



Focus on the sustainable development of innovation and entrepreneurship- scientometric analysis

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Abstract. The concept and actions of sustainable development are very important. Be it from the national, corporate, and individual levels, the innovation and entrepreneurship capabilities of enterprises represent a country's national strength. Given this, sustainable development has a profound impact on innovation and entrepreneurship. This article focuses on the sustainable development of innovation and entrepreneurship and uses the scientometric analysis method and the Web of Science (WOS) database to systematically review the most cited and latest papers. Based on searching for 150 papers, the literature matrix uses the literature matrix to analyze the paper and visualize the results. The results show that the research continues to strengthen the cause of innovation, presenting a positive trend. The scope of research has gradually expanded, interacting with sustainable development and showing a diversified trend. By displaying the annual publishing trend, factors, theme analysis, and the relevant literature keywords analysis, researchers can provide researchers to grasp the development trend of the field and provide a reliable basis.

Keywords: sustainable development, innovation and entrepreneurship, scientometric analysis

1 Introduction

With the rapid development of The Times, people are paying more attention to innovation and entrepreneurship, which has promoted a new pattern of global development and operation. [1]. Nowadays, innovation and entrepreneurship undertaking development rapidly, and the industry is gradually being well-known. At present, the concept of sustainable development continues to advance[2]. Innovation entrepreneurship affects sustainable development, and sustainable development also affects entrepreneurial innovation [3]. If you want the country to create an excellent enterprise, you need to rely on the innovation and business potential of the business; In order to realize the

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sustainable development of the economy, it is necessary to rely on the business innovation potential. The ability to develop[4]. In the context of dual development, the world needs stability, and sustainable development is a significant evolution of sustainability[5]. The innovation and entrepreneurship capability of a country comes from policy guidance and encouragement, such as the support of the Chinese broadband policy for green entrepreneurship [6], and assist entrepreneurs to achieve innovation and entrepreneurship through policy[7]. It can guide more innovative capabilities to be created, enabling them to have sustainable performance. In addition, sustainable development is concerned with the ecological rationality of various activities, for example, the teaching industry[8], the food industry[9], and the impact on venture capital [10]. Innovation and entrepreneurship of sustainable development emphasize the encouragement of economic activities that are good for resources and the environment. This idea can help innovate and entrepreneurship healthy and long-term development and avoid the extremeness of guidelines. Innovation and entrepreneurship can also help the sustainable development of the idea to continue to move forward [11]. This paper will study the sustainable development of innovation and entrepreneurship, and use scientometrics to choose innovation and entrepreneurship as the main research, and sustainable development as the auxiliary research.

2 Data and method

Access to the literature on sustainable development and innovation and entrepreneurship, this article uses the following WOS advanced search query: sustainable entrepreneurial TS = ("Sustainable Development") and TS = ("Innovation" and "Entrepreneurship"). As of August 1, 2023, a total of 150 writings were gathered. This article uses literature measurement analysis and uses VOSviewer and Bibliometric software to complete the visual results.

3 Research drawing results

Discussing the nature of innovation and entrepreneurship and sustainable development, this article provides the following information and analysis.

3.1 Annual trend

To provide a more intuitive display of the attention data for each year, this study searched for literature with keywords such as "sustainable development" and "innovation and entrepreneurship" from 2005 to 2018, and analyzed and summarized the relevant data to form a visualized annual trend curve. Figure 1 data shows that the number of publications published from 2018 to 2020 showed a rise. From 2020 to 2021, the number of documents appeared in a stable community. From 2021 to 2022, the number

of documents published overall increased on an upward trend. From 2022 to 2023 Published number is constantly declining. So sustainable development, and innovation and entrepreneurship have emerged but didn't get attention.

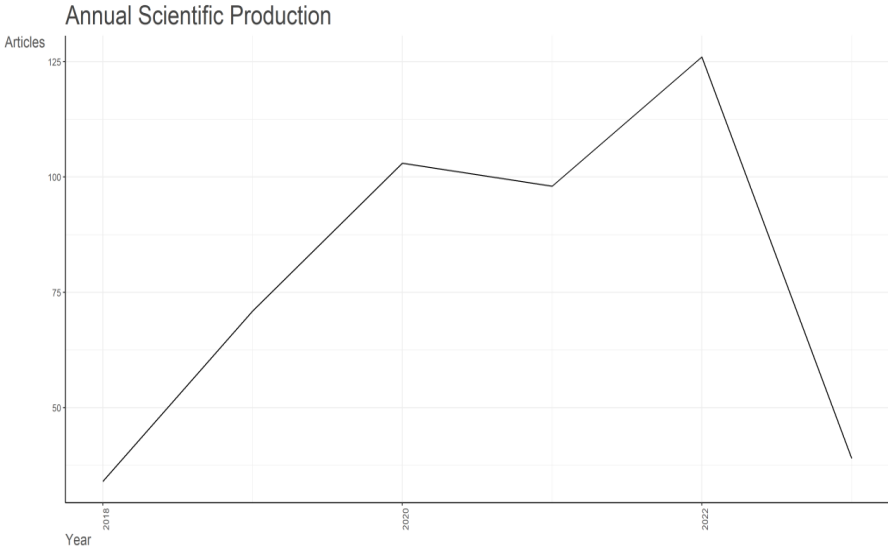


Fig. 1. Year's scientific production diagram

3.2 Main countries, keywords, publishing sources

A detailed analysis of Figure 2 provides a clear picture of the links between key countries, keywords, and publication sources. The authors from various countries actively conduct cooperation and research, among them, the percentage of Chinese authors is the largest. Apart from Chinese authors, there are also authors from countries such as Spain, Romania, Germany, Poland, etc. This indicates that countries attach importance to sustainable development and innovation and entrepreneurship. Sustainability occupies a large part of the source of the publication. In addition, it also covers the themes such as Journal Of Cleaner Production, Business Strategy And The Environment, and IEEE Transactions On Engineering Management. Except for sustainable development, the study of entrepreneurship, sustainability, and innovation is also included. Almost every country displayed in the chart covers these areas, which also reflects the richness of the research objects.

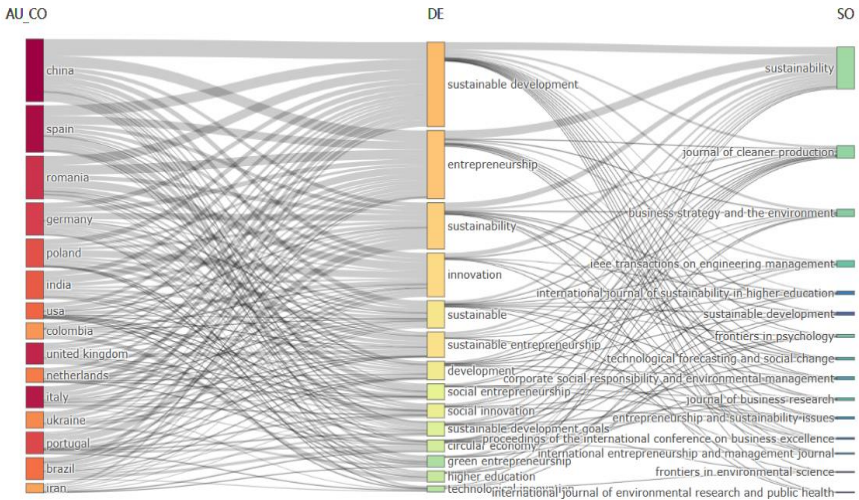


Fig. 2. Major countries, keywords, publishing sources map

3.3 Keywords

Figure 3 shows a total of five clusters, sustainable development is the central point, forming a green cluster. Sustainable entrepreneurship, entrepreneurial ecosystem, bibliometric analysis, sustainable innovation, corporate sustainability, system literature review, sustainable development, and social entrepreneurship are all included in green clusters. In addition, the content of the purple cluster includes sustainability, social innovation, and open innovation; The red cluster includes innovation, higher education, education for sustainability deve, and entrepreneurship education; Yellow clusters include business models innovation, SMEs, circular economy, start-ups, green entrepreneurship; blue clusters include entrepreneurship, technological innovation, and covid-19. The overall situation, image has a high degree of connectivity, and sustainable and sustainable development is closely related to the overall situation. Thus, in order to foster sustainable development of innovation and entrepreneurship, it is necessary to start from sustainable development and integrate key factors such as entrepreneurship, innovation, and business models.

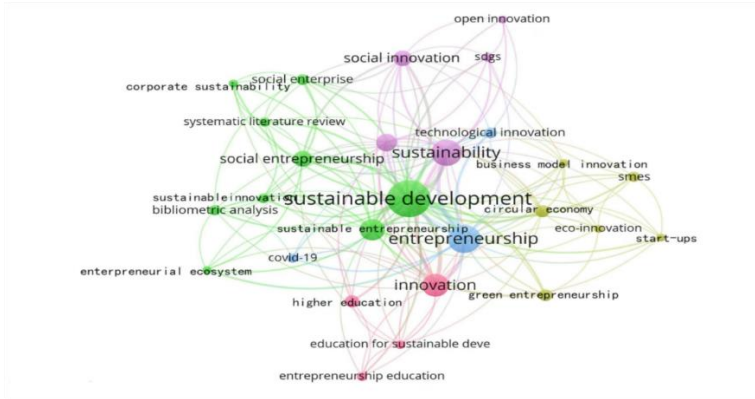


Fig. 3. Keyword diagram

3.4 Factor Analysis

MCA's method is used in multi-factor analysis to form a conceptual structure map and determine its importance by the size of the cluster map. As shown in Figure 4, the red cluster is the largest, which includes strategy, performance, management, network, economic growth, and so on. Among them, strategy is closest to the central point, which shows that strategy is a very important solution for sustainable development innovation and entrepreneurship. The second is blue clustering, which includes firm performance, business, models, etc. The third cluster is the green cluster, which includes challenges, governance, design, etc. Finally, the purple cluster includes the drivers, green. The image that strategy is the most important in sustainable development innovation and entrepreneurship, and performance and management in its vicinity can also play a crucial role. Carry forward the innovative and entrepreneurial spirit of sustainable development, you can start with the enterprise strategy, adjust the management system of the enterprise, and update the product design and performance.

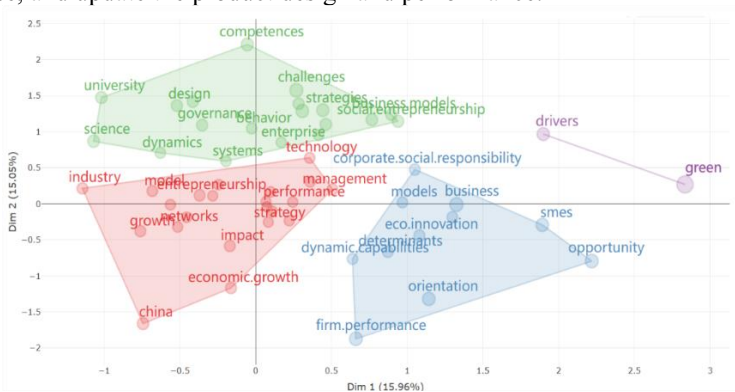


Fig. 4. Structural Concept Diagram

3.5 Topics

Figure 5 shows that the fields of business, entrepreneurship, and technology are very important to this topic and have made good progress. However, entrepreneurship, innovation, and education, while important, have not fared well; Sustainable development social is not well developed and maybe just emerging or about to disappear. On the basis of in-depth research on this topic, there are still some areas that are highly relevant but have not received better attention, such as colleges and students. Therefore, to develop the sustainable development of innovation and entrepreneurship, it is vital to pay attention to the development of business, entrepreneurship, technology, and timely development of entrepreneurship, innovation, education, and colleges and students should also pay more attention.

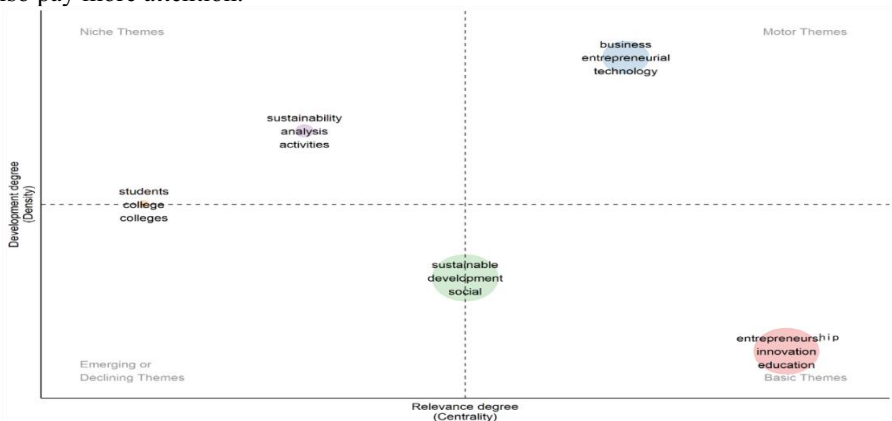


Fig. 5. Strategic Coordinate Map

4 Conclusion

This text analyzes the relevant literature on sustainable development and innovation and entrepreneurship. Among the countries around the world, China's research achievements are outstanding; The main publication sources are widely distributed and comprehensive; Topics such as sustainable development, business, and entrepreneurship are relatively important and receive higher attention. In addition, scholars focus on strategy, management, performance, business, etc.

In summary, in the constantly changing state of the world, the research on innovation and entrepreneurship, and sustainable development has attracted more and more attention from scholars all over the world. For enterprises, if they want to create the sustainable development of innovation and entrepreneurship, they can start with the strategy, adjust the management system of the enterprise, and update the product design and performance. For society, in order to develop the sustainable development of innovation and entrepreneurship, it is important to focus on the development of business, entrepreneurship, technology, timely development of entrepreneurs, innovation, and education, and increase the attention of universities and students; Starting with sustainable

development, we will develop together with key factors such as entrepreneurship, innovation, and business models.

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