

Challenges and Opportunities for Women's Success in Entering Green Economy-Based Businesses: A Systematic Literature Review

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Abstract: This study aims to analyze the challenges and opportunities for women entrepreneurs to enter green businesses successfully. Moreover, to synthesize and review research on the green entrepreneurship topic in terms of theory, theme, methodology, and research setting. This study used a systematic literature review method based on the SPAR-4-SLR. The analysis is bibliometric and content analysis with Publish or Perish software as a database and VOSviewer software. A total of 31 articles were reviewed. The study shows that opportunities and challenges in entering the green economy come from both internal and external environments. The study identified the dominance of quantitative approaches in previous research and found that the typical research setting is a developing country in Asia. This study can help practitioners and researchers to know the opportunities and challenges in running a green business, thus enabling them to formulate policies, strategies, and guidelines to promote the sustainable development agenda. The selection of the study topic is based on the gap phenomenon, namely the enormous potential of women entrepreneurs in the development of a sustainable economy. This study reveals the trend of green entrepreneur research, ranging from theories, methods, and research settings.

Keywords: challenges, green economy, opportunities, systematic literature review, women entrepreneur.

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INTRODUCTION

From year to year, awareness of environmental issues is increasing (Severo et al., 2021). Diminishing natural resources, high levels of pollution, increasing global warming, and declining biodiversity are driving entrepreneurs to adopt environmentally friendly business practices. The concept of sustainable development is a goal that can be achieved by everyone in the world, whether at the local, national, regional, or international level. A green economy is a form of sustainable development concept. The availability of green products impacts sustainable



development (Yudawisastra et al., 2022). A green economy is defined as an economic activity that, in addition to improving human quality and social welfare, can also significantly reduce environmental risks and ecological scarcity (Geng et al., 2023).

Furthermore, MSMEs as a significant player in the economy, take an essential role in the improvement and development of environmentally friendly businesses. With its large number, almost two-thirds of the economy is run by MSMEs (Purwandani & Michaud, 2021). With this large number, MSMEs have the potential to become the main driver of the implementation of the green economy (Aboelmaged & Hashem, 2019). However, the footprint of green business practices implemented by MSMEs still needs to be higher when compared to large enterprises. However, their collective impact on the economy can exceed that of large enterprises. (Koirala, 2019) defines green MSMEs as MSMEs that seek to contribute to climate, environmental, and biodiversity protection through their products, services, and business practices. Based on this definition, a business process does not only focus on profit but also pays attention to the impact of business activities on the environment and society. Environmentally friendly business practices carried out by MSMEs are classified into three stages, namely 1) eco-adopter, 2) eco-entrepreneur, and 3) eco-innovator (Koirala, 2019). Based on the results of a survey conducted by the United Nations Development Program (UNDP) of the Indonesian Ministry of Cooperatives and SMEs, 95% of MSMEs expressed interest in environmentally friendly business practices. Moreover, women-owned businesses show more substantial interest. In line with the survey, women have stronger attitudes and commitment to the environment than men (Atif et al., 2020; Fallah & Soori, 2023; Hechavarria et al., 2019; Nguyen et al., 2023). Women are recognized as one of the leading players in social welfare and sustainable economic development in the community. Women entrepreneurs are increasingly becoming essential contributors to the level of entrepreneurial activity and economic growth (Chakraborty & Biswal, 2023; Sugiyanto & Wijayanti, 2023). The majority of MSMEs in developing countries, such as Indonesia, are run by women (Sugiyanto et al., 2021; Sugiyanto & Wijayanti, 2023).

Related to the topic of green economy, the majority of previous study uses large companies as research objects (Purwandani & Michaud, 2021). It is very rare for research to discuss the topic of the green economy in MSMEs. It is scarce for research to discuss the topic of the green economy in MSMEs. This research shows that there is a research gap in previous studies, namely the population gap. The population of previous studies related to the green economy is only about large companies. For that, to fill the research gap and according to the research phenomenon in Indonesia about the magnitude of the contribution of women in MSMEs and the nature of women who are more concerned about the environment. This study focuses on the practice of implementing environmentally friendly Businesses in MSMEs, namely in women entrepreneurs. This research is essential as part of the efforts to develop women entrepreneurs in the green economy. For this reason, a literature review is needed that discusses the opportunities and challenges for women entrepreneurs to enter green businesses successfully. The results of this study are significant as a basis for formulating policies and strategies in the development of women entrepreneurs in the field of green economy. By knowing the challenges and opportunities for success of women entrepreneurs entering green business, these entities can prepare strengths and close weaknesses to run environmentally friendly businesses.

The objectives of this study are divided into two, first, to describe the characteristics of previous research related to the implementation of green entrepreneurship or green economy. The descriptions include the year of publication, source publication, research setting, keywords mapping, research methodology, and theory/perspective of previous study. Second, this study aims to answer the question of what are the challenges and opportunities faced by women entrepreneurs to enter a green economy-based business successfully.

METHODS

There are several systematic stages of literature review (Sauer & Seuring, 2023). There are many guidelines on literature reviews, which are often limited to the philosophy of review procedures, protocols, and nomenclature, leading to overlapping reporting (Kraus et al., 2022). This study used a systematic literature review method based on the SPAR-4-SLR (Scientific Procedures and Rationales for Systematic Literature Reviews) protocol (Paul et al., 2021). The SPAR-4-SLR protocol (Figure 1) consists of three stages and six sub-stages that flow sequentially, namely:

- 1) Assembling, which involves (1a) identification and (1b) acquisition of synthesized literature
- 2) Arranging, which involves (2a) organizing and (2b) purification of literary works that are in the process of synthesis and
- 3) Assessing, which includes (3a) evaluating and (3b) reporting the synthesized literature.

Assembling (Identification and Acquisition)

The first protocol in SLR is done by determining the domain and research question. The topic or domain in this research is women's green entrepreneurs. From the domain, we defined two research questions, namely RQ1: What are The Challenges for Women's Success in Entering Green Economy-Based Business; RQ2: What are The Opportunities for Women's Success in Entering Green Economy-Based Business? To acquire relevant articles, we used three steps. The first step used the publish or perish 8 databases. The second step retrieved articles sourced from journals and indexed by Scopus. The third step used five keyword combinations consisting of 1) Green Entrepreneur, 2) performance AND Green Entrepreneur, 3) Women AND Green Entrepreneur, 4) Women AND Green Economy, and 5) Green Entrepreneur AND Success. With the first keyword, 52 articles were obtained; the second keyword obtained 2 articles; the third keyword obtained 4 articles; the fourth keyword obtained 6 articles, while the last keyword did not obtain a single article. So, the total articles obtained at this identification stage amounted to 64 papers.

Arranging (Organization and Purification)

The coding of articles depends on the type of SLR performed. In this study, the SLR methods carried out were descriptive, bibliometric, and content analysis. Based on the type of SLR, articles are organized based on descriptive analysis (trend of publication year, publisher, Journal name, and rank), bibliometric (country-based, methodology-based, theories-based, abstract-based), and content analysis (challenges and opportunities). Next, the purification step was carried out to filter out irrelevant articles. The selection criteria and the number of articles excluded are Duplicate records removed: 9 papers; Records marked as ineligible by automation tools: 8 papers; Not in English: 0 papers; and Non-Relevant Papers or Articles from unrelated disciplines: 16 papers. From this process, 31 articles were included in the evaluation process.

Assessing (Evaluation and Reporting)

The analysis of the selected articles was divided into two parts: descriptive and bibliometric characteristics and content findings. Descriptive and bibliometric characteristics begin with the distribution of articles based on year of publication, source, geographical location (research setting), illustration of keyword linkage with Vos viewer, research methodology, and theory/perspective of the article. Meanwhile, content findings were conducted to find answers to research questions about the challenges and opportunities for women entrepreneurs to enter green economy-based businesses successfully.

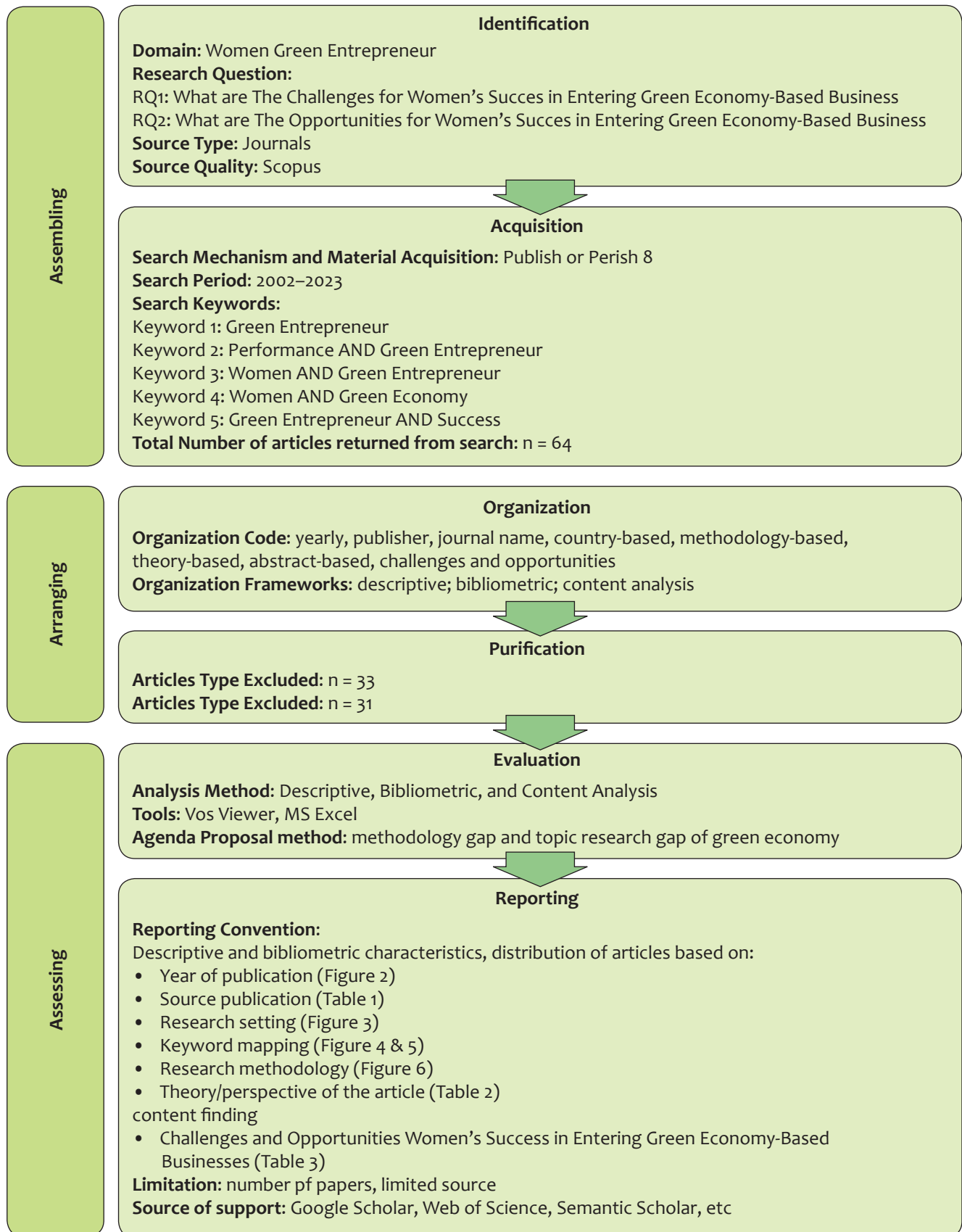


Figure 1 the SPAR-4-SLR Protocol

RESULTS AND DISCUSSION

The findings are presented in two main sections: The first section provides an overview of the characteristics of the article, which includes publication trends, publishers and journals of the articles reviewed, journal rankings, distribution of research settings, network mapping of the literature, research methods used, and theories/perspectives used. Section 2 provides content findings, which are the core of this review, namely the challenges and opportunities for women entrepreneurs entering green economy-based businesses. This research can help practitioners and researchers to know the opportunities and threats in running an environmentally friendly business, thus enabling them to formulate policies, strategies, and guidelines to promote the sustainable development agenda. Besides that, by knowing the challenges and opportunities for success of women entrepreneurs entering green business, these entities can prepare strengths and close weaknesses to run environmentally friendly businesses.

Descriptive Characteristics

The mapping results are shown in Figures 2, 3, 4, 5, 6, and Tables 1 and 2. Figure 2 shows the annual trend of the number of articles published from 2004 to 2023. The main reason for choosing the topic of women entrepreneurs based on the green economy is because the number of published articles related to this topic has an increasing trend from 2018 to 2023 (Figure 2). This shows the fact that women entrepreneurs based on the green economy have received significant attention from the academic community. Women entrepreneurs based on a green economy have been widely discussed in journals covering the fields of business, entrepreneurship management, and innovation. Table 1 shows the publishers and journals with articles published in the selected domain. There are 26 journals with Q1–Q4 rankings from Scimagojr Journal Ranking.

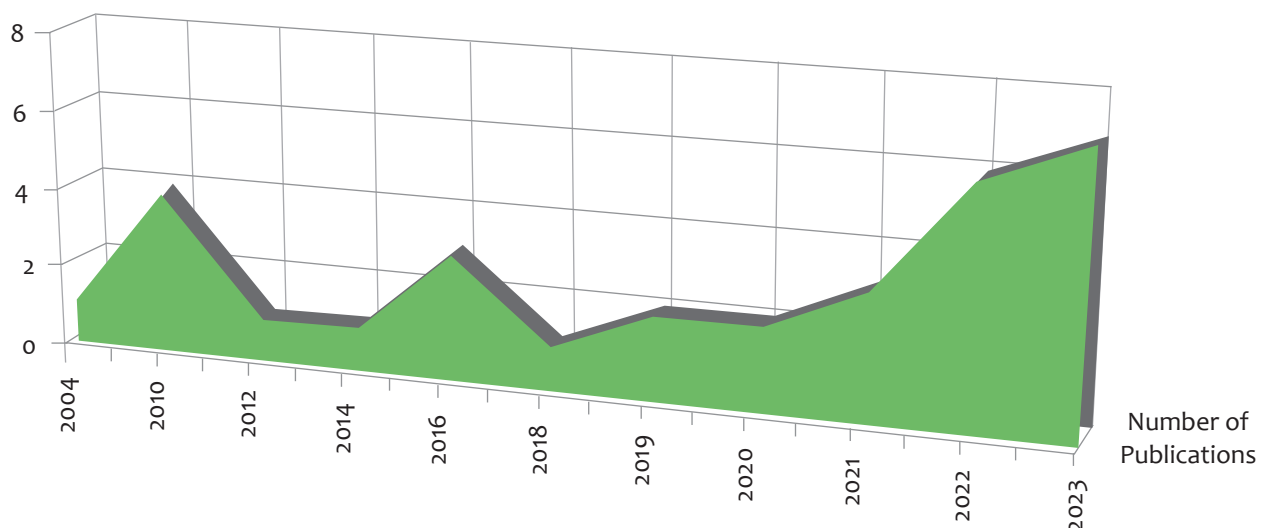


Figure 2 Number of Publication

Table 1 Publisher and Journals with articles published in the selected domain

Publisher	Journal	Rank
AOSIS	Jàmbá - Journal of Disaster Risk Studies	Q2
AOS-Estrategia and Inovacao	Intern. Journal of Profess. Bus. Review.	Q4
Company of Biologists Ltd	Development	Q1
Elsevier	Environmental Innovation and Societal Transitions	Q1
	Journal of Business Research	Q1
	Research Policy	Q1
Emerald	International Journal of Gender and Entrepreneurship (2 articles)	Q1
	Journal of Science and Technology Policy Management	Q2
	Kybernetes	Q2
Inderscience Publishers	Int. J. Business and Globalisation	Q4
	Int. J. Entrepreneurship and Small Business	Q3
	Int. J. Green Economics	Q2
	Int. J. Technological Learning, Innovation, and Development	Q3
John Wiley and Sons Ltd	Sustainable Development	Q1
Multidisciplinary Digital Publishing Institute (MDPI)	Agriculture	Q2
	Journal of Open Innovation: Technology, Market, and Complexity	Q1
	Sustainability (2 articles)	Q1
Routledge	Journal of Environmental Policy & Planning	Q1
	Journal of Food Products Marketing	Q2
Sage Publications India Pvt. Ltd	The Journal of Entrepreneurship	Q2
Springer	Environment, Development and Sustainability	Q1
	International Entrepreneurship and Management Journal	Q1
	The Annals of Regional Science	Q2
Taylor and Francis Ltd.	Economic Research-Ekonomska Istraživanja	Q2
	Environmental Claims Journal	Q3
ZRC SAZU, Založba ZRC	TRADITIONES	Q3
Lain-Lain	Entrepreneurship and Sustainability Issues	N/A
	International Journal of Entrepreneurial Behavior & Research (2 articles)	N/A

Figure 3 shows the research settings. The majority of research on the topic of women entrepreneurs based on green economy or green entrepreneurship was conducted in Asia (32%), followed by continental European countries (29%). In Asia itself, this research is primarily conducted in China and India, then Bangladesh, Malaysia, Pakistan, Iran, and Saudi Arabia. In the European setting, research was conducted in Croatia, France, Israel, Poland, Romania, Russia, Turkey, and the UK. In addition, research was also conducted in America, Australia, Egypt, South Africa and Zambia. Several studies use more than one country (multi-country) as a research site.

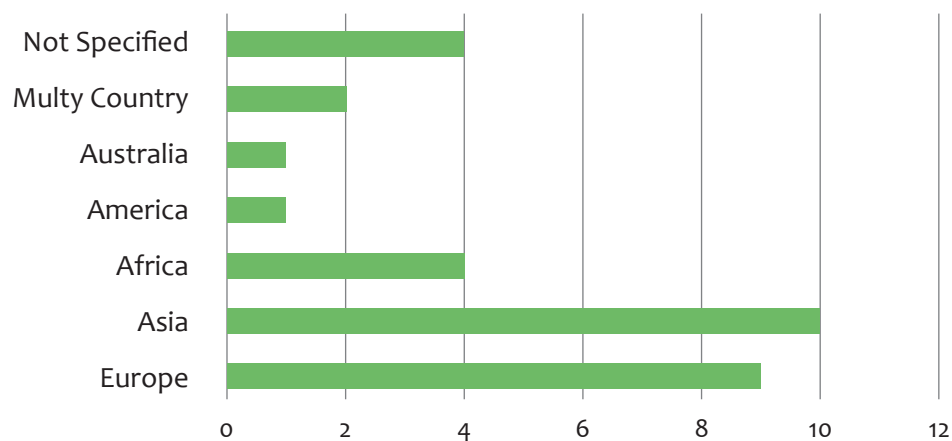


Figure3 Distributions of Research Setting

Figures 4 and 5 show graphical illustrations of the keywords in the empirical articles studied. The keywords fall into 12 clusters consisting of 89 items. High density is shown by clusters with purple, blue, yellow, and green colours. The density indicates themes that are frequently researched. The themes that are not visible in the illustration indicate topics or items that have yet to be researched much. These items include green entrepreneur attitude, environmental policy, green venture capital, green dynamic bedding, local economic impact, multiple synergies, ecopreneurship, green start-ups, environmental management, institutional factors, environmental regulations, transformative entrepreneurship, social entrepreneurship, and entrepreneurship cognitions. These items can be an opportunity for future research topics in green entrepreneurship. Figure 5 corroborates the results of the analysis in Figure 4. The yellow and even red colours in the figure indicate a high level of density. The more blurred colours in Figure 5 indicate that the theme still needs to be researched empirically.

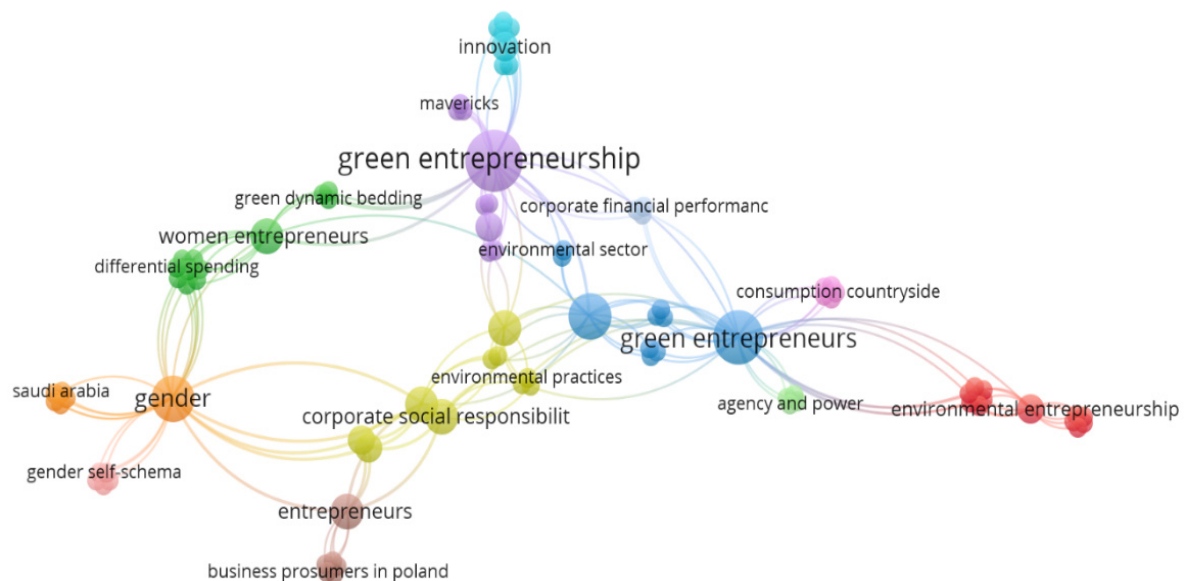


Figure 4 Network mapping of the literature

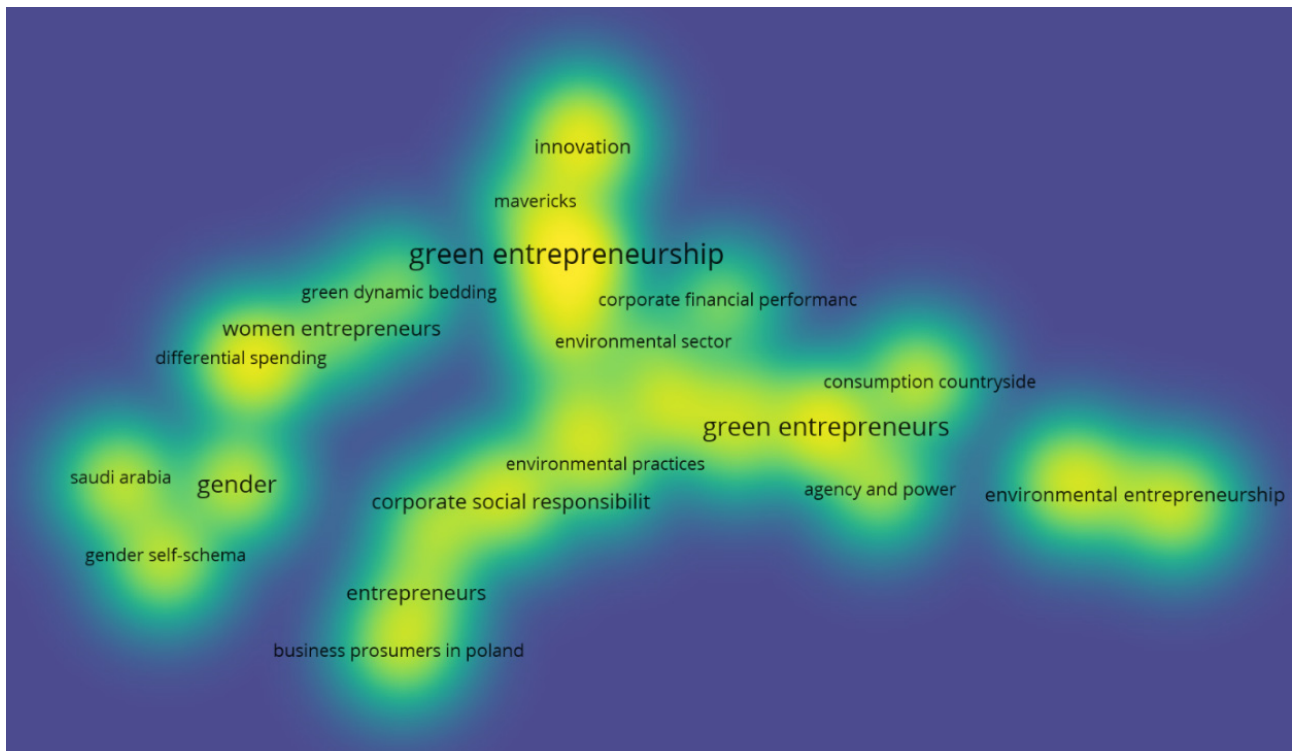


Figure 5 Density Map Visualization

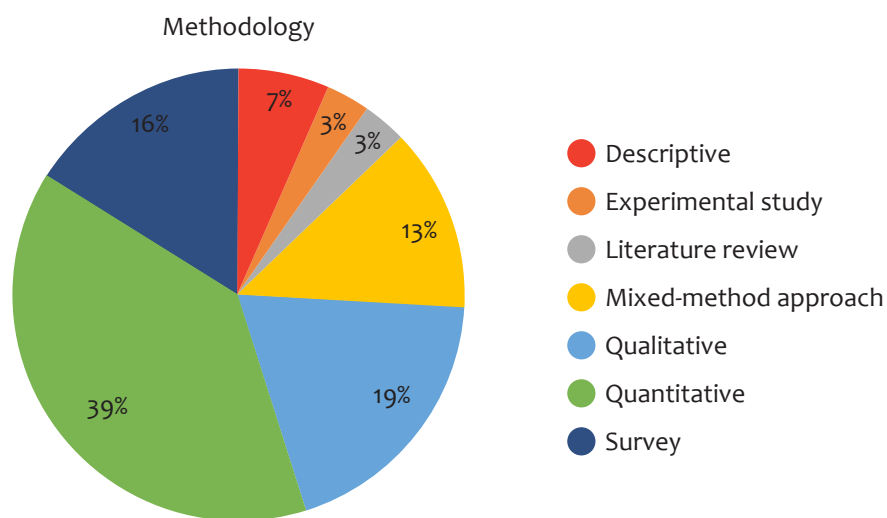


Figure 6 Research Methodology

The majority of articles reviewed used quantitative methods (39%), while qualitative methods as much as 19%, survey methods 16%, mixed methods as much as 13%, descriptive research 7%, literature review, and experimental studies, each as much as 3%. Figure 6 shows the number of articles reviewed based on research methods; it is clear that researchers focus on research on the topic of green economy-based women entrepreneurs using quantitative methods. The majority of studies used quantitative methods to examine the factors that influence the development of green entrepreneurs.

Table 2 Theories/Perspectives in Green Entrepreneurs

Field	Relevant Studies	Theoretical approach/perspective and description
Green Entrepreneurship; Transformative Entrepreneurship	(Kirby & El-Kaffass, 2022)	Stakeholder theory Describes how the company can best engage with its stakeholders and create value for each other (Freeman & Elms, 2023).
Intrinsic Motivations, Female Entrepreneurship	(Nguyen et al., 2023)	Social Feminist Theory Gender is a significant social construct that influences behaviour and decision-making in society (Allen et al., 2022; Martin & Mason, 2022). In the context of entrepreneurship, social feminism has been adopted to examine the behaviour of businesses run by women and men. Women entrepreneurs are less growth-oriented as they seek different outcomes than those expected by men. Women entrepreneurs tend to prioritize sustainable growth and rapid expansion and are more likely to focus on building solid relationships with customers, employees, and communities. Women entrepreneurs have a motherly nature as a social role, paying more attention to the surrounding environment by aiming to generate harmony and form congruent relationships with stakeholders (Audretsch et al., 2022; Brush et al., 2022; Hechavarria et al., 2019). Women entrepreneurs engage in more substantial green practices as a means to perform and achieve their gender roles. Whereas in performing their gender role, male entrepreneurs tend to pay attention to economic indicators such as growth and profitability (Orser & Elliott, 2022), so that fewer resources are invested in environmental matters.
Entrepreneurs' Background, Green Entrepreneurship, Corporate Financial Performance	(Chen et al., 2023)	Social Capital Theory Social capital is a person's ability to benefit from their social relationships, including relatives, friends, classmates, etc (Tóth et al., 2022). Social capital consists of resources shared by people within a social structure and is formed through the accumulation of resources in human social relationships, such as power, fame, and wealth. Entrepreneurs with different background characteristics participate in social relations to form social capital and gather resources and information needed for business development (Laksmana et al., 2023).
Extrinsic pressures, Female entrepreneurship, Entrepreneurial governance	(Cojoianu et al., 2020; Friedman & Rosen, 2022; Le Loarne Lemaire et al., 2022; Nguyen et al., 2023)	Institutional Theory Institutional theory offers a valuable framework for understanding how influential external factors affect entrepreneurial behavior. An institutional perspective provides a valuable framework for understanding how gender influences entrepreneurship and highlights the complex interplay between social norms, institutional pressures, and individual identity in shaping entrepreneurial behaviour. Institutional fit is particularly relevant for women entrepreneurs who face structural barriers due to social norms (Abdelwahed et al., 2023), given that entrepreneurship is traditionally seen as a male domain (Martiarena, 2022). Therefore, women who enter this domain need to negotiate their identity as a member of the group (Discua Cruz et al., 2022). While, compliance with regulations, norms, and standards, such as going green, can increase legitimacy and provide in-group identity for women entrepreneurs. The institutional environment can encourage and facilitate green actions and practices.

Green Human Resource Management, Innovation Capacities, Competitive Advantage	(Gharbi et al., 2022; Nikolaou et al., 2018; Sun et al., 2022)	Resource-Based View (RBV) Theory If the organization's resources become depreciated, obsolete, or quickly imitated, then the competitive position, as well as the profits that are usually allocated, will be lost (Helfat et al., 2023). For RBV, the uniqueness of HR is emphasized and inherent in the knowledge, abilities, experience, and behaviour of the organization. HR remains one of the most critical organizational resources and is difficult to replicate. Green Human Resource Management (GHRM) significantly predicts employees' environmental behaviour. A good set of GHRM practices can advance the creativity and innovative behaviour of environmentally friendly individuals (Chaudhary, 2020).
Environmental Concern, Green Innovation, Green Entrepreneurial Intention	(Friedman & Rosen, 2022; Polas et al., 2023; Zabelina et al., 2023)	Theory of Planned Behavior This theory predicts an individual's intention to engage in a behaviour at a particular time and place. A vital component of the model is behavioural intention; the behavioural intention is influenced by attitudes about the likelihood that the behaviour will produce the expected outcome and subjective evaluations of the risks and benefits of that outcome (Hagger et al., 2022). According to these theory, intention is the best predictor of planned behaviour. Entrepreneurial intention is the best predictor of entrepreneurial behaviour (Al-Mamary & Alraja, 2022; Syed et al., 2020).
Green Entrepreneurship, Sustainable, Entrepreneurship, Entrepreneurial Cognition	(Le Loarne Lemaire et al., 2022)	Social Norms Theory Social norms refer to the effect that the opinions of others significant to a person (family, friends, and peers) have on a person's desired behavior (Germon et al., 2019). Social norms influence one's intention to undertake sustainable entrepreneurship.
Entrepreneurial Governance, Sociotechnical Transition, Environmental Entrepreneurship	(Friedman & Rosen, 2022; Zabelina et al., 2023)	Social Cognitive Theory This theory views entrepreneurial passion as an emotional preference that inspires an individual to devote time and energy to entrepreneurship. Passion predicts entrepreneurial attitudes and causes individuals to engage in entrepreneurial behaviour (Newman et al., 2021).
Entrepreneurial Passion, Green Entrepreneurial Intention, Entrepreneurial Knowledge, Environmental Consciousness	(Friedman & Rosen, 2022)	Job Insecurity Theory Job insecurity forces one to look for alternatives to maintain their financial position. This case may force one to engage in entrepreneurial activities instead of seeking a new job.

Many studies have explored the theories and factors that influence the success of women entrepreneurs in entering green economy-based businesses. A literature review of 31 articles shows that the theories and perspectives used in this study are rooted in three categories: behavioural theory, social theory, and organizational theory. The behavioural theory used is the Theory of Planned Behavior. Businesses, through the application of science or something new and valuable, can operate more efficiently and impact performance improvement (Samosir et al., 2023). In other words, green behaviour can lead to improved business performance. Meanwhile, the social theory used consists of Social Feminist Theory, Social Capital Theory, Social Capital Theory, Social Norms Theory, and Social Cognitive Theory. Organizational theories used in previous studies include Stakeholder theory, Institutional Theory, Resource-Based View (RBV) Theory, and Job Insecurity Theory.

Content Findings

Challenges for Women's Success in Entering Green Economy-Based Businesses

Micro, small, and medium enterprises in general, and women entrepreneurs in particular, face several obstacles that make it difficult and slow them down to enter into environmentally friendly business practices (Rajkamal et al., 2022). These obstacles include the low knowledge and skills of MSMEs. The lack of knowledge and skills required inhibits entrepreneurs from entering green businesses (Rajkamal et al., 2022). The lack of knowledge and skills is due to the lack of education and training in green economy development. It also needs to improve awareness among entrepreneurs. Both producers and consumers have yet to realize the benefits of green business practices. This activity has resulted in low participation of companies in green management practices. Therefore, it is difficult for entrepreneurs to see a clear link between the implementation of an environmental management system and its benefits (Bresciani et al., 2023). Over time, this challenge will become an opportunity. Green economy practices in business, such as green products, green branding, and green advertising, will increase consumer trust and ultimately increase purchasing decisions for green products (Genoveva & Darmawan, 2023).

MSMEs stated that entering into a green economy-based business is a long, expensive, and intimidating process (Rajkamal et al., 2022). Lack of support from external stakeholders, such as the government, business partners in the supply chain, and customers, is a barrier for small and medium enterprises to adopt environmentally friendly practices. MSMEs generally only rely on technologies that are already available in the market. In contrast, large companies can support green technology innovation through research and development. Due to the high cost of technological innovation, MSMEs cannot afford to use environmentally friendly technologies (Setyaningrum et al., 2023). The culture of doing business traditionally and the fear of taking the risk of green innovation also cause people to be less committed to green practices (Rajkamal et al., 2022).

The majority of companies that have specialized environmental management system certification are large companies with strong financial support (Dasanayaka et al., 2022). Difficult-to-obtain bank financing is also a financial obstacle in entering green business (Su et al., 2022; Wu et al., 2023). Savings or loans from relatives fund most MSME businesses. For women themselves, access to financial resources and loans is often more difficult due to a lack of collateral and limited financial knowledge (Wu et al., 2023).

The main difficulty for MSMEs to comply with green practices is in terms of resources, acquisition of equipment, and expertise related to the field (Papademetriou et al., 2023). The limited domestic market is also one of the obstacles for green entrepreneurs. Consumers are not yet aware of and interested in environmentally friendly products. Entrepreneurs find it difficult to obtain information about their business or similar local businesses. Lack of investment in green infrastructure also adversely affects green business development (Kadaba et al., 2022; Zhang et al., 2022).

Furthermore, the study (Al-Qahtani et al., 2022) states that women's participation in green business will be limited despite opportunities due to low access to information communication technology infrastructure, low levels of education and skills, and financial constraints.

Patriarchal culture is a challenge in itself because women always face the challenge of being excluded from decision-making (Al-Qahtani et al., 2022; Mashapure et al., 2022). In addition to facing similar challenges to male entrepreneurs, women entrepreneurs also face additional challenges that need to be considered. Women entrepreneurs must be able to create and run a business in a patriarchal social environment while managing the dilemma of work/home conflicts that have no solution (Kogut & Mejri, 2022). Culture restricts women in business; some women's businesses are run under the supervision of husbands, fathers, or brothers, and strict

restrictions are placed on their activities (Tereshina, 2023). The threat of discrimination and stereotypes has led to women being undervalued in business interactions (Kaciak & Memili, 2023).

Opportunities for Women's Success in Entering Green Economy-Based Businesses

Businesses need to be made aware of the many benefits of choosing green practices, such as taxes, reduced waste treatment costs, pollution, easy bank credit, and grants that can be obtained from the government (Rajkamal et al., 2022). Green entrepreneurship has many economic benefits, including innovation, competitive advantage, loyalty, customer satisfaction, and reduced waste and pollution (Momayez et al., 2023; Skordoulis et al., 2022). The benefits of green business are categorized into two: internal and external benefits (Purwandani & Michaud, 2021). Internal benefits are divided into 3, namely 1) organizational benefits (improved working conditions and safety), 2) financial benefits (reduced waste management costs), and 3) human benefits (improved ethical behaviour of employees). External benefits are also divided into 3, namely 1) trade benefits (gaining a competitive advantage in the market), 2) environmental benefits (reduced pollution), and 3) communication benefits (creation of a positive public image). Environmentally friendly practices have been shown to contribute directly to a company's financial benefits (Broccardo & Zicari, 2020; Topleva & Prokopov, 2020).

Environmental conservation efforts have created new opportunities in business competition by adding value to business activities and processes. Environmentally friendly products offer opportunities for innovation and differentiation of products and services (Rajkamal et al., 2022). In addition, the development of a sustainable supply chain can start with a positive attitude towards environmental sustainability. This positive attitude is influenced by those who care about the environment. As a result, this attitude will be contagious among the parties involved along the supply chain to adopt innovative, environmentally friendly practices. The positive attitude of the company reflected in corporate sustainability performance can bring customer attraction (Obioha & Klingelhöfer, 2023)

The number of MSMEs dominated by women is an opportunity for environmentally friendly practices. Because according to several studies, women have stronger attitudes and commitment to the environment than men, and women are known as one of the main actors in social welfare and economic development in the community (Atif et al., 2020; Fallah & Soori, 2023; Hechavarria et al., 2019). The challenges and opportunities for women entrepreneurs to successfully enter green economy-based businesses can be seen in Table 3.

Table 3 Challenges and Opportunities for Women Entrepreneurs Based on a Green Economy

Results Findings	Relevant Studies
Challenges	
Financial constraints	(Chen et al., 2023; Fallah & Soori, 2023; Kirby & El-Kaffass, 2022; Le Loarne Lemaire et al., 2022; Nguyen et al., 2023; Puđak & Bokan, 2020; Rajkamal et al., 2022; Zabelina et al., 2023)
Lack of education and training related to the green economy (Low education and skills)	
High costs	
Long decision-making process	
Difficulty in aligning green practices in business operations	
Low external partnerships and stakeholder engagement	
Low government support	
Difficulty finding markets and customers	

Knowledge and information barriers	
Space and market availability	
Labor issues	
Marketing challenges	
Technology barriers	
Social and cultural behavior	
Need for innovation and creativity	
Difficulty in obtaining the necessary equipment, resources, and expertise	
Lack of awareness among producers and consumers about the benefits of green practices	
Lack of environmental management system certification	
Employee resistance to change	
Limited access to Information and Communication Technology infrastructure	
Lack of access to and control over resources	
Lack of investment in infrastructure	
Limited domestic market	
Patriarchy culture	
Homework conflict	
The threat of discrimination and stereotyping	
Opportunities	
Creation of new products and services	(Cojoianu et al., 2020; Fallah & Soori, 2023; Friedman & Rosen, 2022; Gharbi et al., 2022; Maniu et al., 2021; Möller & Herm, 2021; Nikolaou et al., 2018; Polas et al., 2023; Rajkamal et al., 2022; Sun et al., 2022)
Development of sustainable supply chains	
Playing an important role in the transition to a greener economy	
Creation of green jobs	
Reduced operational costs related to energy consumption and waste management.	
Enhanced brand image and reputation as an environmentally responsible company.	
Attraction and retention of employees who want to work in a green organization.	
Access to potential customers and new markets that prefer green products/services.	
Reduced environmental impact, improved ecosystem health, and increased sustainability.	
Regulatory compliance and improved relationships with stakeholders such as suppliers, customers, and shareholders.	
Large number and potential of women MSMEs	
A feminist trait that is more concerned with environmental sustainability	

CONCLUSION

The findings of this study have several practical implications for both businesses and the government. For MSMEs that will start a green economy-based business, they can start with low-cost strategies, such as recycling materials or reducing environmental pollution. For the government, promoting green entrepreneurship requires well-organized initiatives. This implication can be achieved through education, training, awareness raising, and policy making. The findings provide a framework and practical environment for government and decision-makers to implement solutions, such as tax breaks and low-interest loans.

In addition, this study also provides academic implications related to the direction of future research. Future research can make comparisons between the challenges and opportunities experienced by large companies and MSMEs in entering environmentally friendly businesses. Based on the results of the literature review, it is explained that the majority of previous studies used quantitative methods. For this reason, future research can use longitudinal studies to look at the development of green entrepreneurs over time, thus providing broad insights into the evolution of green companies and the factors that contribute to their success or failure. This study also presents several topics related to green entrepreneurs or green economy that are rarely or not widely studied by previous research, such as green entrepreneur attitude, environmental policy, green venture capital, green dynamic bedding, local economic impact, multiple synergies, ecopreneurship, green start-ups, environmental management, institutional factors, environmental regulations, transformative entrepreneurship, social entrepreneurship, and entrepreneurship cognitions.

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