



## APPLICATION OF ECONOMIC AND ACCOUNTING ANALYSIS FOR THE DEVELOPMENT OF BUSINESS COMPETITIVENESS

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**Abstract:** *Through this document, it was possible to analyze the main characteristics of the volume of scientific production referring to the study of the variables Economic and Accounting Analysis and Business Competitiveness. A bibliometric analysis was proposed to analyze details such as Year of Publication, Country of Origin of the publication, Area of Knowledge in which the published research is carried out and the Type of Publication most frequently used by the authors of each document published in high-impact journals indexed in the Scopus database during the period between 2017 and 2022. Among the main findings, it was possible to determine that, for the execution of the different research methodologies, the report of 31 scientific documents related to the study of Economic and Accounting Analysis and Business Competitiveness was achieved. The maximum number of publications made in a year was 11 papers submitted in 2019. The country of origin of the institutions that reported the highest number of records in Scopus was Russia with 10 documents. The area of knowledge with the greatest influence at the time of executing the research projects that resulted in scientific publications was Economics, Econometrics and Finance, which contributed great theoretical material in a total of 11 publications, the same number presented by the area of Business, Administration and Economics. Finally, the type of publication most frequently used to publicize findings from the analysis of the aforementioned variables was the Article, which represented 48% of the total scientific production.*

**Keywords:** *Economic Analysis, Accounting Analysis, Business Competitiveness.*

### 1. INTRODUCTION

Competitiveness has become one of the aspects that entails more relevance in the business field, which derives from the requirements and demands of the consumer and the micro and macroeconomic environment currently framed by the processes of globalization and industrialization. The development of the private sector and the participation of medium and small SMEs, is of paramount importance for competitiveness processes since the competence of these economic agents plays an important role in the generation of new knowledge and the application of new technologies to improve productivity, to cooperate and have better competitiveness in the national and international markets achieving the efficiency of their resources and the perfect optimization of them allowing to improve the levels of production and competitiveness.

Due to the great competitive environment that companies live, they are forced to maintain and even increase their levels of market participation, through constant innovation of products and various

production systems, as well as the implementation of a flexible production system which allows companies to respond immediately to the changes that are constantly generated in the environment and in the market. , emphasizing the reduction of its costs and the increase of profits allowing the improvement and increase of productivity, the permanent search for a segmentation and a market child and the impulse for the skilled labor are essential parts that allow to get involved in global markets.

The development of business competitiveness is analyzed from different factors, among which stands out the level of competitiveness of the country, which includes GDP (Gross Domestic Product), macroeconomic levels, opening and access to both national and international markets or the due complexity of regulation for the business sector; another factor to take into account is the regional and national infrastructure and finally the levels of competitiveness. internal within each private sector company. I take into account these factors productivity levels, profitability, competitive position, participation in internal and external markets are of vital importance to be rivals in any type of market. For this reason, this article seeks to describe the main characteristics of the compendium of publications indexed in the Scopus database related to the variables Economic and Accounting Analysis and Business Competitiveness, as well. As the description of the position of certain authors affiliated with institutions. during the period between 2017 and 2021.

## 2. GENERAL OBJECTIVE

Analyze from a bibliometric approach, the characteristics in the volume of scientific production related to Economic Analysis, Accounting Analysis and Business Competitiveness, registered in Scopus during the period 2017-2022.

## 3. METHODOLOGY

This article is carried out through a mixed orientation research that combines the quantitative and qualitative method.

On the one hand, a quantitative analysis of the information selected in Scopus is carried out under a bibliometric approach of the scientific production corresponding to the study of Economic Analysis, Accounting Analysis and Business Competitiveness

On the other hand, examples of some research works published in the area of study indicated above are analyzed from a qualitative perspective, starting from a bibliographic approach that allows describing the position of different authors against the proposed topic.

It is important to note that the entire research was carried out through Scopus, managing to establish the parameters referenced in *Figure 1*.

### 3.1 Methodological design



**Fig. 1. Methodological design**

Source: Authors.



**3.1.1 Phase 1: Data collection**

Data collection was executed from the Search tool on the Scopus website, where 16 publications were obtained from the choice of the following filters:

- TITLE-ABS-KEY ( economic AND analysis, AND accounting AND analysis, AND business AND competitiveness ) AND ( LIMIT-TO ( PUBYEAR , 2021 ) OR LIMIT-TO ( PUBYEAR , 2020 ) OR LIMIT-TO ( PUBYEAR , 2019 ) OR LIMIT-TO ( PUBYEAR , 2018 ) OR LIMIT-TO ( PUBYEAR , 2017 ) )
- Published documents whose study variables are related to the study of Economic Analysis, Accounting Analysis and Business Competitiveness.
- Works published in journals indexed in Scopus during the period 2017-2022.
- No distinction by country of origin
- Without distinction in areas of knowledge.
- Regardless of type of publication.

**3.1.2 Phase 2: Construction of analysis material**

The information collected in Scopus during the previous phase is organized and subsequently classified by graphs, figures and tables as follows:

- Co-occurrence of Words.
- Year of publication.
- Country of origin of the publication.
- Area of knowledge.
- Type of Publication.

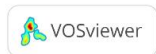
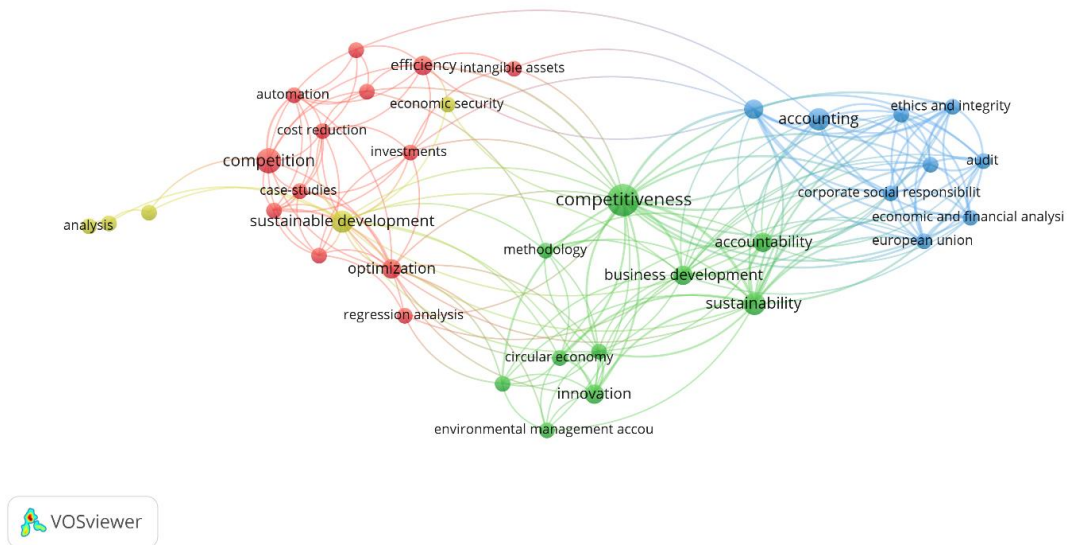
**3.1.3 Phase 3: Drafting of conclusions and outcome document**

In this phase, we proceed with the analysis of the results previously yielded resulting in the determination of conclusions and, consequently, the obtaining of the final document.

**4. RESULTADOS**

**4.1 Co-occurrence of words**

Figure 2 shows the co-occurrence of keywords found in the publications identified in the Scopus database.



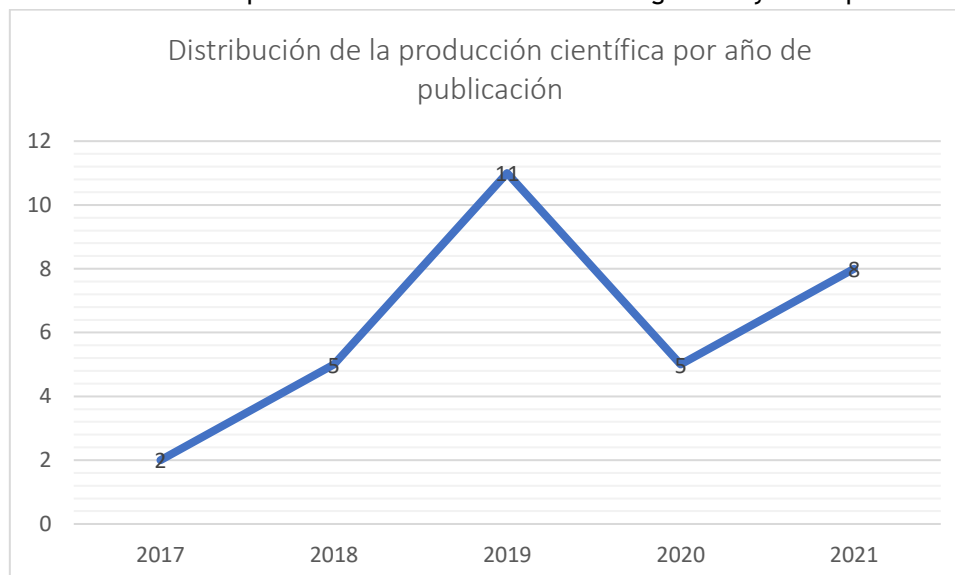
**Fig. 2. Co-occurrence of words**

Source: Own elaboration (2023); based on data exported from Scopus.

Competitiveness was the most frequently used keyword within the studies identified through the execution of Phase 1 of the Methodological Design proposed for the development of this article. Circular Economy is also among the most frequently used variables, associated with variables Accounting Analysis and Business Competitiveness. From the above, the signal draws attention to the limitations that arise for the due development at the time of business competitiveness, among which we find, macroeconomic management, the functioning of the state, financial area, internal market, technology and innovation, as well as the tax and labor aspects that each country has. Business competitiveness derives from competitive advantages among which we highlight their production and organizational methods. They are reflected in the price and final quality of the product, as well as the innovation that is presented to the final product and finally its relationship with certain specific markets. The performance and productivity of the company will be linked to training what accumulates over time will influence its competitive strategy. These in turn will be adopted according to the economic environment and the competitive process within the company. In this way, competitiveness will be understood as a measure that does not cover only one company, but directly related to the competitive environment of the company. Specific market.

#### 4.2 Distribution of scientific production by year of publication

Figure 3 shows how scientific production is distributed according to the year of publication.



**Fig. 3.** *Distribution of scientific production by year of publication.*

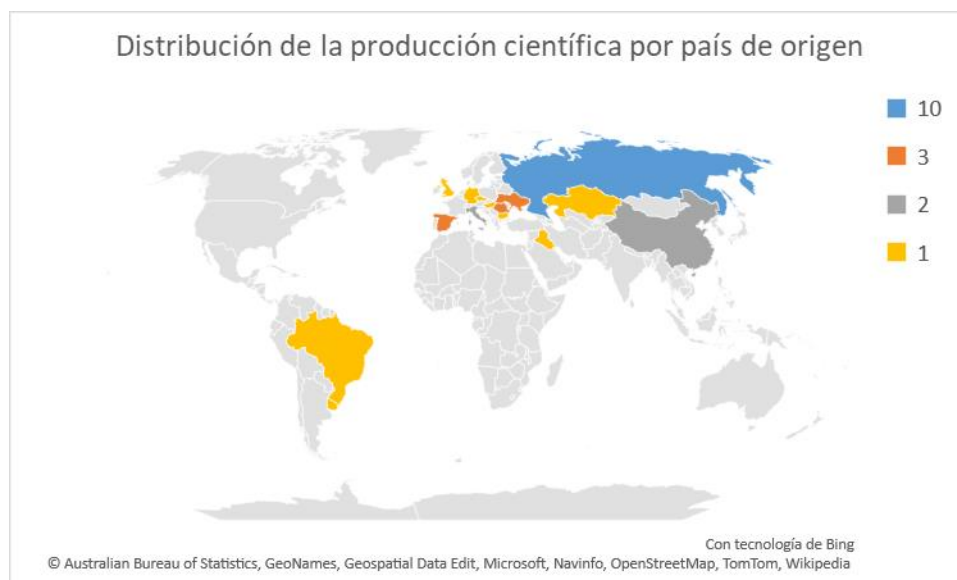
**Source:** Own elaboration (2023); based on data exported from Scopus

Among the main characteristics evidenced by the distribution of scientific production by year of publication, a level of number of publications registered in Scopus is notorious in 2019, reaching a total of 11 documents published in journals indexed in said platform. This can be explained thanks to articles such as the one titled "Technical Inefficiency of the Manufacturing Sector in Laos: A Case Study of the Enterprise Survey" (Sayavong, 2022). This study aims to unlock the path of growth for sustainable economic development and achieve the government's vision for 2030 by improving the productivity of the manufacturing sector in Laos. Design/methodology/approach: This study applied cross-sectional data from 2009 firms from the national enterprise survey, namely the Economic Census Survey (ECS), in 2012/13, in addition to employing stochastic frontier analysis (SFA) to assess frontier production and factors behind technical inefficiency to arrive at policy recommendations. Findings: The study found that the level of efficiency varied between sub-industries with an average of 72.51% in total potential output. Of the five classified groups, Sub4 (chemicals and plastics) turned out to be the most efficient manufacturer, while the rest in order are Sub1 (food and beverages), Sub5 (furniture and others), Sub2 (clothing and textiles) and Sub3 (paper and printing), providing evidence to improve technical efficiency. This study found that company size, accounting system and access to credit are crucial to improving the production efficiency of all sampling companies. However, these

factors may be subject to specific industries. Practical implications: For engagement for the business community and policy makers, the findings of this study could be a reference in terms of which areas they should focus on to improve technical efficiency as part of productivity in the manufacturing industry.

#### 4.3 Distribution of scientific production by country of origin.

Figure 4 shows how scientific production is distributed according to the nationality of the authors.



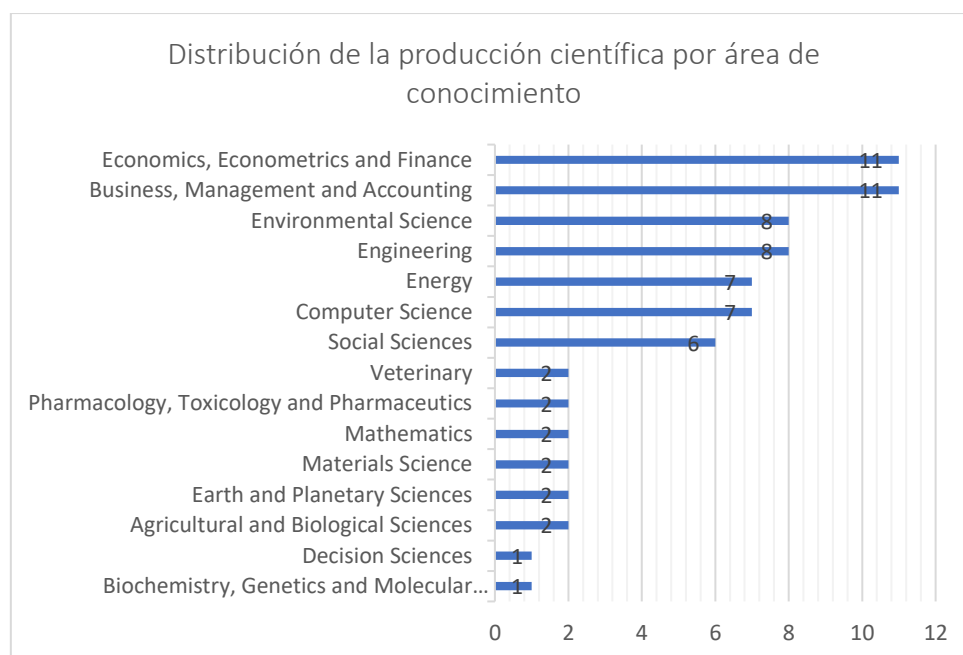
**Fig. 4.** *Distribution of scientific production by country of origin.*

**Source:** Own elaboration (2023); based on data provided by Scopus.

Within the distribution of scientific production by country of origin, records from institutions were taken into account, establishing Russia, as the country of that community, with the highest number of publications indexed in Scopus during the period 2017-2021, with a total of 10 publications in total. In second place, Czech Republic with 3 scientific papers, and Greece occupying third place presenting to the scientific community, with a total of 2 papers among which is the article entitled "A sustainable dual-channel inventory model with diffuse trapezoidal demand and energy consumption" this article aims to (Priyan S, 2021) Obtain a balance between cost and emissions, thus determining the optimal production-distribution strategy and a suitable sustainable plan for handling orders both online and offline. The mentioned scenario is formulated mathematically in the form of a constrained nonlinear program (NLP) and a Lagrange multiplier method is derived to solve it. An iterative solution algorithm is designed and, for a better illustration of the developed theory, a numerical analysis is carried out followed by an extensive discussion on sensitivity analysis for various parameters. Our results indicate that the optimal solutions of the sustainable diffuse model fluctuate slightly from the solutions of the sustainable clear model. According to the results, considering the uncertainty in the system is a crucial factor in achieving the economic and environmental sustainability of the productive sector. The research reveals that professionals must be careful in accounting for flexibility in demand for input factors and energy to cope with uncertainties that always fit the actual situation.

#### 4.4 Distribution of scientific production by area of knowledge

Figure 5 shows the distribution of the elaboration of scientific publications from the area of knowledge through which the different research methodologies are implemented.



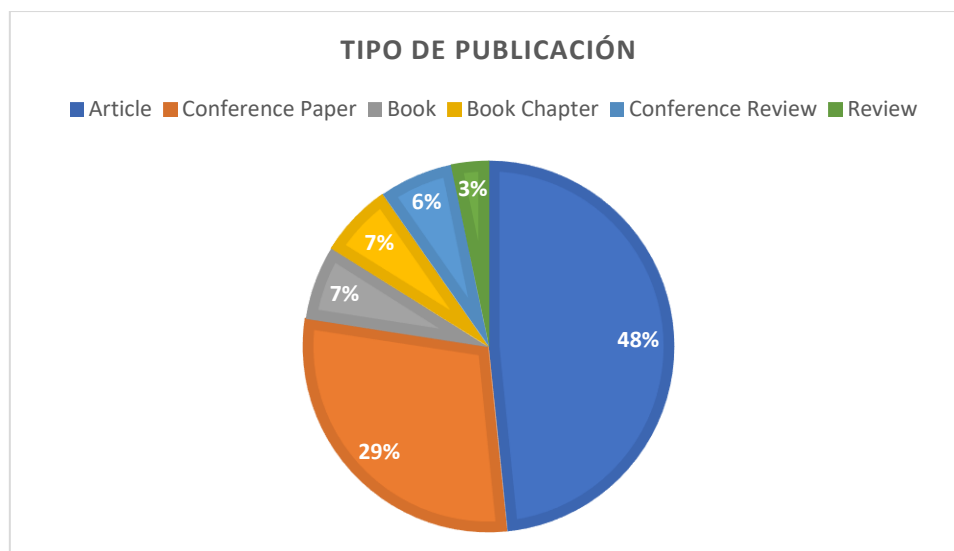
**Fig. 5.** *Distribution of scientific production by area of knowledge.*  
**Source:** Own elaboration (2023); based on data provided by Scopus.

Economics, Econometrics and Finance was the area of knowledge with the highest number of publications registered in Scopus with a total of 11 documents that have based their methodologies Accounting Analysis and Business Competitiveness. In second place, Business, Administration and Accounting with 11 articles and Environmental Science in third place with 8. The above can be explained thanks to the contribution and study of different branches, the article with the greatest impact was registered by the area of Economics, Econometrics and Finance entitled "Digitalization as a vector for the development of information systems and modernization of accounting systems" (Chyzhevskaya, 2021). This article aims to substantiate that the digitalization of the economy implies the need to modernize the systems and mechanisms of companies to ensure their competitiveness and improve management systems. Research is conducted using methods of theoretical generalization, analysis, synthesis, comparison and clustering. This study resulted in the definition of the digitalization trends of the global and Ukrainian economies with a description of their impact on business activity and business processes, assessing the effects of economic digitalization on the requirements for the information system of the enterprise which, therefore, serves to set directions for its modernization. through the introduction of digital technologies, such as electronic data interchange, extensible business reporting language, BigData, Internet of Things, robotic process automation, artificial intelligence, real-time adherence, cloud technologies, blockchain. The directions of implementation and development of accounting digitalization of enterprises are like flows: changes in the accounting system in terms of its method elements; application of Assets, Liabilities and Capital to new digital forms; Advanced training in meeting the digital competence requirements of accounting staff.

#### 4.5 Type of publication

In the following graph, you will observe the distribution of the bibliographic finding according to the type of publication made by each of the authors found in Scopus.





*Fig. 6. Type of publication.*

Source: Own elaboration (2023); based on data provided by Scopus.

The type of publication most frequently used by the researchers referenced in the body of this document was the Journal Article with 48% of the total production identified for analysis, followed by Conference Articles with 29%. Book Chapters are part of this classification, representing 7% of the research papers published in journals indexed in Scopus. In this last category, the one entitled "Synergies between renewable energies and investments in flexibility: A case of a medium-sized industry " stands out, whose scope of study is based on investigating the use of variable (Wanapinit, 2021)renewable energies and flexibility potentials in a case study of an aggregates industry. An energy concept that considers the expansion of photovoltaics and batteries, flexible production, fuel cell electric trucks (FCEVs) and hydrogen production is proposed, and analyzed under the techno-economic conditions and policies expected for 2030 using an energy system optimization model. Under this concept, total costs and emissions are reduced by 14% and 70%, respectively, compared to the business-as-usual system. The main benefit of photovoltaic investment is the reduction of electricity acquisition. The flexibility of the manufacturing schedule and hydrogen production increases not only the self-consumption of PV generation from 51% to 80%, but also the optimal PV capacity by 41%. Despite the expected cost reduction and efficiency improvement, FCEV is still not competitive against diesel trucks due to higher investment and fuel prices, i.e. its adoption increases costs by 8%. However, this is solved when hydrogen can be produced from the surpluses of electricity generation. Our findings reveal synergistic effects between different potentials and the importance of enabling local business models, for example, regional hydrogen production and storage services. The SWOT analysis of the proposed concept shows that the pursuit of sustainability through new technologies brings new opportunities and risks. Finally, end users and policymakers are encouraged to plan their investments and supports towards integrating multiple applications, consumer sectors and infrastructure.

## 5. CONCLUSIONS

Through the bibliometric analysis carried out in the present research work, it was established that China was the country that has the largest number of records published for the variables Economic and Accounting Analysis and Business Competitiveness in order to know the impact generated by the application of an economic and accounting analysis for the development of business competitiveness with a total of 10 publications in Scopus database. In the same way, it was established that the application of theories framed in the area of Economics, Econometrics and Finance, were the most frequently used in the measurement of the impact generated by a competitive development since these types of analysis and factors of business competitiveness are quite complex, most researchers




affirm that the only aspect is the organization, however, we can conclude what would be the elements that influence business competitiveness which we highlight: good management at production levels, as well as raw materials and inventories of companies, excellent interaction between planning, marketing, niche market and research and development, Improvement of workers' skills through investment in specialized training and generation of high levels of productivity. Finally, it is important to highlight the importance of the political and economic authority of these countries because provision and maintenance of economic infrastructure, health services and education A favorable macroeconomic environment can help countries achieve high levels of competitiveness and thus enjoy their advantages in terms of economic development and people in this way, The structure of the placement companies is expected to be more suitable for their operation using superior quality appearance requirements and market size. Ultimately, these factors are expected to affect the environment. A company suitable for corporate decision-making that will be able to operate in the developed and innovation-friendly entrepreneurial environment, resulting in greater national competitiveness.

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