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VISIBILITY AND TRANSFORMATION OF MOLDOVAN SCHOLARLY OUTPUT (2008–2024): A COMPARATIVE BIBLIOMETRIC STUDY

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Abstract. This comparative bibliometric study examines the visibility of scientific publications by authors from the Republic of Moldova between 2008 and 2024. Utilising three complementary data sources – Web of Science, Scopus, and the National Bibliometric Instrument – the analysis assesses temporal trends, document types, linguistic and disciplinary distributions, and the effects of accreditation and indexing policies on publication patterns. The results reveal a dual model of visibility: Web of Science and Scopus capture an internationalised segment dominated by English-language journal articles in the exact sciences and engineering, while the National Bibliometric Instrument reflects an exhaustive national corpus with a prominent role for conference proceedings, publications in Romanian and Russian, and strong representation of social sciences and humanities. Regulatory reforms and accreditation processes since 2013-2016 have contributed to editorial professionalisation and a typological shift in the National Bibliometric Instrument towards conference materials. The study highlights the limitations of single-source evaluations and argues for the integrated use of international and national bibliometric infrastructures to achieve a balanced assessment of research performance. Implications for policy, editorial practices, and future research, including cohort citation analyses and the role of persistent identifiers, are discussed.

Keywords: *research visibility, bibliometrics, Republic of Moldova, Web of Science, Scopus, National Bibliometric Instrument.*

Rezumat. Acest studiu bibliometric comparativ examinează vizibilitatea publicațiilor științifice ale autorilor din Republica Moldova între 2008 și 2024. Utilizând trei surse de date complementare – Web of Science, Scopus și Instrumentul Bibliometric Național – analiza evaluează tendințele temporale, tipurile de documente, distribuțiile lingvistice și disciplinare, precum și efectele politicilor de acreditare și indexare asupra modelelor de publicare.

Rezultatele relevă un model dual de vizibilitate: Web of Science și Scopus surprind un segment internaționalizat dominat de articole din reviste în limba engleză din domeniul științelor exacte și ingineriei, în timp ce Instrumentul Bibliometric Național reflectă un corpus național exhaustiv, cu un rol important pentru lucrările conferințelor, publicațiile în limba română și rusă și o reprezentare puternică a științelor sociale și umaniste. Reformele de reglementare și procesele de acreditare din perioada 2013-2016 au contribuit la profesionalizarea editorială și la o schimbare tipologică a Instrumentului Bibliometric Național către materialele conferințelor. Studiul evidențiază limitele evaluărilor dintr-o singură sursă și pledează pentru utilizarea integrată a infrastructurilor bibliometrice internaționale și naționale pentru a realiza o evaluare echilibrată a performanței cercetării. Sunt discutate implicațiile pentru politici, practici editoriale și cercetări viitoare, inclusiv analize de citări de cohortă și rolul identificatorilor persistenți.

Cuvinte cheie: *vizibilitate a cercetării, bibliometrie, Republica Moldova, Web of Science, Scopus, Instrumentul Bibliometric Național.*

1. Introduction

The visibility of scientific publications is a central aspect of contemporary academic performance, closely linked to processes of evaluation, funding, and the internationalisation of research. In the context of the expansion of bibliometric infrastructures and the use of citation indicators in institutional rankings and science policy decisions, visibility is no longer merely a consequence of disseminating results but has become a key criterion for assessing the relevance and impact of research [1, 2]. The literature also emphasises that visibility is a construct dependent on indexing infrastructures, database selection criteria, and the publication strategies adopted by authors and institutions [3, 4].

For small or emerging scientific systems, such as that of the Republic of Moldova, the issue of visibility assumes particular importance. Integration into selective international databases, such as Web of Science (WoS) and Scopus, is associated with external recognition and global competitiveness; however, these infrastructures may represent only a portion of the national scientific output, especially in the exact sciences and engineering. Concurrently, national recording tools, such as the National Bibliometric Instrument (IBN – https://ibn.idsi.md/), aim to capture the production comprehensively, including publications in Romanian and works from the social and human sciences, which are often under-represented in international databases.

Over the past decade, the national research system of the Republic of Moldova has undergone significant institutional changes, characterised by the revision of regulations concerning the evaluation and classification of scientific journals, as well as the regulation of the recognition of scientific events. These changes have influenced publishing behaviour and the structure of scientific output, thereby creating conditions conducive to a reconfiguration of visibility patterns. In this context, a comparative analysis that transcends evaluations based on a single data source and integrates perspectives offered by various bibliometric infrastructures is necessary.

The aim of the present study is to compare the visibility of scientific publications by authors from the Republic of Moldova over the period 2008-2024, using three complementary sources: WoS, Scopus, and the IBN. The study seeks to identify structural differences in terms of volume, document typology, disciplinary and linguistic distribution of publications, as well as the impact of the regulatory framework on the dynamics of indexed output.

Accordingly, the research is guided by the following questions:

1) What are the structural differences between the visibility reflected in international databases and that captured by national infrastructure?
2) To what extent have changes in the regulations governing journals and scientific events influenced publishing patterns and the typological distribution of documents?
3) How is visibility distributed across scientific fields and publication languages, depending on the database used?
4) To what extent does the integrated use of sources facilitate a more balanced assessment of national scientific performance?

By adopting a comparative approach, this study contributes to clarifying the relationship between indexing infrastructures and the configuration of scientific visibility, providing an empirical basis for interpreting the research performance of the Republic of Moldova in relation to the dynamics of internationalisation and the specificities of the national context.

2. Literature Review

The visibility of scientific publications has become a bridging concept linking the dynamics of academic communication, institutional research policies, and the digital infrastructures that facilitate the circulation of knowledge. Contemporary approaches often associate visibility with the notion of impact, particularly when discussions concern journals evaluated by citation indicators such as the impact factor, which function as reputational signals within the editorial ecosystem [5]. The literature also emphasises that visibility cannot be reduced to a single indicator; rather, it encompasses a set of processes through which research findings become accessible, discoverable, recognised, and utilised both within the scientific community and in broader contexts of reception. This multifaceted understanding provides the necessary framework for comparative bibliometric studies that employ multiple sources – such as WoS, Scopus, and national tools – because differences in coverage, selection criteria, and indicator calculation methods substantially influence what is measured as "visible" [3, 4, 6].

Conceptual delimitations proposed in both classical and recent literature indicate that visibility has been analysed as a product of the social structure of science as well as an outcome of dissemination infrastructures. Within the sociology of science tradition, Stephen Cole and Jonathan R. Cole [1] discuss visibility as "awareness" constructed through mechanisms of scientific communication, arguing that it is influenced by research quality – reflected in citations – honorary distinctions, departmental prestige, and specialisation. According to the authors' interpretation, other factors, such as output volume or name position in collective works, do not have an independent effect. In parallel, bibliometrics and digital communication studies offer operational definitions linking visibility to accessibility and integration into indexing and citation circuits. De Looze [7] notes that peer-reviewed publications included in reference databases are perceived as high quality, suggesting that visibility also depends on institutional validation mechanisms. Similarly, Miguel et al. [8] demonstrate that visibility is determined both by the quality of work and its accessibility, emphasising the role of open access and indexing in relevant databases in facilitating international citation and readership.

In the open-access literature, visibility is discussed with reference to dissemination routes and their effects on citation. Miguel et al. [8] report differences between Gold Open

Access and Green Open Access: self-archiving (Green OA) is generally associated with a higher citation count per article than direct publication in open-access journals (Gold OA). However, Gold OA does not consistently yield similar citation gains. The authors caution that open access alone does not fully explain visibility, as journal prestige and the intrinsic quality of articles significantly influence recognition. Thus, OA is presented more as an amplification mechanism than as a substitute for quality [8]. Longitudinal analyses of the effects of journal choice show that Gold OA journals have experienced substantial growth in publication share without a proportional increase in citations or representation among the most-cited articles, suggesting that full open access does not automatically confer a competitive citation advantage [9]. This nuance is important for comparative evaluations based on WoS, Scopus, and national tools, since editorial policies and access levels vary, and coverage differences can produce divergent effects on indicators.

An extension of this conceptualisation appears in works that shift the emphasis from mere publication to active promotion strategies and the management of digital identity. Portuguez Castro et al. [10] argue that visibility presupposes the use of digital media, academic networks, and standardised profiles to enhance the impact of works, treating visibility as a prerequisite for integrating results into social, economic, or institutional use circuits. Similarly, Rodríguez Camacaro [11] shows that research outcomes may remain little known if confined to local repositories and not disseminated via open channels and collaborative platforms that facilitate knowledge circulation. In this context, visibility acquires a clear institutional dimension, being associated with universities' positioning and legitimacy, accreditation processes, stakeholder trust, and academic rankings that use bibliometric indicators – especially citations – as measures of research influence [11]. The relationship between visibility and internationalisation is described as circular: internationalisation contributes to increased visibility, which in turn supports internationalisation processes and consolidates institutional reputation [11].

Recent literature also emphasises the distinction between academic visibility and public visibility. Ou et al. [12] differentiate academic impact, measured by citations, from societal visibility, measured by altmetric scores, suggesting that visibility is a composite indicator capturing reception beyond specialised literature. In analyses of research funding, the authors highlight a paradox: studies funded primarily by governmental agencies typically exhibit high academic impact but lower societal visibility, whereas industry funding is associated with greater public exposure owing to its applied orientation and relevance to practical problems [12]. Although "visibility" is often operationalised through quantifiable indicators, these contributions support the idea that types of visibility depend on distinct production and dissemination mechanisms, which justifies using different metrics and databases when comparing national publication profiles [12]. The proposed "alt-index" demonstrates the possibility of quantifying social visibility via digital mentions; the authors identify positive correlations between this index and the h-index, suggesting that online visibility can complement, without replacing, traditional academic impact [13].

Complementarily, [14] conceptualises visibility in science communication as a multifaceted phenomenon applicable to both knowledge and researchers, structuring it into availability, approval, and accessibility. Metag demonstrates that visibility implies not only the existence of content but also permission to share it and the audience's capacity to access and understand it. This framework helps explain why indexing or open access may produce different effects: they can increase availability and accessibility but remain conditioned by

approval mechanisms and the channels through which content becomes visible and discoverable to diverse communities [14]. Similarly, [15] observe that some authors reduce visibility to internet accessibility and indexing, while others link it to journal recognition through the capacity to meet an academic community's informational needs; they reaffirm the major roles of online presence and database inclusion in journal visibility. [16] develop this view further by identifying factors such as the publishing entity, editorial-board representativeness, geographic diversity of authors, electronic publication, publication languages, number of databases indexing the journal, downloads and readings, citations, and impact factor, thereby outlining an ecology of visibility in which editorial infrastructure and indexing policies become explanatory variables.

A consistent strand of literature analyses the factors influencing visibility, viewing it as the product of interactions among researchers' individual practices, institutional support, and technological infrastructures. Cojocaru and Cojocaru [17] describe research visibility as an integrative characteristic reflecting dissemination, accessibility, recognition, and impact, emphasising the importance of social networks and academic platforms in accelerating dissemination and broadening reach. Similarly, Fachin et al. [18] demonstrate that altmetric indicators, derived from online activity, can complement traditional bibliometrics by offering a more nuanced picture of publication circulation and reception, emphasising the role of platforms such as Mendeley and Twitter (now X) in increasing contact points between researchers and their professional audiences. From this perspective, visibility is not solely a consequence of indexing but also of communication and distribution behaviours that can accelerate attention and, under certain conditions, support academic recognition.

In the realm of strategies, the literature emphasises digital identity and the standardisation of author signatures as mechanisms that facilitate discoverability and accurate attribution. González-Fernández-Villavicencio [19] defines visibility as the potential for research outputs to be accessible, identifiable, and recognised, emphasising that consistent author signatures are a crucial factor, as variations in name or affiliation reduce retrieval in databases and compromise bibliometric accuracy. This perspective aligns with the definition of digital identity by Fernández-Marcial and González-Solar [20], who describe it as the result of a deliberate effort to be identified and recognised online through standardisation, the use of identifiers, and dissemination across diverse networks and platforms. Recent empirical analyses indicate that associating publications with an ORCID identifier correlates with significant increases in usage and citations, suggesting that persistent identifiers enhance retrieval and visibility in international databases [21]. Basantes-Andrade et al. [22] conceptualise visibility as web presence expressed through recognition, positioning, and citations, arguing that digital technologies, the conversion of journals to electronic formats, and open-access publishing can boost citations and audience reach when integrated into proactive identity and dissemination management. Consistently, Zimba and Mueller [23] situate visibility at the level of researcher exposure within the academic community, suggesting that the accessibility of ideas and works consolidates professional presence, even if exposure is not, by definition, equivalent to quality evaluation.

From a structural perspective, studies on the geographic distribution and domain specialisation of scientific output indicate that visibility is unevenly distributed and influenced both by the presence of a critical mass of researchers and by orientation towards high-citation disciplines. Milard and Grossetti [24], analysing the regional development of scientific production and visibility in France, argue that the number of citations associated

with a locality is largely explained by production volume, which depends on the number of researchers, and that a second significant factor is specialisation in disciplines that generate many citations internationally. This conclusion reinforces the idea that, in bibliometric comparisons, a scientific community's visibility profile is shaped by both quantity and thematic orientation, and that differences between databases can accentuate or obscure these effects depending on which disciplines are better represented.

The role of indexing in databases is regarded in the literature as a structural dimension of visibility, as indexing facilitates discoverability, validation, and the ability to measure impact through standardised indicators. Chávez-Martínez and Nez-Hernández [25] emphasise that indexing – via metadata standardisation and integration into search infrastructures – enables the identification, evaluation, and large-scale reuse of results, thereby influencing the visibility of works and institutional profiles. Indexing also supports integration into search engines such as Google Scholar and digital libraries, broadening access points to a work and enhancing exposure [26]. From a bibliometric evaluation perspective, selective databases provide the infrastructure necessary for calculating indicators used in research and career assessment. This infrastructure can generate network effects, whereby increased visibility promotes citation accumulation and consolidates academic reputation [4, 27, 28]. Empirical data on citation trends following a journal's inclusion in international databases demonstrate that indexing can significantly influence a publication's citation levels and dynamics [29].

However, the literature cautions that indexing effects depend on the selection philosophy and database coverage, and that differences among WoS, Scopus, and more inclusive sources influence bibliometric conclusions. Stahlschmidt and Stephen [30], together with Singh et al. [31], discuss coverage differences between databases, while Mongeon and Paul-Hus [3] highlight discipline- and language-related limitations with consequences for comparative assessments and for local fields, especially in the social sciences and humanities. The concept of "relative visibility" demonstrates that the proportion of an author's publications indexed in a given service can be significantly smaller than their total output, indicating that the bibliometric representation of visibility depends directly on the source used [32]. Martín-Martín et al. [2] and Rossoni and Rosa [33] link selective databases to the Matthew effect, whereby already visible journals tend to become more cited, thereby amplifying inequalities, while inclusive databases can reduce asymmetries and broaden visibility to different regions. From this perspective, the recommendation to triangulate – using multiple databases to obtain a more balanced picture of visibility – becomes methodologically justified in comparative studies [4, 6, 34]. At the same time, the literature highlights ethical risks associated with the pressure to be indexed, including metric-driven behaviours and potential editorial misconduct, suggesting that the objective of indexing must be balanced with rigorous evaluation and transparency in editorial practices [35].

Overall, the literature indicates that scientific visibility cannot be reduced to a single indicator or dimension of academic performance; rather, it should be understood as the outcome of a combination of interdependent factors acting simultaneously at individual, institutional, and systemic levels. Visibility is shaped by research performance and profile, as well as by the editorial environment, indexing infrastructures, dissemination practices, and the context in which knowledge circulates. Within this framework, differences among databases, their selection criteria, and the methods by which they aggregate and present indicators significantly affect the representation of scientific output.

Therefore, assessing visibility requires a comparative and integrated approach that considers multiple sources and analyses results in relation to the specific characteristics of each information infrastructure. Such a perspective enables the identification of genuine differences in exposure and recognition of publications, as well as an understanding of the mechanisms through which they gain relevance in the academic sphere and, in some cases, the public domain. This approach provides the methodological foundation for the comparative investigation of the visibility of publications by authors from the Republic of Moldova in WoS, Scopus, and IBN.

3. Materials and Methods

The research methodology was designed to facilitate a rigorous comparative analysis of the visibility of scientific publications by authors from the Republic of Moldova through the utilisation of complementary data sources. The analysis drew on information extracted from three bibliometric databases – WoS, Scopus, and IBN – each offering distinct perspectives on national scientific output and its integration into the international knowledge network. Additionally, data on scientific events and collected works registered by the National Book Chamber of the Republic of Moldova (CNCRM) were incorporated.

Data from WoS and Scopus were collected on 3 November 2025, and information from IBN was extracted on 7 November 2025. For the analysis of publications associated with the editorial activities of conferences and symposia, the sources "Cronica Cărții" (Book Annals) [36] and "Cărți în curs de apariție" (Books-in-print) [37], managed by CNCRM, were consulted. These resources enabled the identification of volumes of scholarly works, conference proceedings, and academic events relevant to the assessment of national scientific output.

The study period was from 2008 to 2024, selected to capture both long-term publishing trends and the impact of institutional regulations on publishing behaviour. Particular attention was given to changes resulting from the Regulation on the Evaluation, Classification and Monitoring of Scientific Journals and the Regulation on the Recognition, Classification and Recording of Scientific Events, initially adopted by the National Council for Attestation and Accreditation (CNAA) and subsequently by the National Agency for Quality Assurance in Education and Research (ANACEC). These regulations influenced editorial standards and publishing strategies, factors incorporated into the interpretation of the results.

The units of analysis were scientific journals and scientific events. For each data source, variables relevant to characterising scientific output were extracted, including the total number of publications, annual distribution, scientific fields, document types (articles, conference papers, monographs), and language of publication. These indicators enabled a comparative assessment of the visibility of researchers from the Republic of Moldova in national and international indexing systems.

Data processing was conducted using descriptive and comparative methods, with the aim of identifying major trends and structural differences between the analysed databases. The results were synthesised in tables and graphical representations to highlight temporal dynamics, thematic distribution, and typological variations in publications. The analysis addressed both quantitative changes, such as increases or decreases in publication volume, and structural transformations, including a shift towards internationally indexed journals and the consolidation of participation in recognised scientific conferences.

Thus, the adopted methodology sought to reveal the relationship between national scientific output and its international visibility. The integrated analysis of the three databases, supplemented by information from national editorial records, provides a comprehensive perspective on the evolution of the Republic of Moldova's scholarly publishing system and allows for the interpretation of results both in quantitative terms and in relation to the institutional and regulatory framework that has shaped this evolution.

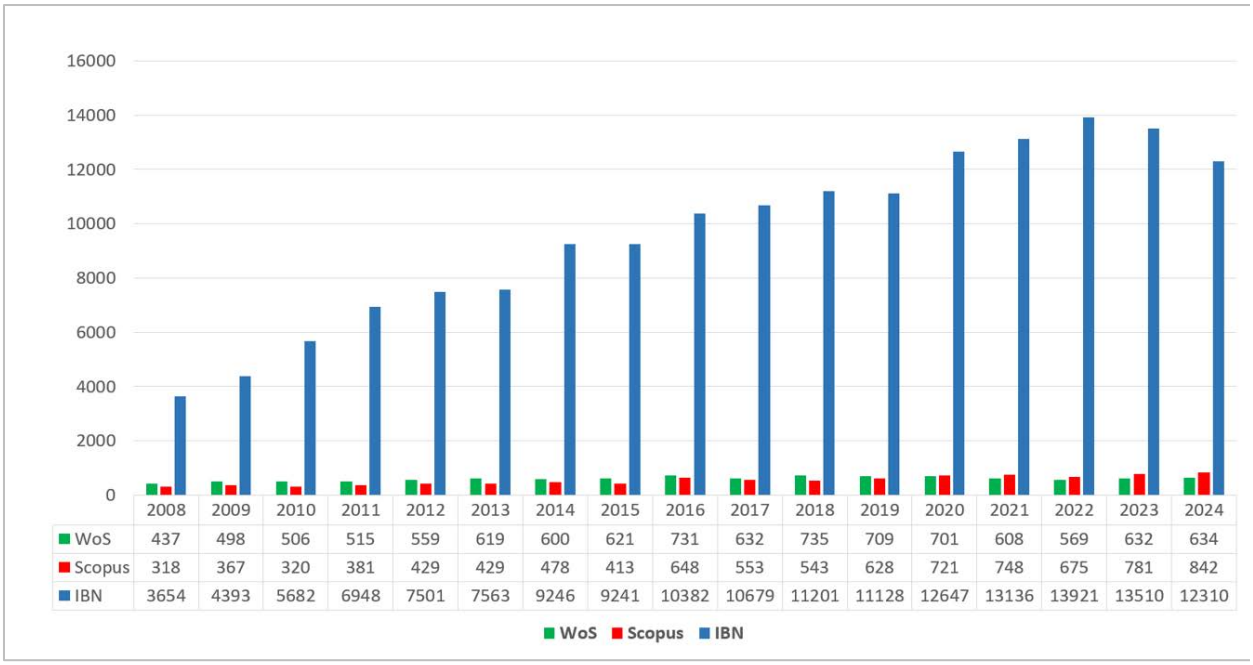
4. Results

4.1. Dynamics of Scientific Publications by Authors from the Republic of Moldova (2008-2024)

Analysing the evolution in the number of scientific publications is a relevant indicator for assessing the dynamics of national research visibility and its level of integration into international indexing infrastructures.

The data summarised in Figure 1 illustrate the annual evolution of publications by authors from the Republic of Moldova indexed in WoS, Scopus, and IBN from 2008 to 2024. A comparison of the three sources highlights both a general upward trend and structural differences resulting from the selection policies and coverage of the databases.

Between 2008 and 2012, the international presence of publications from the Republic of Moldova was relatively modest. According to the data presented in Figure 2, only four journals were indexed in the WoS and one in Scopus, which limited the international exposure of research findings. At this stage, the national publishing system was predominantly oriented towards internal dissemination, with evaluation and peer-review standards still in the process of consolidation. The development of IBN contributed to structuring an internal monitoring framework; however, integration into global citation networks remained limited.



	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
WoS	437	498	506	515	559	619	600	621	731	632	735	709	701	608	569	632	634
Scopus	318	367	320	381	429	429	478	413	648	553	543	628	721	748	675	781	842
IBN	3654	4393	5682	6948	7501	7563	9246	9241	10382	10679	11201	11128	12647	13136	13921	13510	12310

Figure 1. Dynamics of publication indexing by authors from the Republic of Moldova in WoS, Scopus, and IBN databases (2008-2024).

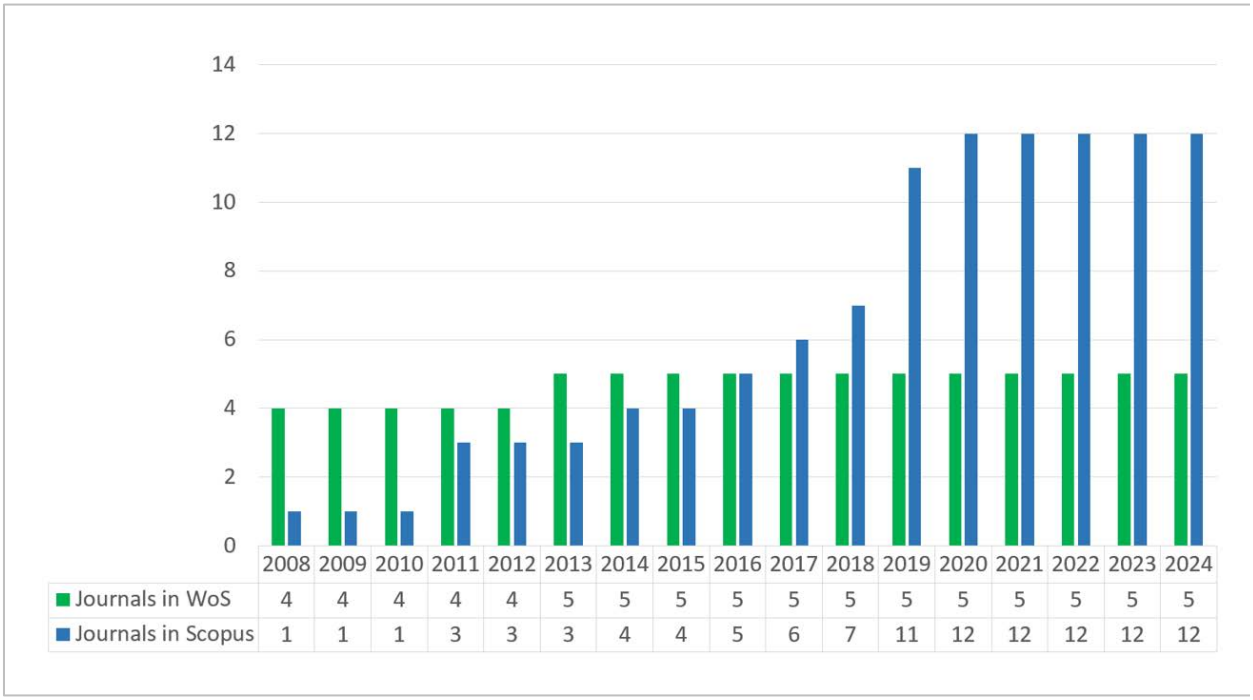
The period from 2013 to 2015 marks the beginning of significant institutional restructuring, driven by the implementation of the CNAA Regulation on the evaluation and

classification of scientific journals. The introduction of formal peer-review criteria, journal classification, and an emphasis on editorial transparency led to a gradual increase in the number of journals eligible for international indexing. Scopus data reveal a steady expansion in the presence of Moldovan journals, signalling progressive adaptation to the quality standards required by global databases.

The transformation became more pronounced between 2016 and 2019, coinciding with the adoption of a new regulatory framework by ANACEC. Requirements concerning publication ethics, the use of internationally recognised languages, and indexing in established databases led to a marked increase in the number of journals indexed in Scopus, while the number indexed in WoS remained relatively stable. This development reflects the consolidation of editorial infrastructure and a strategic focus on internationalisation.

Between 2020 and 2024, digitalisation and harmonisation with international practices intensified through the implementation of DOI identifiers and the adoption of electronic editorial management systems. The stabilisation in the number of indexed journals suggests that an institutional level of maturity has been reached, with the focus shifting from numerical growth to maintaining standards and enhancing editorial quality.

Overall, the dynamics illustrated in Figure 1 reveal an upward trajectory in scholarly output and a gradual integration into international databases. The increase in the number of indexed publications, alongside the consolidation of the presence of journals from the Republic of Moldova in WoS and Scopus, indicates that the international visibility of Moldovan research is the result of a gradual process of normative alignment, editorial professionalisation, and adaptation to global standards of scholarly communication.



	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
Journals in WoS	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	5	5
Journals in Scopus	1	1	1	3	3	3	4	4	5	6	7	11	12	12	12	12	12

Figure 2. Dynamics of journal indexing from the Republic of Moldova in WoS and Scopus (2008-2024).

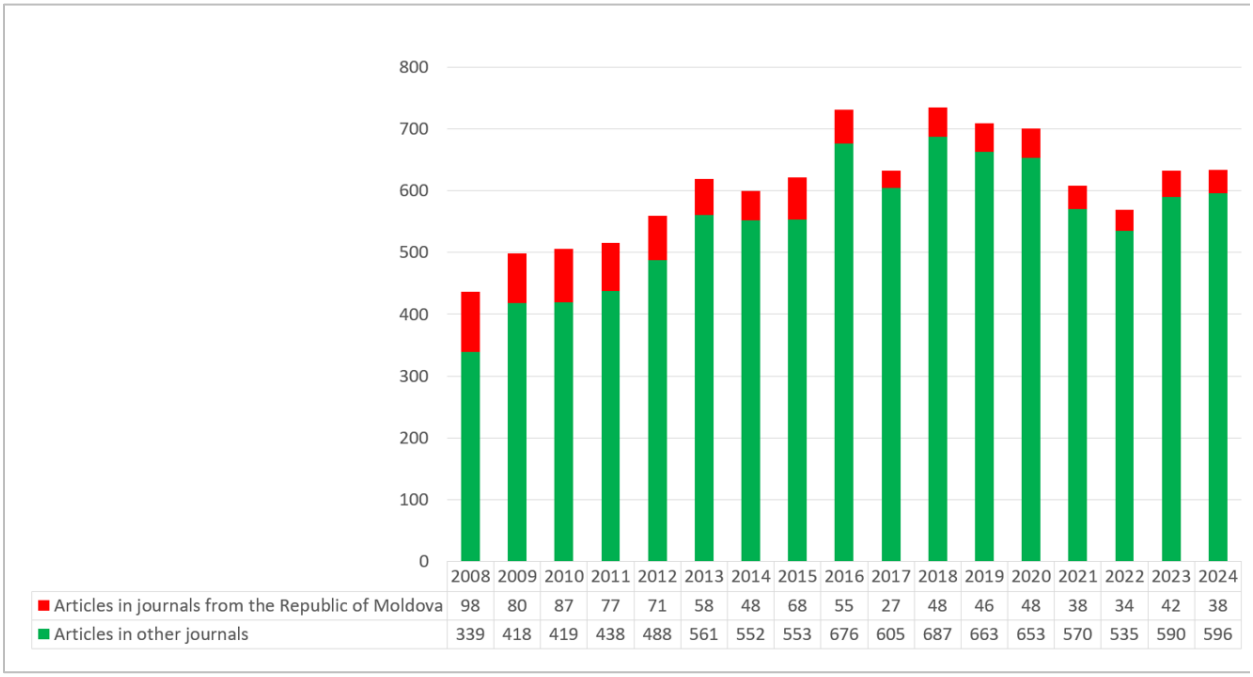
4.2. Impact of Indexing Moldovan Journals in Web of Science and Scopus on the Structure and Volume of Scientific Output

The dynamics of the number of journals indexed in WoS and Scopus, as shown in Figure 2, indicate two distinct trajectories. For WoS, the number of journals stabilises at five titles from 2013 and remains constant until 2024. This stability suggests the existence of a narrow core of publications that have met the selection thresholds and maintained them over the long term. The absence of quantitative growth points to a rigorous selection framework and a high entry barrier, which are characteristic of this database.

In contrast, Scopus records a steady increase in the number of Moldovan journals indexed, rising from a single title at the start of the analysed period to twelve journals after 2020. This expansion is more pronounced after 2016, coinciding with the implementation of new regulations on journal evaluation and classification. This development reflects an enhanced capacity of editorial teams to meet the technical and ethical requirements for indexing, as well as a more flexible inclusion policy compared with WoS.

To evaluate the tangible impact of indexing on scientific output, it is necessary to analyse the structure of articles published in national compared to international journals.

Data in Figure 3 show that, in WoS, articles published in journals outside the Republic of Moldova constitute the dominant segment throughout the entire analysed period. Their number rises steadily between 2008 and 2016, exceeding approximately 650-680 articles annually during 2016-2018. Subsequently, a slight reduction is observed, followed by stabilisation in recent years. This trend suggests a consolidated integration of Moldovan researchers into international publication networks.



	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
Articles in journals from the Republic of Moldova	98	80	87	77	71	58	48	68	55	27	48	46	48	38	34	42	38
Articles in other journals	339	418	419	438	488	561	552	553	676	605	687	663	653	570	535	590	596

Figure 3. Dynamics of article indexing by authors from the Republic of Moldova in Web of Science (2008-2024).

The contribution of national journals indexed in WoS is smaller in volume. In the early years, they published approximately 77 to 98 articles annually; however, after 2013-2014, a decline was observed, followed by stabilisation at around 27 to 55 articles per year. Given the constant number of indexed titles, these variations can be explained by editorial

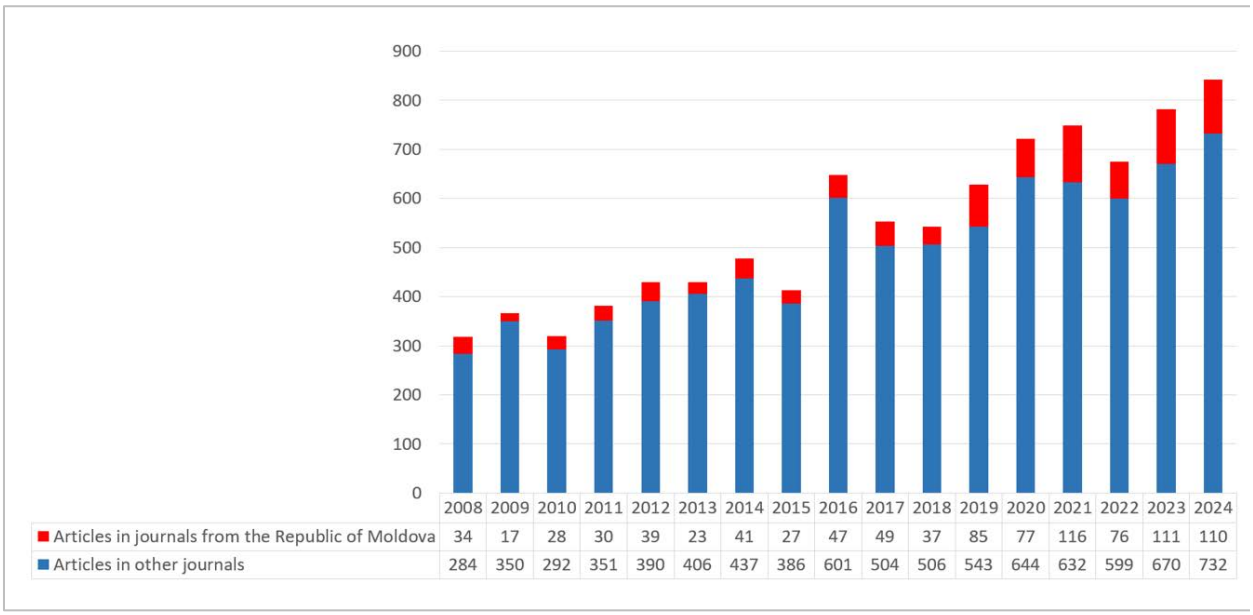
adjustments and increased selectivity. The ratio between the two segments indicates that national journals indexed in WoS function as a complementary channel without altering the dominant production structure, which remains oriented towards established international journals.

The situation in Scopus, as illustrated in Figure 4, demonstrates a more pronounced dynamic. The number of articles published in journals outside the Republic of Moldova has increased almost continuously, from fewer than 300 at the start of the period to over 700 in 2024, with a notable surge around 2016. The growth rate in Scopus is more pronounced than in WoS, indicating an expansion of collaboration networks and a rapid adaptation to indexing requirements.

In parallel, the contribution of Moldovan journals indexed in Scopus has evolved significantly. While in the early years this segment remained below 40 articles annually, a steady increase has been observed since 2015, with values frequently exceeding 70 to 100 articles per year after 2019. This increase coincides with the expansion in the number of indexed journals, indicating a direct effect of the editorial infrastructure on the volume of internationally recognised articles.

Comparatively, the proportion of articles published in indexed national journals is more prominent in Scopus than in WoS. This difference can be attributed to the selection criteria and Scopus's greater openness to emerging journals, which has facilitated the faster integration of Moldovan publications. In WoS, the production structure remains dominated by external international journals, and the indexing of local journals has not resulted in significant structural changes.

Cumulative analysis indicates that the inclusion of Moldovan journals in international databases has a varied effect. In WoS, the impact is primarily qualitative and symbolic, consolidating a small core of stable journals. In Scopus, the effect is also quantitative, evidenced by a noticeable increase in the volume of articles indexed in national journals.



	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
Articles in journals from the Republic of Moldova	34	17	28	30	39	23	41	27	47	49	37	85	77	116	76	111	110
Articles in other journals	284	350	292	351	390	406	437	386	601	504	506	543	644	632	599	670	732

Figure 4. Dynamics of article indexing by authors from the Republic of Moldova in Scopus (2008-2024).

Overall, the data show that indexing local journals in WoS or Scopus does not replace publication in established international journals but rather expands internationally

recognised dissemination options. The total increase in indexed output is driven mainly by intensified publishing in journals outside the Republic of Moldova, while the expansion of indexed national journals contributes to diversifying channels and strengthening editorial infrastructure.

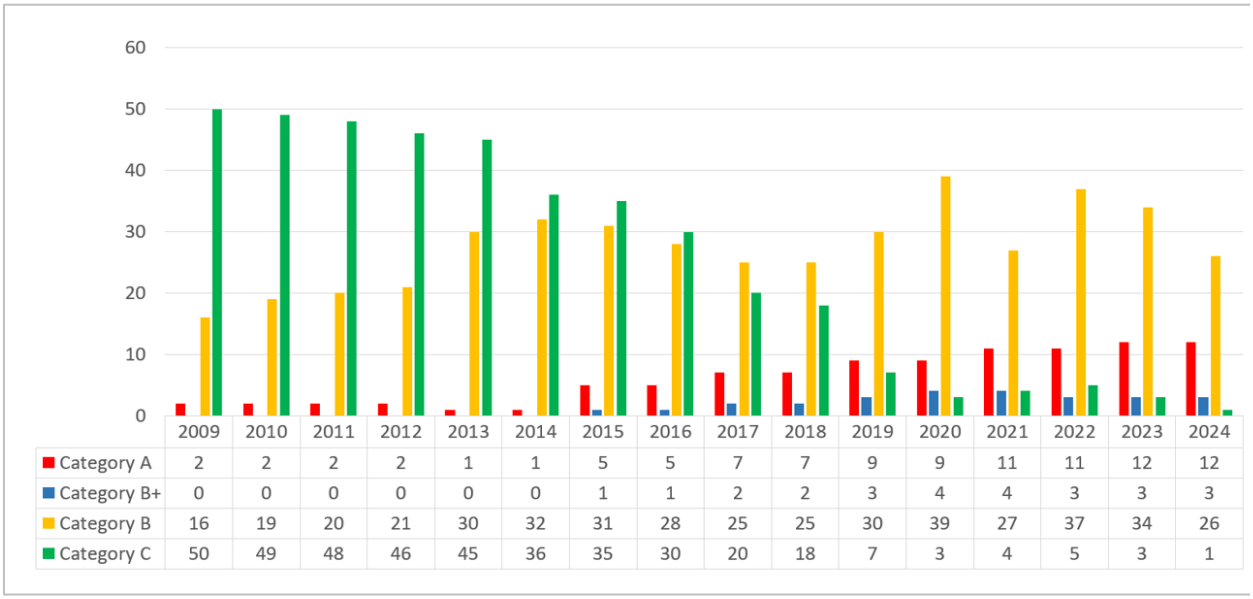
Therefore, the inclusion of Moldovan journals in WoS and Scopus serves both as an indicator of editorial quality and as a mechanism for enhancing international visibility, with more pronounced effects in Scopus, where the dynamics are stronger at both the level of journal titles and indexed articles.

4.3. Dynamics of Accreditation and the Hierarchical Restructuring of Scientific Journals in the Republic of Moldova (2009-2024)

The evolution of accredited scientific journals in the Republic of Moldova between 2009 and 2024 offers a pertinent indicator of how the regulatory framework has influenced the structure and performance of the national publishing system. The accreditation process, formally established by the Regulation on the Evaluation and Classification of Scientific Journals, approved in 2008 and implemented from 2009, introduced unified evaluation and classification criteria for the first time, defining standards concerning periodicity, editorial board composition, peer-review procedures, and formal compliance of publications.

One hundred and one scientific journals were accredited during the analysed period. Their dynamics, illustrated in Figure 5, reveal a significant structural transformation reflected in the distribution across categories (A, B+, B, and C). The evolution does not indicate a linear increase in the total number of journals but rather a gradual reconfiguration of the internal hierarchy.

In the initial stage (2009-2013), category C held a dominant share, representing more than half of the accredited journals each year. This distribution is characteristic of a phase of institutionalisation during which the primary objective was the formal integration of existing publications into a unified evaluation framework. Higher categories (A and B+) had marginal representation, indicating a limited level of compliance with advanced editorial standards and reduced integration into international publication flows.



	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
Category A	2	2	2	2	1	1	5	5	7	7	9	9	11	11	12	12
Category B+	0	0	0	0	0	0	1	1	2	2	3	4	4	3	3	3
Category B	16	19	20	21	30	32	31	28	25	25	30	39	27	37	34	26
Category C	50	49	48	46	45	36	35	30	20	18	7	3	4	5	3	1

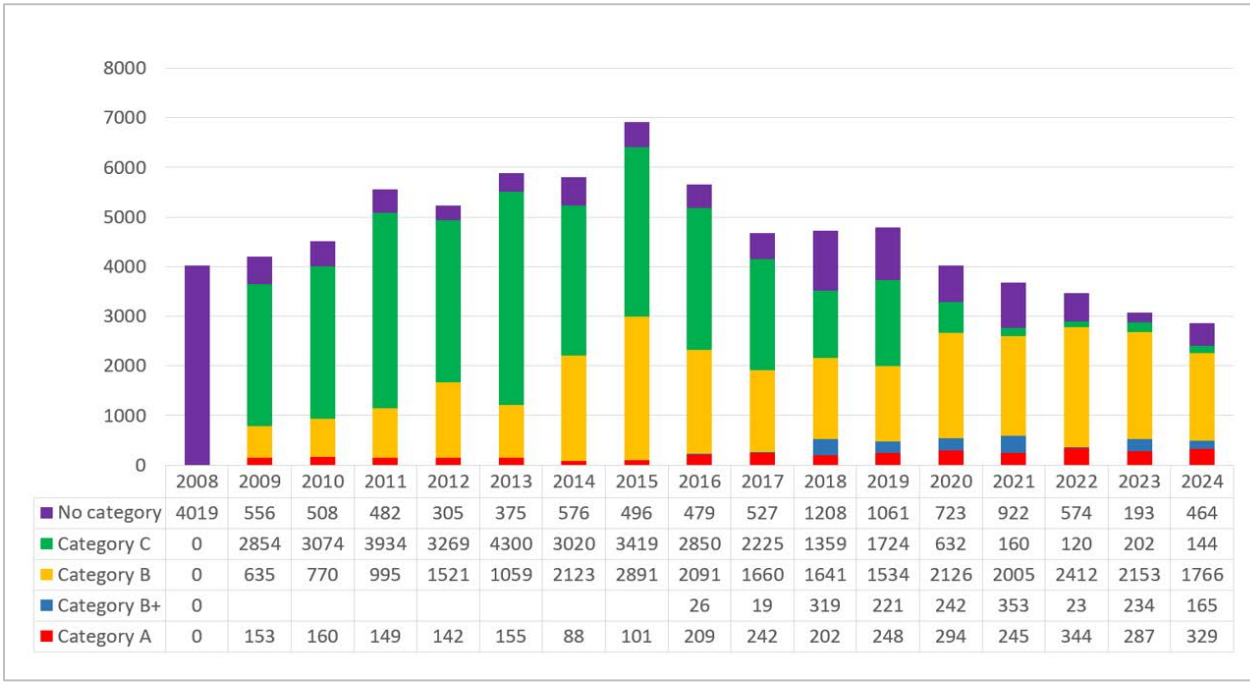
Figure 5. Dynamics of journal accreditation in the Republic of Moldova (2009-2024).

From 2014 to 2015, the category structure began to change noticeably. Revisions to the regulations and the consolidation of requirements concerning scientific peer review, editorial process transparency, and evidence of international dissemination led to a gradual reduction in category C. Simultaneously, the proportion of B-category journals increased, and category A began to exhibit a more stable presence. This evolution suggests a shift from a predominantly formal model towards one focused on editorial performance.

The period from 2017 to 2020 marks an acceleration in the reclassification process. The significant reduction in category C was accompanied by the consolidation of category B and a more consistent emergence of category B+. This reconfiguration reflects a stricter application of evaluation criteria and the removal from the system of journals that did not demonstrate the capacity to adapt to the new requirements. The dynamics indicate an institutional filtering process rather than numerical expansion.

Between 2021 and 2024, the hierarchical structure stabilises. Category B becomes dominant, while Category A reaches 12 journals in 2023-2024, indicating the consolidation of a small segment of publications with superior editorial performance. Category C is reduced to minimal levels, confirming its transitional role. This evolution aligns with recent regulatory directives that explicitly condition journal recognition on the use of the national information infrastructure (IBN), the application of international editorial standards, and the demonstration of scientific impact.

The analysis of the structure of articles indexed in IBN, as presented in Figure 6, complements this perspective. In the early years of the analysed period, a significant volume of articles was associated with journals lacking categorisation, reflecting the initial stage of classification and the absence of systematic control over editorial performance. Following the systematic application of evaluation mechanisms, the proportion of uncategorised articles progressively declined, indicating the integration of journals into the formal accreditation system.



	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
No category	4019	556	508	482	305	375	576	496	479	527	1208	1061	723	922	574	193	464
Category C	0	2854	3074	3934	3269	4300	3020	3419	2850	2225	1359	1724	632	160	120	202	144
Category B	0	635	770	995	1521	1059	2123	2891	2091	1660	1641	1534	2126	2005	2412	2153	1766
Category B+	0								26	19	319	221	242	353	23	234	165
Category A	0	153	160	149	142	155	88	101	209	242	202	248	294	245	344	287	329

Figure 6. Evolution of the indexing of articles from accredited journals in the Republic of Moldova (2008-2024).

Category C initially dominates the structure of indexed articles, maintaining high values until around 2015. Subsequently, a steady decline in this segment is observed, concurrent with an increase in articles published in category B journals. After 2015, category B becomes the predominant segment of articles indexed in the IBN, reflecting the consolidation of a core group of journals with stable editorial performance.

Category B+ has a small numerical share, but its consistent presence indicates the emergence of an intermediate segment with performance superior to that of category B, albeit limited in volume. Category A, while representing the smallest segment by number of articles, has recorded gradual growth since 2016, confirming the consolidation of a select group of journals with advanced editorial standards.

From a structural perspective, the data suggest a transition from a volume-oriented system to one focused on quality. The reduction in uncategorised articles and those in category C, alongside the increase in higher categories, indicates the effectiveness of evaluation and classification mechanisms. This process did not result in uncontrolled numerical expansion but rather in a hierarchical reconfiguration of the system.

Overall, the dynamics of accreditation between 2009 and 2024 highlight a cumulative process of editorial professionalisation. The regulatory framework functioned as an instrument of selection and adjustment, driving both the reclassification and removal of publications that failed to meet established criteria. The evolution presented in Figures 5 and 6 confirms the maturation of the national publishing system and its progressive orientation towards editorial performance standards compatible with international scholarly publishing practices.

4.4. Scientific Conferences and Traceability of Results: Organisation, ANACEC Recognition, and IBN Indexing (2008-2024)

Scientific events constitute a distinct component of scholarly output, characterised by a complex relationship between organisation, formal recognition, and the documentation of editorial outcomes. The evolution of this sector in the Republic of Moldova permits an assessment of the degree of alignment between organisational activity and institutional mechanisms for the validation and recording of scientific results. Data on organised events, those officially recognised by ANACEC, and the dynamics of published and indexed proceedings enable an evaluation of the level of formalisation and professionalisation within this segment of scientific communication.

The data in Table 1 show that, for the period 2011-2024, a high but fluctuating volume of scientific events was organised within the territory of the Republic of Moldova, with varied distributions by type. National events recorded the highest absolute values and the most pronounced variability. Minimums were observed in 2012 (14) and 2019 (22), followed by substantial increases after 2020, peaking in 2022 (173) and remaining at high levels in 2023-2024 (136). Events “with international participation” exhibited a more moderate dynamic, with a minimum in 2012 (3) and a maximum in 2023 (86), followed by a decline in 2024 (58). International events also showed considerable variability, peaking in 2021 (90) and maintaining high values in 2022-2023 (79-88), before decreasing in 2024 (62). Overall, the data in Table 1 indicate an increase in scientific activities after 2020; however, the significant year-to-year fluctuations suggest that the “organised” register primarily reflects the organisational dimension rather than a consistent validation of scientific quality and publishable outcomes.

Table 1

Register of events organised in the Republic of Moldova (2011–2024)

Events organised in the Republic of Moldova	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
National scientific events	79	14	50	57	66	67	69	61	22	65	69	173	136	136
Scientific events with international participation	50	3	30	29	49	46	48	50	22	59	76	69	86	58
International scientific events	43	7	31	51	46	74	64	75	34	68	90	79	88	62

This contrast becomes clearer when the data on organised events are compared with ANACEC's register of recognised events (Table 2). Between 2020 and 2024, the number of events validated by ANACEC is considerably lower than the number recorded in the general register. This discrepancy indicates the application of a selective mechanism based on criteria concerning the scientific nature of events, the composition of scientific committees, the level of international participation, and the existence of publishable results eligible for national records. Thus, the ANACEC register reflects not only organisational activity but also the outcome of evaluation against the standards established by the regulations.

Table 2

Register of events Register of events recognised by ANACEC (2020-2024)

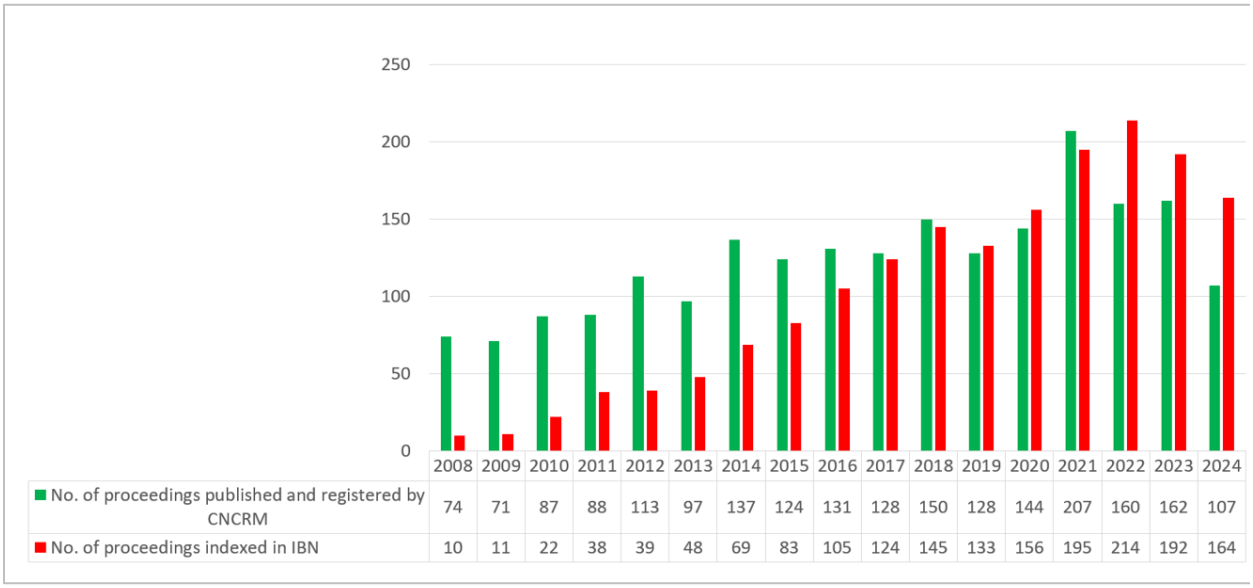
National Scientific events	2020	2021	2022	2023	2024
National scientific events	28	37	49	35	46
Scientific events with international participation	20	47	82	73	30
International scientific events	25	26	12	25	42

Within the category of recognised national events, there are moderate variations between 2020 and 2024, with lower levels at the start of the period, a marked increase in 2022, and similar values in 2023 and 2024. Events "with international participation" display a more pronounced dynamic: from a relatively low level in 2020, they rise sharply until 2022, followed by a decline in 2023 and 2024. For recognised international events, the trend is relatively stable, with a pronounced drop in 2022 and a gradual recovery over the subsequent two years.

Comparing these data with the total volume of organised events reveals a persistent gap between "organisation" and "recognition". For example, between 2022 and 2024, the number of national events organised is considerably greater than the number recognised. This discrepancy suggests the operation of an institutional selection mechanism whereby only events that meet criteria concerning scientific structure, committee composition, and the eligibility of publishable results are validated. Similarly, the status of "international participation" does not automatically confer recognition; demonstration of conformity with regulatory standards is required.

The third dimension of the analysis, illustrated in Figure 7, examines the editorial outcomes of conferences through two capture channels that do not perfectly overlap: the registration of proceedings at the Camera Națională a Cărții din Republica Moldova (CNCRM)

and their indexing in the Instrumentul Bibliometric Național (IBN). Between 2008 and 2012, there is a consistent lag between the number of proceedings registered at CNCRM and those indexed in IBN, indicating limited bibliometric capture of conference outputs relative to the recorded editorial volume. This pattern is consistent with a phase in which editorial registration functioned primarily as a bibliographic record, while bibliometric indexing had not yet been systematically integrated as an evaluative tool.



	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
No. of proceedings published and registered by CNCRM	74	71	87	88	113	97	137	124	131	128	150	128	144	207	160	162	107
No. of proceedings indexed in IBN	10	11	22	38	39	48	69	83	105	124	145	133	156	195	214	192	164

Figure 7. Dynamics of publication and indexing of conference proceedings organised in the Republic of Moldova (2008-2024).

Between 2013 and 2016, there was an accelerated increase in the number of proceedings indexed in the IBN, accompanied by a reduction in the gap relative to proceedings registered at CNCRM. This convergence suggests a gradual alignment of conference editorial output with the inclusion criteria of the bibliometric record; that is, improved traceability of results in the instruments used for monitoring and evaluation. After 2017, a much stronger convergence emerged; from 2018 to 2022, the values became very close, and in certain cases, the number of proceedings indexed in the IBN exceeded those registered at CNCRM. Operationally, this indicates that indexing in the IBN has become a major channel for capturing conference outputs, reducing the separation between editorial publication and inclusion in the bibliometric record.

For 2023-2024, the data suggest a decline in the total number of proceedings registered at CNCRM, alongside a sustained high level of indexing in IBN. The most cautious interpretation is that the system has recently shifted towards a smaller volume of proceedings with a higher eligibility for indexing and recognition. In other words, bibliometric capture remains high even when the registered editorial volume falls, which may indicate stricter selection of events or the internalisation of compliance criteria within organisational practices.

Methodologically, differences between CNCRM and IBN must be interpreted with caution. The relationship between the two records does not imply complete overlap, as they serve different functions. CNCRM primarily operates as a bibliographic register, typically linked to ISBN assignment. In contrast, IBN functions as an instrument for recording and monitoring scientific output, using criteria oriented towards the scientific eligibility of

volumes, independent of formal editorial status. Consequently, instances in which proceedings indexed in IBN exceed those registered by CNCRM do not indicate inconsistency but rather reflect differing coverage determined by each system's criteria and purpose. Practically, IBN can capture outputs from conferences for which standard editorial registration or ISBN was not obtained, but for which metadata, scientific structure, and eligibility conditions for recording exist.

Overall, the combination of data from Tables 1 and 2 and Figure 7 indicates two levels of selection. The first is institutional, demonstrated by the difference between organised events and those recognised by ANACEC, reflecting the application of validation criteria. The second concerns editorial and bibliometric traceability, evidenced by the progressive convergence of CNCRM and IBN, indicating improved capture of conference outputs in tools used for monitoring and evaluation. Therefore, scientific events should not be assessed solely by the number of events organised but also by their level of recognition and the system's capacity to document and index associated publishable results.

4.5. Document-type structure indexed in WoS, Scopus, and IBN: a comparative analysis

The analysis of document types indexed in WoS, Scopus, and IBN reveals significant structural differences between the segment of output with international visibility and that reflected at the national level. The distributions indicate distinct models of scholarly communication and different functions of indexing infrastructures.

In WoS and Scopus (Figure 8), scientific articles are the predominant form of publication. The number of articles significantly exceeds that of other document types, confirming the orientation of researchers from the Republic of Moldova towards publication in peer-reviewed journals, which are considered the principal channels for validation and international recognition. This pattern aligns with the selective policies of both databases, which prioritise original research articles and, to a lesser extent, review articles.

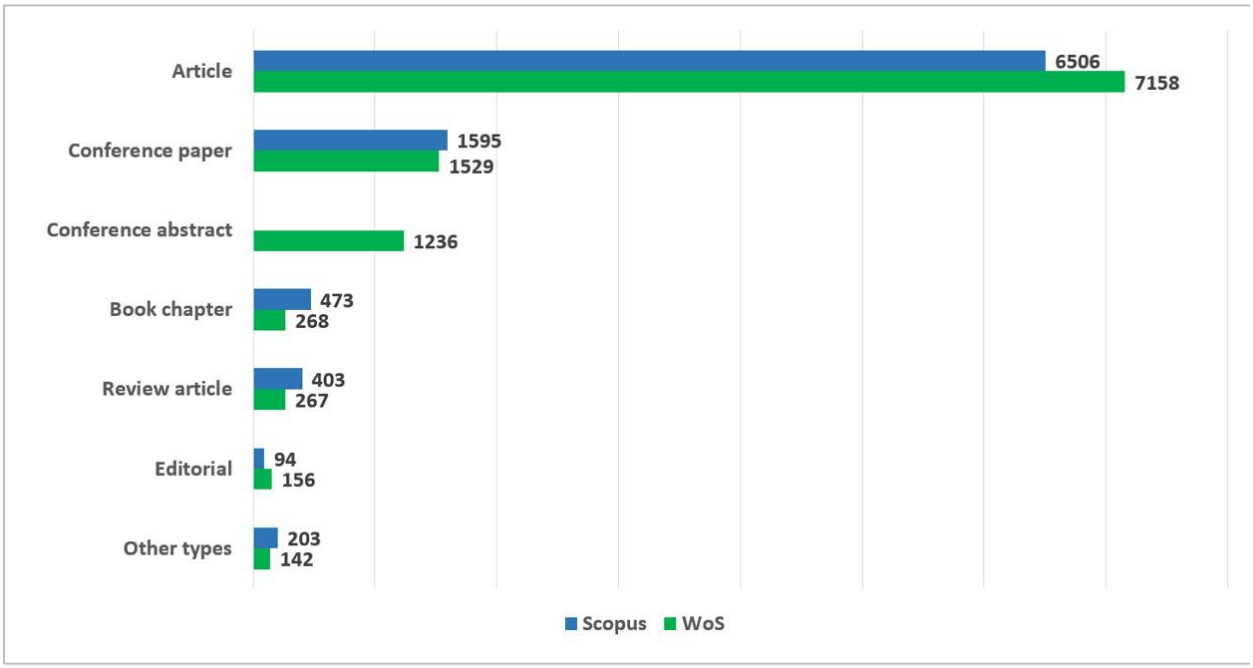


Figure 8. Document types of authors from the Republic of Moldova indexed in Web of Science and Scopus (2008-2024).

Conference papers represent the second most common document type in WoS and Scopus, with comparable volumes across both databases. Their presence reflects researchers' integration into international academic networks, particularly in technical and engineering disciplines where conferences serve as a recognised channel for the rapid dissemination of findings. Nevertheless, the proportion of these documents remains significantly lower than that of journal articles, indicating that international visibility is primarily linked to journal publication.

Other document types–such as book chapters, editorials, and reviews–are underrepresented in both international databases. This distribution reflects selection criteria that restrict the inclusion of edited volumes and editorial materials to those published by recognised publishers or appearing in journals of international standing. A slight typological diversification is observed in Scopus, confirming its broader coverage compared with WoS.

In contrast, the document structure indexed in IBN (Figure 9) exhibits a markedly different profile. Although journal articles constitute an important and numerically consistent segment, the dominant category comprises proceedings and chapters published in conference volumes. This distribution highlights the central role of scientific events in the dynamics of national scholarly output and confirms the importance of conferences as a mechanism for the internal dissemination of research findings.

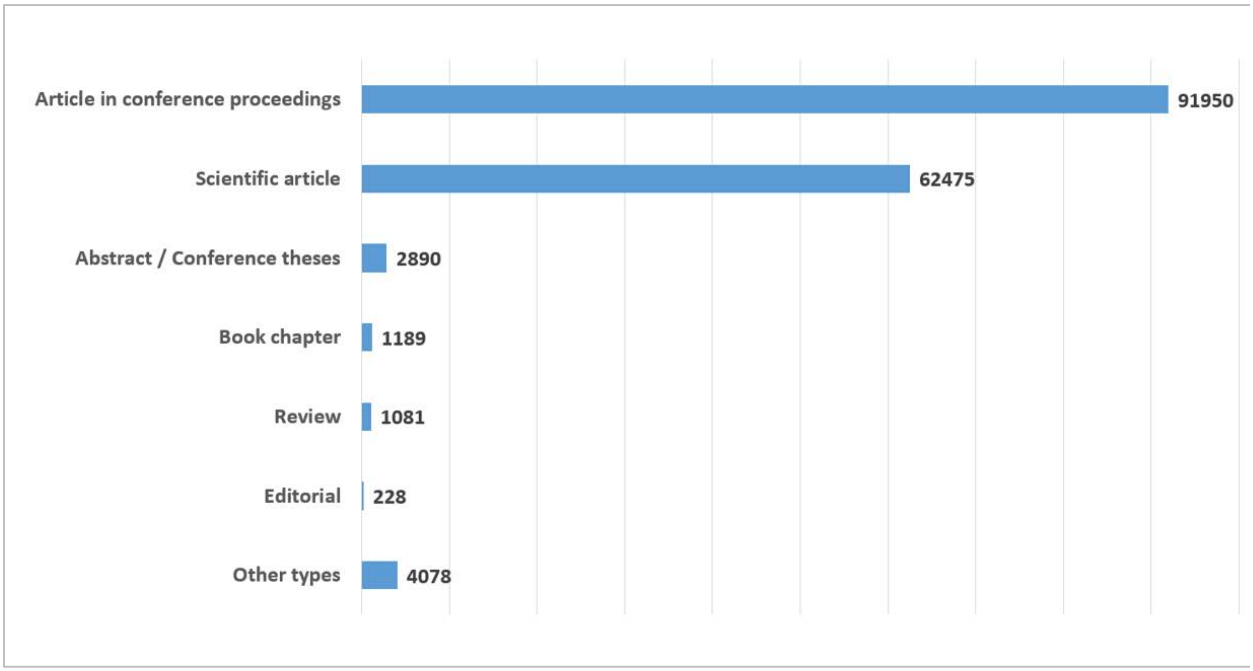


Figure 9. Document types authored by individuals from the Republic of Moldova, indexed in IBN.

IBN also encompasses a broader range of document types – abstracts, reviews, editorials, and other forms of communication–that are underrepresented in international databases. This diversity reflects the comprehensive purpose of the national tool, which aims to capture the full extent of scientific activity regardless of the level of internationalisation or external impact.

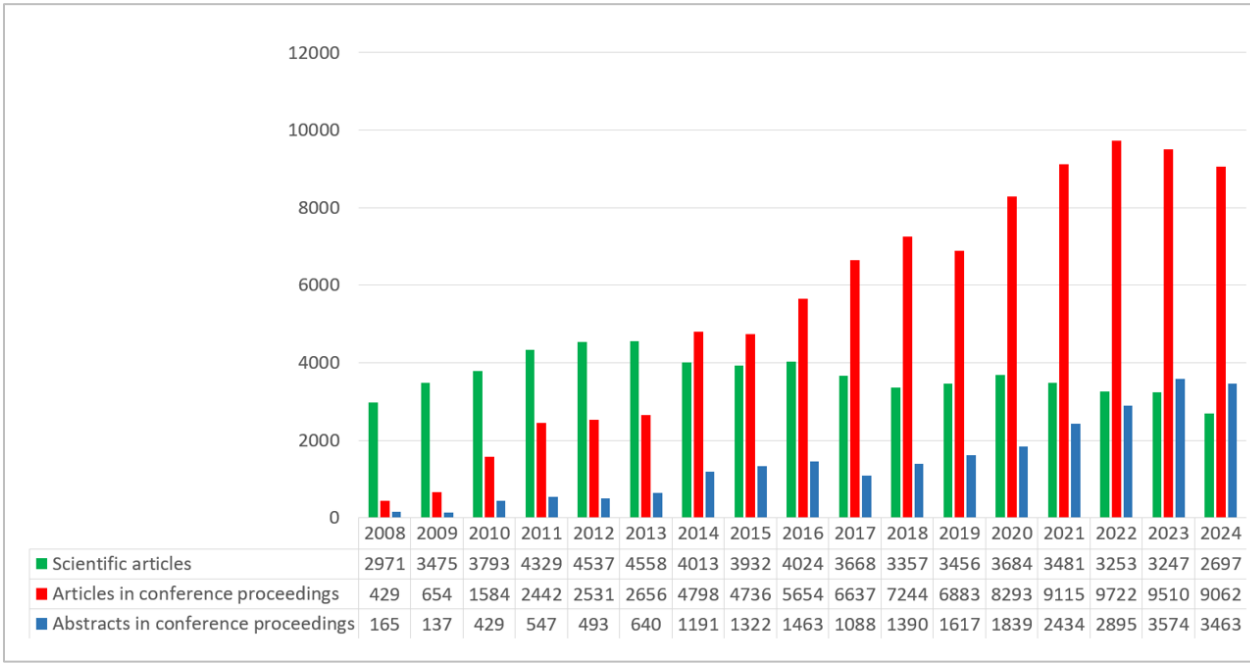
Comparison of the three sources highlights a clear functional distinction. WoS and Scopus capture the internationalised segment of the output, characterised by the predominance of journal articles and a restrictive typological selection. In contrast, IBN reflects the complete structure of national scientific production, including forms of

communication with local or regional relevance. This structural difference has direct implications for visibility assessment: exclusive use of international databases provides a picture focused on the externally impactful segment, whereas integration of IBN allows for an understanding of the actual distribution of document types and the publishing strategies adopted by the academic community in the Republic of Moldova.

Therefore, the comparative analysis of document typologies confirms the necessity of an integrated approach that differentiates between selective international visibility and a comprehensive representation of national scientific output.

4.6. Structural Reconfiguration of Publications Indexed in IBN (2008-2024)

The evolution of publications by authors from the Republic of Moldova indexed in IBN between 2008 and 2024 reveals significant structural changes in the distribution of document types, correlated with regulatory changes in journal evaluation and the recognition of scientific events. Data in Figure 10 indicate a transition from a model predominantly centred on journal articles to a mixed structure in which conference materials constitute a major share.



	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
Scientific articles	2971	3475	3793	4329	4537	4558	4013	3932	4024	3668	3357	3456	3684	3481	3253	3247	2697
Articles in conference proceedings	429	654	1584	2442	2531	2656	4798	4736	5654	6637	7244	6883	8293	9115	9722	9510	9062
Abstracts in conference proceedings	165	137	429	547	493	640	1191	1322	1463	1088	1390	1617	1839	2434	2895	3574	3463

Figure 10. Evolution of publication types by authors from the Republic of Moldova indexed in IBN (2008-2024).

In the initial phase of the analysed period, articles published in journals constituted the predominant segment of the indexed output. Growth in this document type is linked to the introduction of accreditation and classification mechanisms for journals, which stabilised a core of publications eligible for indexing and formalised the national evaluation process. The consolidation of criteria regarding peer review and periodicity contributed to greater predictability of editorial output.

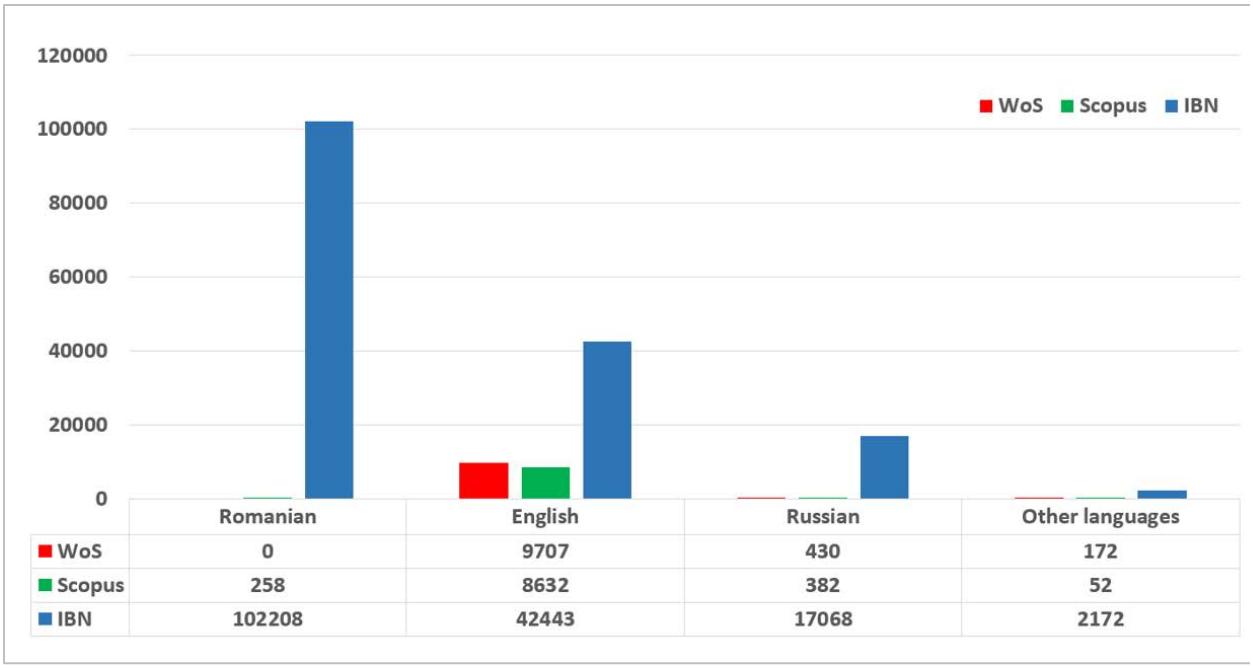
From 2014 to 2015, the typological structure changed noticeably. Articles published in conference proceedings experienced accelerated growth and came to outnumber journal articles. This development coincided with the strengthening of regulations governing scientific events, which enabled the systematic indexing of works presented at conferences and broadened the range of results eligible for the national record. At the same time, the number of indexed abstracts increased, reflecting a widening of the criteria for capturing scientific activity.

After 2016, the number of journal articles stabilised, no longer exhibiting the previous growth rate. This trend suggests a redistribution of publishing strategies in response to stricter editorial requirements and the appeal of conferences as platforms for rapid dissemination.

Overall, the dynamics of publications indexed in IBN reflect the cumulative effect of successive regulations: the professionalisation of the journal editorial sector and a substantial expansion of conference-based output. The result is a diversified bibliometric profile that captures internal transformations within the national scientific system and the adaptation of communication forms to the institutional evaluation framework.

4.7. Linguistic Structure of Indexed Publications: Convergences and Differences Between National and International Databases

The distribution of publication languages in documents authored by researchers from the Republic of Moldova, indexed in WoS, Scopus, and IBN, reveals consistent structural differences between international and national infrastructures. The data summarised in Figure 11 reflect both the functional orientation of these databases and the language strategies adopted by the scholarly community.



	Romanian	English	Russian	Other languages
WoS	0	9707	430	172
Scopus	258	8632	382	52
IBN	102208	42443	17068	2172

Figure 11. Linguistic structure of documents indexed in WoS, Scopus, and IBN (2008-2024).

In WoS, the linguistic profile is heavily dominated by English, which accounts for nearly all indexed documents. The presence of other languages is marginal, with Romanian being virtually absent. This distribution confirms the selective, international nature of the database, where English serves as the implicit standard for academic communication and a prerequisite for global visibility.

Scopus displays a similar pattern, with a clear predominance of English but a slightly greater diversity of secondary languages. Although documents in Romanian and Russian constitute a small proportion, their presence indicates a more flexible indexing policy compared with WoS. Nevertheless, English remains the principal vehicle for internationalisation and integration into the global scientific community.

By contrast, the linguistic structure of documents indexed in IBN is considerably more diverse. Romanian constitutes the dominant share, reflecting IBN's role as a tool for recording national scientific output and supporting internal evaluation. Simultaneously, the substantial proportion of documents in English indicates a progressive orientation towards internationalisation, while the presence of Russian and other languages reflects the multilingual nature of the Moldovan academic environment.

Comparatively, these distributions confirm a stratified system of scholarly communication. Publication in Romanian is predominantly associated with national dissemination and integration within the IBN infrastructure, whereas English is the primary language for accessing the international visibility provided by WoS and Scopus. Therefore, the choice of publication language is not neutral but reflects authors' strategic positioning between internal recognition and integration into the global research community.

4.8. Disciplinary Structure of Indexed Publications: Differentiating International and National Profiles

The disciplinary distribution of publications by authors from the Republic of Moldova in WoS, Scopus, and IBN reveals systematic differences between the internationalised segment of research and the output reflected at the national level. The data presented in Figures 12-14 indicate a stratified structure of visibility, determined both by the research profile and by the indexing criteria of each database.

In WoS database (Figure 12), publications are predominantly concentrated in the exact sciences and engineering. Materials science, applied physics, condensed matter physics, multidisciplinary chemistry, and nanotechnology are among the leading fields. This distribution suggests that the international visibility of Moldovan research is primarily supported by disciplines with well-established experimental infrastructure and a tradition of international collaboration. Social sciences and humanities are underrepresented, reflecting both the communication characteristics specific to these disciplines and WoS's stringent selection criteria.

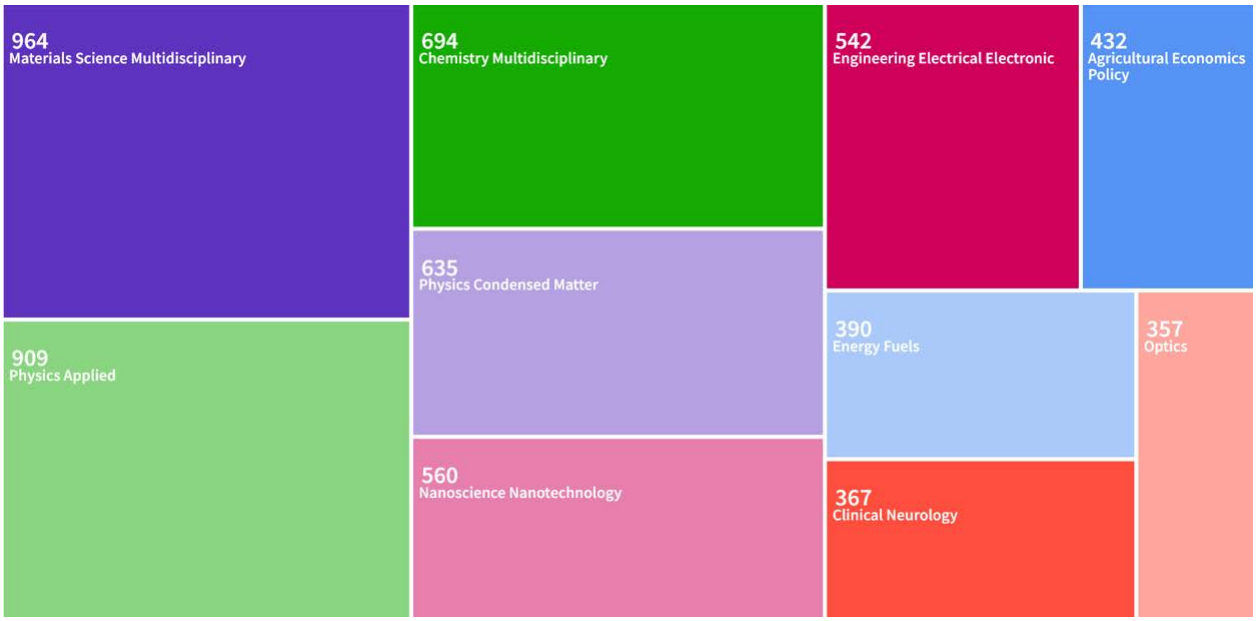


Figure 12. Distribution of publications by authors from the Republic of Moldova indexed in the Web of Science, categorised by scientific field.

Scopus (Figure 13) exhibits a more diversified structure. Although engineering, physics, and materials science remain well represented, there is a significant proportion of medicine, chemistry, mathematics, computer science, and the social sciences. This distribution indicates Scopus's greater capacity to integrate varied and interdisciplinary fields, including areas with limited representation in WoS. From this perspective, Scopus reflects an intermediate level of international visibility, characterised by broader disciplinary coverage and more extensive integration of biomedical and socio-economic fields.

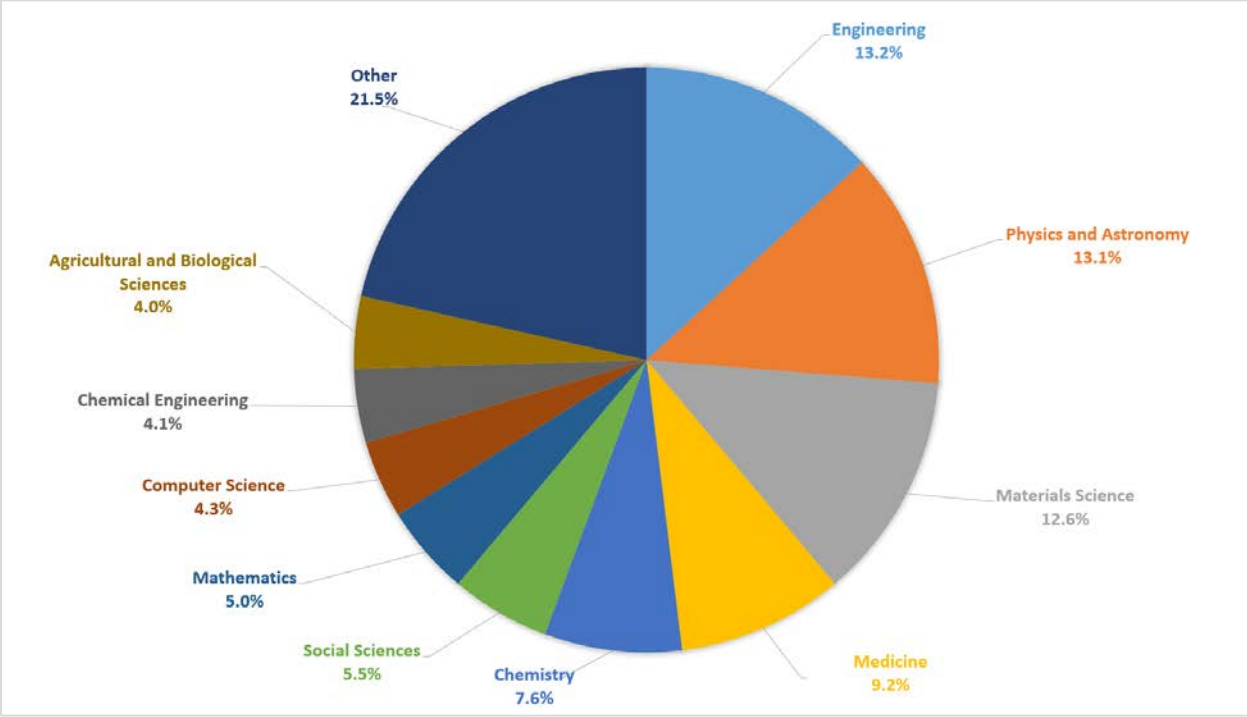


Figure 13. Distribution of publications by authors from the Republic of Moldova indexed in Scopus, categorised by subject area.

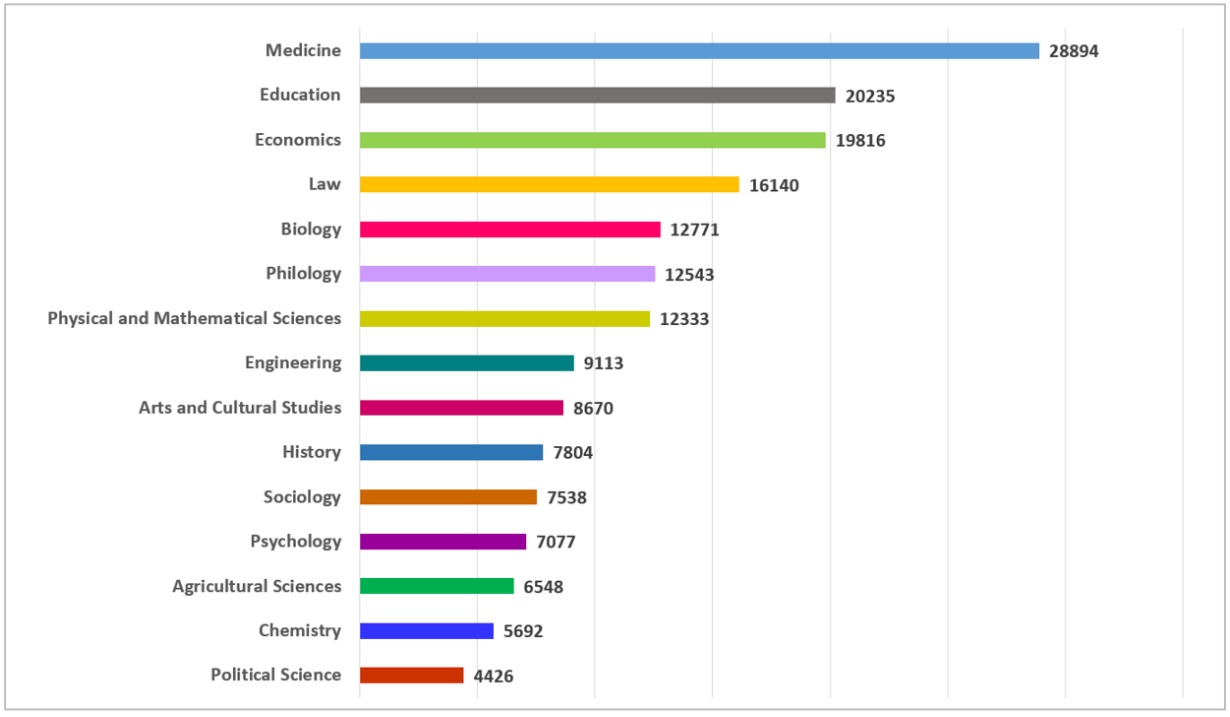


Figure 14. Distribution of publications by authors from the Republic of Moldova indexed in IBN, categorised by scientific field.

In IBN (Figure 14), the disciplinary profile differs substantially. Dominant fields include medicine, pedagogy, economics, law, biology, and philology, alongside the physical-mathematical sciences and technical domains.

The high proportion of social and human sciences reflects IBN's role as a comprehensive national record, encompassing both articles in accredited journals and materials from scientific events. In these disciplines, publication in the national language and in local journals or volumes remains predominant, which explains the differences relative to international databases.

A comparison of the three distributions confirms the existence of a dual model of scientific visibility. WoS captures the disciplinary core, with high international performance concentrated in the exact sciences and engineering. Scopus reflects broader thematic diversification, while IBN provides a comprehensive overview of the entire spectrum of national research, including fields with a predominantly internal orientation. This differentiation underscores the complementarity of the analysed databases and the importance of their integrated use in assessing the visibility of research from the Republic of Moldova.

5. Conclusions

Correlating the empirical results with the specialised literature confirms the infrastructural nature of scientific visibility. As the bibliometric and sociological approaches discussed above suggest, inclusion in a selective database is not only a measurement mechanism but also a means of validation and amplification of recognition. The disciplinary, linguistic, and typological coverage differences identified between WoS, Scopus, and IBN demonstrate that visibility depends on the internal logic of each infrastructure. Consequently, the assessment of scientific performance must be interpreted with reference to these structural mediations, avoiding extrapolations based on a single data source.

The comparative bibliometric analysis of publications by authors from the Republic of Moldova between 2008 and 2024 highlights a progressive restructuring of the national scholarly communication system, driven by the interaction among evaluation policies, accreditation criteria, and indexing infrastructures. The results indicate that normative and institutional changes have affected not only the volume of scientific output but also its distribution by document type, publication language, and disciplinary field.

The study confirms the existence of a dual model of scientific visibility. On the one hand, WoS and Scopus reflect the internationalised segment of research, characterised by the predominance of journal articles, the near-exclusive use of English, and a concentration in fields such as materials science, physics, chemistry, and engineering. On the other hand, IBN captures the full structure of national scientific output, including national journals, conference materials, and publications in Romanian and Russian, as well as social sciences and humanities fields that are under-represented in international databases.

A notable finding is the typological reconfiguration of publications indexed in IBN after 2014, characterised by a marked increase in conference materials. This development correlates with regulations concerning the recognition of scientific events and indicates an adaptation of publishing strategies to institutional evaluation criteria. Concurrently, the analysis of conferences reveals a systematic distinction between organised events and those officially recognised, as well as between editorial publication and bibliometric indexing, highlighting successive filtering mechanisms in the capture of scientific output.

The linguistic and disciplinary distributions further confirm the stratified nature of visibility. English serves as the primary medium for accessing international visibility, whereas national languages facilitate internal dissemination and societal relevance. Similarly, the exact sciences and engineering benefit from broader integration into global citation networks, while the social sciences and humanities are predominantly represented within the national infrastructure.

These findings suggest that assessing the visibility of research from the Republic of Moldova cannot be adequately achieved using international databases alone. An integrated approach, combining indicators from WoS and Scopus with data from IBN, allows for a more balanced interpretation of scientific performance, taking into account disciplinary, linguistic, and typological differences.

For future research, studies could investigate the relationship between publication types and citation impact, the effects of persistent identifiers (such as ORCID and DOI) on visibility, and the correlation between funding, international collaborations, and integration into selective databases. Longitudinal evaluations of the effects of regulatory changes on publishing behaviour could also provide an empirical basis for refining evaluation policies.

Overall, the study emphasises the need to align internationalisation strategies with the maintenance of a robust national infrastructure that can fully reflect the diversity and specificity of research in the Republic of Moldova.

Limitations of the Study: This comparative bibliometric analysis is subject to several methodological and structural limitations that should be taken into account when interpreting the results.

First, the findings depend on the coverage and indexing policies of the databases used. WoS and Scopus apply different selective criteria, while IBN serves a distinct, more exhaustive function. Consequently, the observed differences may reflect both genuine characteristics of scientific output and specific features of the indexing infrastructures. Therefore, measured visibility is contingent upon the source employed.

Second, the analysis relies on data extracted at specific points in time, which may influence the results due to the continuous updates of bibliographic databases. Possible indexing delays or subsequent corrections could marginally alter the presented distributions.

Another limitation relates to the classification of disciplines and document types. The assignment of publications to scientific fields varies between WoS, Scopus, and IBN, and these discrepancies may affect the direct comparability of the data. Furthermore, the analysis did not include impact indicators (such as citations or altmetric scores), focusing predominantly on the structure and volume of output.

Finally, the study does not examine in detail variables such as international collaboration, research funding, or institutional affiliation–factors that can significantly affect visibility. Incorporating these dimensions could provide a more nuanced understanding of the mechanisms through which publications attain international recognition.

Despite these limitations, the combined use of international databases and national infrastructure provides a robust comparative perspective on the structure and dynamics of scientific visibility in the Republic of Moldova.

Research Data Availability Statement: The research data are available upon request.

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Contribution of Authors

Nelly Țurcan: Conceptualization, Methodology, Investigation, Visualization, Writing – Original Draft;
Rodica Cujba: Resources, Formal analysis, Writing – Review & Editing, Supervision;
Vitalie Minciuna: Data curation, Validation, Writing – Review & Editing.

Conflicts of Interest: The authors declare no conflict of interest.

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