acționeze cu integritate și să exercite obiectivitate și scepticism profesional; 2. Independența în aparență – evitarea faptelor și circumstanțelor care sunt atât de semnificative încât o terță parte rațională și informată, fiind la curent cu toate informațiile relevante, inclusiv cu măsurile de siguranță aplicate va ajunge la concluzia pertinentă că integritatea, obiectivitatea sau scepticismul profesional al unui auditor sau al unui membru al echipei de audit a fost compromis. ¹⁰
	Integritate	1. Însușirea de a fi integru. 2. Însușirea de a fi sau de a rămâne intact, întreg.
20	Inteligent	3. Capacitatea de a gândi, de a cunoaște, de a avea o activitate rațională, de a opera cu noțiuni. ¹¹
21	Incoruptibilitate	Calitate a celui care nu se lasă corupt; cinste exemplară. ¹²
22	Interesul financiar	Un interes în capitalurile proprii sau alte titluri de proprietate, obligațiunile, împrumuturile, sau alte titluri de creanță asupra unei entități, inclusiv drepturile și obligațiile de a achiziționa un astfel de interes și derivatele direct legate de un astfel de interes. ¹³
23	Interes financiar direct	Un interes financiar: Deținut direct de către, și aflat sub controlul unui individ sau al unei entități (inclusiv acele entități conduse de alte persoane în mod discreționar); sau Deținute în beneficiul propriu printr-un mijloc colectiv de investiție, o proprietate sau un fond sau printr-un alt intermediar asupra căruia individul sau entitatea deține controlul. ¹⁴
24	Interes financiar indirect	Un interes financiar deținut în beneficiul propriu printr-un fond mutual, o proprietate sau un mijloc colectiv de investiție, sau printr-un alt intermediar, asupra căruia individul sau entitatea nu poate exercita controlul. ¹⁵
25	Judecată	Facultatea de a gândi logic
26	Moral	1. Care aparține moralei, conduitei admise și practicate într-o societate, care se referă la morală; care este conform cu morală ¹⁶ 2. Care aparține psihicului, spiritului, intelectului, care se referă la psihic, spirit sau intelect ¹⁷
27	Morală	1. Ansamblul convingerilor, atitudinilor, deprinderilor reflectate și fixate în principii, norme, reguli, determinate istoric și social, care reglementează comportarea și raporturile indivizilor între ei, precum și

¹⁰ Cod privind Conduita Etică a Auditorilor Financieri, pg. 6¹¹ intelect - definiție și paradigmă | dexonline¹² incoruptibilitate - definiție și paradigmă | dexonline¹³ Cod privind Conduita Etică a Auditorilor Financieri, pg. 6¹⁴ Cod privind Conduita Etică a Auditorilor Financieri, pg. 6¹⁵ Cod privind Conduita Etică a Auditorilor Financieri, pg. 6¹⁶ <https://dexonline.ro/definitie/judecata>¹⁷ morală - definiție și paradigmă | dexonline

		dintre aceștia și colectivitate și a căror respectare se întemeiază pe conștiință și pe opinia publică 2. Disciplină științifică care se ocupă cu normele de comportare a oamenilor în societate 3. Concluzie moralizatoare cuprinsă într-o scriere, mai ales într-o fabulă ¹⁸
28	Obiectivitate	O combinație de imparțialitate, onestitate intelectuală și lipsă a conflictelor de interese. ¹⁹
29	Opinie	Idee, judecată, părere ²⁰
30	Opinia publică	părerea publicului într-o anumită chestiune ²¹
31	A face opinie separată	susține în mod ferm o părere deosebită de cea a majorității; a nu se alătura părerii majorității ²²
32	Norme de conduită profesională și morale	Rguli obligatorii pentru membrii comunității academice în activitatea lor profesională și de conviețuire atât în interiorul spațiului academic cât și în afara acestuia
33	Public	Care aparține unei colectivități umane sau provine de la o asemenea colectivitate, care privește pe toți, la care participă toți ²³
34	Onestitate	Cinste, corectitudine, integritate, probitate. ²⁴
35	Onoare	Integritate morală ²⁵
36	Pe onoarea mea	formulă folosită pentru a întări o afirmație sau pentru a garanta respectarea unei promisiuni
37	Perfecțiune	1. Însușirea de a fi perfect, starea a ceea ce este perfect. 2. <u>Concretizat</u> : Lucru sau ființă perfectă, desăvârșită. 3. (În teologia și filozofia tradițională) Caracterul a ceea ce este neschimbător și autonom, care nu posedă nimic potențial.
38	Principii	Norme de conduită
39	Probitate	Numărul complet al lucrurilor sau al ființelor în discuție; ansamblul lucrurilor sau al ființelor legate între ele. ²⁶
40	Totalitate	Numărul complet al lucrurilor sau al ființelor în discuție; ansamblul lucrurilor sau al ființelor legate între ele.
41	Universitatea	Universitatea este o instituție particulară de învățământ superior și cercetare, acreditată
42	Universitar	1. Care aparține universității, privitor la universitate. 1.1. <i>Oraș</i> (sau <i>centru</i>) <i>universitar</i> = oraș în care se află o universitate. 1.2. Persoană care face parte din corpul didactic al unei universități. ²⁷

Sursa: autor, prelucrat după surse indicate

¹⁸ morala - definiție și paradigmă | dexonline

¹⁹ Cod privind Conduita Etică a Auditorilor Financieri

²⁰ opinie - definiție și paradigmă | dexonline

²¹ opinie - definiție și paradigmă | dexonline

²² opinie - definiție și paradigmă | dexonline

²³ public - definiție și paradigmă | dexonline

²⁴ onestitate - definiție și paradigmă | dexonline

²⁵ onoare - definiție și paradigmă | dexonline

²⁶ totalitate - definiție și paradigmă | dexonline

²⁷ universitar - definiție și paradigmă | dexonline

Concluzii

Deși la momentul demarării sistemului de studii Bologna, România nu era o țară membră a comunității europene, observăm faptul că:

- a sprijinit procesul de studii Bologna;
- a pregătit suportul legal privitor la noul sistem de învățământ cu un an înainte de apicare în practică;
- adoptă Legea 288/2004 organizarea învățământului superior pe 3 cicluri (licente, master, doctorat);
- a proedat la implementarea noului sistem de învățământ din anul universitar 2005–2006.

Anul 2025 reprezintă un an aniversar pentru sistemul de studii Bologna. În acest orizont de timp al anilor 2005–2025 constatăm, (fără a avea pretenția că le enumerăm pe toate) următoarele:

- se raportează și aplică principiile cuprinse în Magna Carta universităților europene;
- respectă principiile incluse în Magna Carta universităților europene;
- a manifestat un interes continuu pentru perfecționare și competitivitate continuă la cele mai înalte standarde;
- armonizarea la aquis-ul comunitar în materie;
- adaptabilitate la schimbări;
- sustenabilitate;
- durabilitate;
- schimb de experiență pentru student și profesori;
- mobilități academice;
- susținere comunitară prin diferite programe pentru student și profesori;
- introducerea inteligenței artificiale(AI), pentru predare;
- etc.

Bibliografia

1. Magna Charta Universitatum Europaeum
2. <https://dexonline.ro/>
3. Cod privind Conduita Etică a Auditorilor Financiari

THE SOCIAL BALANCE AS A COMMUNICATION TOOL FOR THE RELATIONSHIPS BETWEEN SCHOOLS AND COOPERATIVE COMPANY

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Abstract

Many changes have interested the educational sector in the second half of the nineties. One of the most important changes is represented by a new form of culture that indicates the transformation from the bureaucratic model to an innovative managerial system, typical of the private sector. In Italy, this process is inspired by the reformist trend of the "new public management" that has characterised many countries of common law. In the educational regulations, an innovative law has introduced school autonomy. The logical consequence of autonomy is represented by the need to report to the community the results obtained based on the choices, activities, and

resources. In the modernisation of the educational sector, great attention is paid to the systems of accountability through drafting the social balance sheet. School institutions maintain numerous relationships with cooperative enterprises. Therefore, the social balance sheet is an important communication tool for informing the internal and external stakeholders of the results of collaborating with social cooperatives.

Keywords: Social cooperatives, school institutions, social balance sheet, accountability, the “Medaglie D’Oro” Comprehensive Institute

JEL: M14, I21, P13, D83

Introduction

Social reporting represents the final stage in the school evaluation cycle, through which educational institutions account to their communities for the outcomes achieved and the resources utilised [1]. This tool is used to communicate to all stakeholders the relationships schools can have with social cooperatives.

Many changes have interested the educational sector in the second half of the nineties. One of the most important changes is represented by a new form of culture that indicates the transformation from the bureaucratic model to an innovative managerial system, typical of the private sector. In Italy, this process is inspired by the reformist trend of the “*new public management*” that has characterised many countries of common law to promote economic development through higher levels of productivity and more efficiency in the public sector [2].

This process is also favoured by the awareness that the bureaucratic model is inadequate to meet the growing challenges of contemporary society, characterised by complexity and uncertainty. In the scholastic regulations, an innovative law has introduced school autonomy, which has given school institutions greater freedom of decision about education, organisation, and finance. The logical consequence of autonomy is represented by the need to report to the community the results obtained based on the choices, activities, and resources. In particular, public opinion is interested in how public institutions use the community’s resources. Public authorities’ activities must create public value and avoid waste and inefficiency [3]. In fact, during this period, school institutions received less funding from the government and other public institutions.

In this context of such complexity, schools need strong relationships with their internal and external stakeholders [4]. School institutions’ attention is oriented towards their territory to search for new funding and state funds. For this reason, accountability becomes a priority in school institutions’ management, which is realised through the report about all educational activities.

In the modernisation of the educational sector, great attention is paid to the systems of communication concerning transparency and information. Among these, social balance is the most important because it unifies the complex educational activities in a unique report.

The social report aims to make the information in various accounting documents comprehensible, encouraging stakeholder participation and control.

Social accountability in schools is a recent phenomenon. Social reporting became mandatory for schools following the enactment of Presidential Decree 28/03/2013 No. 80, entitled “*Regulation on the National Evaluation System in Education and Training*”.

The research analyses the role and the specific characteristics of social reports in the educational sector and the reasons driving school institutions to adopt them. Therefore, the work explores the differences in the document between the first and the second educational cycle. The

methodological model adopted is the cases studied [5]. The schools chosen are six: three for the first educational cycle and three for the second cycle [6].

They are the following:

Table 1. Cycle and schools

Cycle	Names of schools
The 1st cycle	1. Istituto Comprensivo “Mastri Caravaggini” di Caravaggio (Bg)
	2. II Circolo Didattico di Treviglio (Bg)
	3. Istituto Comprensivo di Vimodrone (Mi)
The 2nd cycle	4. Istituto d’Istruzione Superiore “G. Maironi da Ponte” Presezzo (Bg)
	5. Istituto Tecnico Statale “Enrico Fermi” di Mantova
	6. Liceo “Giambattista Brocchi” di Bassano del Grappa (Vi)

The research results show that the decisional reasons for adopting the social report have the common denominator to improve educational service quality.

The methodology adopted is the model contained in the Directive of the Public Function’s Ministry of February 17th 2006, and the 2005 framework developed for the public sector by the Study Group on Social Report.

Another point of the investigation shows that it is possible to identify a standard list of the document content: a) the identity of the school, b) the resources, articulated in human, material and financial resources, c) the results distinguished in outcomes and future impacts [7].

About the differences in reporting between the first and the second educational cycle, the results are the followings: a) the principal difference regards the age of the pupils, b) another distinction is represented by the local authority with competences in the educational area: the Municipality for the first cycle and the Province for the second cycle, c) the last difference concerns the analysis of future effects. While the first cycle social report does not contain this examination, the second cycle document analyses the future impacts of school activities, such as the results at universities and occupations in the work market.

The Social Report is an effective instrument of management [8]: its adoption produces numerous positive effects, such as the strategic management [9] of the educational resources, a higher sense of responsibility of the staff, a higher quality of the service, an improvement of the school image and reputation. The most important difficulty is represented by the systematisation of the information, due to a different division between the financial year and the scholastic year. The financial year that begins on January and ends on December, while the scholastic year begins on September and ends on August.

Another aspect of the survey is represented by the figure of the school manager, who plays a key role in promoting social reporting culture.

The operational instrument of social reporting is the social balance sheet [10], through which schools communicate to all stakeholders the numerous relationships they maintain, including those with social cooperatives. Cooperative enterprises can engage with schools in various ways, particularly through providing educational, welfare, or support services.

The principal activities carried out by cooperatives in schools include:

- 1) Service management: social cooperatives may manage services such as support for pupils with disabilities [11], school catering, transport, psychological counselling, after-school programmes, and summer centres;
- 2) Educational projects: They may also partner with schools in the implementation of specific educational initiatives, such as environmental sustainability, intercultural education, or the promotion of civic responsibility and legality.
- 3) Family support: Cooperatives may assist families of pupils with special educational needs, including educational consultancy, guidance services, and prevention of social hardship.
- 4) Work placement: A key objective for many social cooperatives is the work integration of students with disabilities or socio-economic disadvantages, often through internships or other collaborative arrangements with schools.

Thus, the social balance sheet also contains information on the activities undertaken by social cooperatives in collaboration with schools, detailing services provided, the number of pupils involved, as well as the outcomes achieved and the impact on the school community and broader local context.

In cases where the cooperatives have provided specialist assistance for pupils with disabilities, the social balance sheet reports the results achieved and the impact generated in terms of social inclusion and improved quality of life [12]. For instance, where a cooperative has managed the school catering service, the balance sheet will include data on the number of meals served, the origin of ingredients (organic food or locally sourced), meal quality, cost of service, and the service's influence on pupil well-being.

The involvement of social cooperatives in school life is often linked to the management of services and projects that have significant implications for the educational environment and the wider community. Therefore, the social balance sheet plays a critical role in assessing and reporting the effectiveness of these activities, ensuring transparency and stakeholder participation to improve public education services.

Results obtained and discussions

At the “Medaglie D’Oro” Comprehensive Institute in Salerno, during the 2024/2025 school year, six social cooperatives provided fourteen educational support assistants for eighteen pupils with severe disabilities across all school levels, namely nursery (early childhood), primary, and lower secondary.

A comparative methodology was adopted to assess the impact of the support assistants' work. This involved analysing the Individualised Educational Plans (IEPs) [13] drafted by the Operational Working Group at the start of the school year and comparing them with the Final Evaluations produced at the end of the year. This allowed the identification of changes over the reference period.

Analysis of initial and final IEPs confirmed that progress in various developmental domains was attributable not only to the presence of support teachers but, significantly, to the contribution of the specialist assistants. These professionals played a pivotal role in gradually mitigating dysfunctional behaviours, enabling more effective interventions across the identified dimensions

[14].

In the current school year 2024/2025, the students with disabilities are distributed across the various school levels as shown in the tables below:

Table 2. THE “MEDAGLIE D’ORO” COMPREHENSIVE INSTITUTE IN SALERNO – ITALY

Social Cooperatives – school year 2024/2025

N.	Social cooperatives	Specialist assistant	Pupil with disabilities classe/sezione	School levels
1	<i>Cooperativa Fili D’Erba</i>	<i>C. Alessia</i>	<i>Section. G - Leoni</i>	<i>Nursery</i>
2	<i>Cooperativa Giovamente</i>	<i>V. Jessica</i>	<i>Section C - Gattini</i>	<i>Nursery</i>
3	<i>Consorzio di cooperative Il Deltaplano</i>	<i>I. Giuseppina</i>	<i>Section A - Bruchetti</i>	<i>Nursery</i>
4	<i>Cooperativa Giovamente</i>	<i>G. Serena</i>	<i>Section B - Cagnolini</i>	<i>Nursery</i>
5	<i>Consorzio di cooperative Il Deltaplano</i>	<i>I. Giuseppina</i>	<i>Section E - Coccinelle</i>	<i>Nursery</i>
6	<i>Cooperativa Il Sorriso</i>	<i>D.F. Rosa</i>	<i>Section A - Aria</i>	<i>Nursery</i>
7	<i>Cooperativa Giovamente</i>	<i>C. Emanuela</i>	<i>Section C - Terra</i>	<i>Nursery</i>
8	<i>Consorzio di cooperative Il Deltaplano</i>	<i>I. Giuseppina</i>	<i>Section B - Acqua</i>	<i>Nursery</i>
9	<i>Cooperativa Progetto 2000</i>	<i>I. Daniela</i>	<i>Class 1 C</i>	<i>Primary school</i>
10	<i>Consorzio di cooperative Il Deltaplano</i>	<i>I. Giuseppina</i>	<i>Class 4 A</i>	<i>Primary school</i>
11	<i>Cooperativa Anffas Salerno</i>	<i>I. Maria</i>	<i>Class 4 E</i>	<i>Primary school</i>
12	<i>Cooperativa Anffas Salerno</i>	<i>M..C. Alessio</i>	<i>Class 4 D</i>	<i>Primary school</i>
13	<i>Consorzio di cooperative Il Deltaplano</i>	<i>O. Gabriella</i>	<i>Class 5 A</i>	<i>Primary school</i>
14	<i>Consorzio di cooperative Il Deltaplano</i>	<i>P. Annalisa</i>	<i>Class 5 A</i>	<i>Primary school</i>
15	<i>Consorzio di cooperative Il Deltaplano</i>	<i>B. Daniela</i>	<i>Class 3 A</i>	<i>Primary school</i>
16	<i>Consorzio di cooperative Il Deltaplano</i>	<i>B. Daniela</i>	<i>Class 5 B</i>	<i>Primary school</i>
17	<i>Cooperativa Anffas Salerno</i>	<i>R. Eleonora</i>	<i>Class 4 C</i>	<i>Primary school</i>
18	<i>Cooperativa Il Sorriso</i>	<i>D. M. Gianluca</i>	<i>Class 1 B</i>	<i>Lower secondary</i>

Conclusions

The 2024/2025 social balance sheet reveals that all pupils with severe disabilities who received support from educational assistants achieved the objectives outlined in their Individualised

Educational Plans. Improvements were evident across multiple dimensions, including relational and social interaction, communication and language, autonomy and orientation, and cognitive, neuropsychological, and learning domains. The positive results observed across various dimensions attest to the intervention's effectiveness, which is aligned with the biopsychosocial model developed in 2001 by the World Health Organisation [15].

The most noteworthy result of the work undertaken by social cooperatives lies in the enhanced processes of social inclusion and improved quality of life for pupils with disabilities. This was further corroborated by customer satisfaction questionnaires administered to families, who were asked to evaluate the perceived impact of cooperative services on their school experience.

Findings from these questionnaires revealed high satisfaction levels among pupils and their families regarding the support provided, which extended from school into the home. Pupils improved across all measured domains, positively impacting personal and family well-being.

The study highlights a deeper, often underappreciated dimension of schoolwork—one with significant social value that deserves to be rediscovered and brought to the fore. In this regard, the social balance sheet serves a vital function: it documents the social value generated by teaching and learning activities, contributing to local development. This process also involves other key actors, including social cooperatives, whose involvement raises the overall quality of educational provision.

In conclusion, the complex challenges of teaching and learning processes can be more effectively addressed through collaborative networks [16], particularly when schools synergise with third sector entities, such as cooperative enterprises.

Statistical reports confirm that inclusive outcomes are significantly enhanced when adequate professional support is in place [17].

References

1. PALETTA A., Scuole responsabili dei risultati – Accountability e bilancio sociale. Bologna: Società editrice Il Mulino, 2011.
2. BORGONOV E., Principi e sistemi aziendali per le amministrazioni pubbliche. Milano: Egea SpA, 2006.
3. PALETTA A., VIDONI D., Scuola e creazione di valore pubblico. Problemi di governance, accountability e management. Roma: Armando Editore, 2006.
4. PREVITALI D., La scuola con valore sociale, sussidiarietà e rendicontazione sociale nelle scuole dell'autonomia e delle indicazioni per il curriculum. Napoli: Tecnodid Editrice, 2007.
5. YIN R, K., Lo studio di caso nella ricerca scientifica, progetto e metodi. Roma: Armando Editore, 2005.
6. CORBETTA P., La ricerca sociale: metodologie e tecniche, III Le tecniche qualitative. Bologna: Società editrice Il Mulino
7. PALETTA A., BONAGLIA C., BORACCHI C., PECCOLO L., La scuola rende conto, Idee e strumenti per la costruzione del bilancio sociale. Milano: Pearson Bruno Mondadori Editore, 2011.
8. GRUPPO DI STUDIO SUL BILANCIO SOCIALE, Standard di base per il settore pubblico. La rendicontazione sociale nel settore pubblico. Milano: Giuffrè Editore, 2005.
9. FREEMAN R.E., Strategic management. A stakeholder approach. Boston: Pitman, 1984.
10. LOGOZZO M., PREVITALI D., STANCARONE M.T., Rendicontare a scuola, Dall'autonomia alla rendicontazione sociale. Napoli Tecnodid Editrice, 2022.
11. PAVONE, M. Educational inclusion: Pedagogical guidance for disability. Milano: Mondadori, 2014.
12. BOOTH T., AINSLOW M., The new Index for inclusion, Pathways for learning and participation in schools. Roma: Carocci Editore, 2014.
13. IANES, D., CRAMEROTTI, S., FOGAROLO, F. The New Individualised Education Plan (IEP) from a Bio-Psycho-Social and Ecological Perspective. Trento: Erickson, 2021.
14. VACCARO, D. Training pathways for severe disability for teachers and educators. Gaia Publishing – Periscopio, 2007.
15. WORLD HEALTH ORGANIZATION. International Classification of Functioning, Disability and Health (ICF). Ginevra: WHO, 2001.

16. PALETTA A., TIEGHI M., Il bilancio sociale su base territoriale, Dalla comunicazione istituzionale alla Public Governance. Milano: 2007.
17. ISTITUTO NAZIONALE DI STATISTICA (ISTAT). School inclusion of pupils with disabilities: Academic year 2020–2021. Available at: <https://www.istat.it/it/archivio/265364> (visited 18.05.2025).

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