

Internationalizing SMEs with Hexa Helix Strategy

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ABSTRACT : Small, and Medium Enterprises (MSMEs) play a crucial role in the Indonesian economy. As the majority of business units in Indonesia, SMEs serve as the backbone of the national economy by significantly contributing to job creation and increasing people's income. However, despite their significant contribution to the economy, the export contribution from SMEs is still relatively low. This indicates that the competitiveness of SMEs in the international market needs to be enhanced. The main challenge faced by SMEs in exporting is the lack of competitiveness in the international market. Efforts to enhance the competitiveness of SMEs in the context of internationalization are therefore crucial. One approach that can be taken is through collaboration with various stakeholders or across sectors with the concept of Hexa Helix. The Hexa Helix concept provides a strong foundation for supporting the internationalization of SMEs among universities, businesses, government, communities, media, and stakeholders such as tourists. It is hoped this concept will not only strengthen the SMEs ecosystem but also have the potential to increase the competitiveness and contribution of SMEs to the global economy. Cross-sector collaboration can provide comprehensive support for SMEs, ranging from access to resources and knowledge to capacity building and product promotion in international markets. Through cross-sector collaboration, SMEs are expected to gain the guidance and support needed to enhance product quality, meet international standards, and develop effective marketing strategies. Additionally, this collaboration helps SMEs expand their business networks and gain access to new markets abroad. Thus, joint efforts to support SMEs in exporting to international markets are strategic steps in strengthening the contribution of SMEs to national economic growth and enhancing Indonesia's competitiveness in the global market.

KEYWORDS –Competitiveness, Export, Internationalization, Hexa Helix, SMEs

I. INTRODUCTION

The role of Small, and Medium Enterprises (SMEs) in the Indonesian national economy is crucial, especially considering that SMEs contribute 99% of the total business units in the country. This underscores the dominance and significant contribution of SMEs in creating job opportunities, driving innovation, and reducing poverty in Indonesia. According to data from the Ministry of Cooperatives and SMEs (2021), SMEs not only serve as the backbone of the Indonesian economy but also act as drivers of inclusive economic growth. The existence of SMEs has proven capable of addressing economic issues in Indonesia in various circumstances (Kadeni, 2020). Moreover, SMEs played a significant role in advancing the economy following the monetary crisis in 1997 in Indonesia (Coordinating Ministry for Economic Affairs of the Republic of Indonesia, 2022). Sarfiah, et al. (2019) state that SMEs are considered economic heroes who rescued the nation's economy from decline. SMEs also have significant potential in improving the economic welfare of communities, especially in rural areas and on the outskirts of cities. Additionally, SMEs play a crucial role in strengthening the country's economic resilience against global market fluctuations by offering business diversification and higher flexibility in facing economic challenges (Sarfiah, 2019).

In addition to being the majority in terms of the number of business units, SMEs also play a significant role in absorbing labor in Indonesia, reaching approximately 97% of the total workforce. Data published by the Coordinating Ministry for Economic Affairs (2022) asserts that SMEs are not only the main drivers of economic growth but also significant providers of employment opportunities for the Indonesian population. Research by the Central Statistics Agency (BPS) also notes that SMEs contribute the majority of employment in the non-agricultural sector, both in urban and rural areas (BPS, 2020). Thus, the important role of SMEs in absorbing labor is key to strengthening economic resilience and enhancing social welfare in Indonesia.

Not only serving as the main pillar in creating employment opportunities, SMEs also make a substantial contribution to Indonesia's Gross Domestic Product (GDP), reaching approximately 60%. This data indicates that SMEs play a crucial role in supporting overall economic growth in the country. The Coordinating Ministry for Economic Affairs of the Republic of Indonesia (2021) states that the SME sector provides a

significant contribution to national economic growth, especially through value-added creation and domestic resource absorption. Furthermore, studies by the Central Statistics Agency (BPS) highlight that SMEs consistently contribute the majority of Indonesia's GDP growth, emphasizing their important role in strengthening the country's economic foundation (BPS, 2020). Therefore, supporting and strengthening SMEs is a vital strategy for the Indonesian government in achieving inclusive and sustainable economic growth.

Despite playing a significant role in the domestic economy, the export contribution from SMEs remains relatively low, at only about 15.65%, where SMEs in Indonesia are still in the incubation stage of the business development process (Ardiyanti, et al., 2023). Factors contributing to this include limited access to global markets, lack of capacity to meet international standards, and challenges in complex export processes. A study by the International Trade Centre (ITC) indicates that the majority of MSMEs in Indonesia have not fully utilized available export opportunities, both due to resource constraints and limited knowledge of the export process (ITC, 2020). Additionally, inadequate access to adequate infrastructure and lack of support in international marketing are also significant constraints. Therefore, greater efforts are needed from the government, relevant institutions, and the private sector to provide the necessary support and training to SMEs to expand their export markets and enhance their contribution to the national economy.

The low contribution of exports from SMEs reflects the low competitiveness of SMEs in the international market. Rahman, et al. (2020) investigated factors influencing the competitiveness of SMEs in export markets, highlighting challenges in meeting required quality and safety standards. Additionally, Suryani & Susanto (2019) showed that SMEs in Indonesia face constraints in developing their exports, including inadequate infrastructure support and market access. On the other hand, Setiawan (2021) emphasizes the need to enhance the capacity and quality of SME products in an effort to improve their competitiveness in the international market. Thus, the low export contribution indicates real challenges faced by SMEs in competing in the global market, highlighting the necessity for SME internationalization.

To address this, multi-stakeholder cooperation is required as more than 18 ministries and institutions are involved in SME affairs in Indonesia (Masduki, 2020). The involvement of various entities indicates the complexity and diversity of aspects related to support for SMEs and strengthens the argument for cross-sector collaboration. According to Haryanto (2020), cooperation among various parties can reduce policy overlaps and accelerate the implementation of programs that support SMEs. Additionally, Wulandari (2019) highlights that multi-stakeholder cooperation can also enhance the efficiency of resource utilization and expand the reach of services for SMEs. This is reinforced by Government Regulation Number 29 of 2018 concerning Industry Empowerment, which emphasizes cooperation between the government and various parties including educational institutions, research and development institutions, industry associations, and related professional associations. Thus, cross-sector cooperation becomes key in strengthening the SME ecosystem in Indonesia.

One form of cross-sector cooperation is known as the Helix concept. The Helix concept is based on the idea that innovation is an interactive result involving various actors, each contributing according to their institutional functions in society (Praswati, 2017:690). To date, there have been many studies on the triple helix [Sulastrri, et.al (2022); Aryuniasari, 2023], quadruple helix (Ministry of Industry, 2018), pentahelix (Sudiana, 2020), and hexa helix. The implementation of the quadruple helix in the creative industries in Indonesia has been shown to enhance industry performance, characterized by a high level of business creativity supported by strong interactions among government, universities, companies, and society, thus generating innovation in the creation of superior new products and services (Smith, 2017). This study, however, will focus more on discussing the hexa helix as a form of cross-sector cooperation that will support the internationalization of SMEs.

II. HEXA HELIX CONCEPT

To enhance competitiveness in the global market, MSMEs require innovation. In relation to the helix concept, innovation is the result of interactions among universities, industry, government, and other actors within society. Etzkowitz and Leydesdorff (2000) emphasize the importance of cross-sector collaboration in creating innovation, thereby supporting the development of the helix concept. This aligns with Carayannis and Campbell (2009), who depict how the helix concept becomes a relevant framework for understanding the dynamics of innovation in a global context.

Etzkowitz and Leydesdorff introduced the triple helix model (Praswati, 2017) with three interacting actors: the industry responsible for innovation creation, universities responsible for knowledge, and the government as a collaborator. Subsequently, Carayannis and Campbell (2009) developed the Quadruple Helix, emphasizing the importance of government policies and practices, universities, industry, and civil society interacting intelligently, effectively, and efficiently. In parallel, the Quadruple Helix concept was developed by maintaining the interaction from the Triple Helix environment by adding the role of civil society (Yawsom, 2009). This concept is often abbreviated as ABCG, with C representing Community. Academia and companies provide the necessary conditions for an integrated innovation ecosystem. The government provides regulatory

frameworks and financial support for defining and implementing innovation strategies and policies. Civil society not only uses and applies knowledge and demands innovation in the form of goods and services but also actively participates in the innovation system. Information and communication technology (ICT) works as a supporting factor for bottom-up civil society participation (Praswati, 2017).

Meanwhile, the Penta Helix is built upon and developed from the two previous models, namely the triple helix, and then the quadruple helix by adding mass media (Calzada, 2016). This concept is known as ABCGM, with M representing mass media (Halibas et.al, 2017). Collaboration among these 5 (five) stakeholders is expected to realize a policy supported by diverse resources that interact synergistically (Luh & Dewi, 2019). The penta helix model is highly useful for solving multi-stakeholder issues where stakeholders represent various interests in one location (Lindmark et al., 2009). The Hexa Helix is a development from the Penta Helix with the addition of tourists (Hendriyana et.al, 2020), thus abbreviated as ABCGMT with T representing tourists.

III. THE ROLE OF HEXA HELIX FOR SMEs INTERNALIZATION

The importance of the Hexa Helix concept in the internationalization of SMEs lies in the complexity of cross-sector interactions required to support this process. Through broad involvement from universities, industry, government, civil society, media, as well as the natural environment, the Hexa Helix concept enables the integration of various resources and knowledge needed to facilitate the expansion of SMEs into global markets.

This is reinforced by Carayannis, E. G. et al. (2012), who emphasize the importance of cross-sector collaboration in supporting innovation and the international growth of SMEs, aligning with Makkonen, H. et al. (2014), who highlight the importance of including non-traditional actors, such as civil society and media, ineffective strategies for SME internationalization.

3.1. Academic Role

Academics from universities play a distinct role in the internationalization process of SMEs. There are at least three roles for academics or universities, namely providing training to SMEs, applying research findings to SMEs, and mentoring SME actors related to internationalization (Bappenas, 2020; Wahyudono et.al., 2018). The role of universities in this internationalization process has grown larger since the Ministry of Education and Culture launched the *Merdeka Belajar - Kampus Merdeka* (MBKM) policy in 2020. The core of this policy is to provide students with the freedom to learn 20 credits per semester (one semester) outside their study program within their university environment and 40 credits per semester (two semesters) outside the university. There are eight forms of learning, three of which are related to the topic of discussion here: entrepreneurial activities, internships or work placements, and research [17]. This policy applies to undergraduate and diploma students, except in the field of health which requires specific competencies and practice venues.

If the MBKM program runs smoothly, it will greatly support the internationalization of SMEs because of the large number of study programs and students in Indonesia. The Higher Education Database as of early May 2024 shows that the number of study programs in Indonesia is 28,551 spread across 10 groups of scientific fields (Table 1). The largest number of study programs is in the field of education (21.46%), economics ranks fifth (12.08%), and the least is in the field of arts (1.40%). All of these study programs can play a role in the internationalization of SMEs according to their respective specializations. The majority of the study programs here are bachelor's degrees (84.8%), followed by Associate Degree (13.1%), and Diploma (2.0%).

Table 1. Study Programs in Indonesia by area

No.	Study Program	Total	Percentage (%)
1.	Education	6.127	21,46
2.	Engineering	5.106	17,88
3.	Social	4.318	15,12
4.	Health	3.640	12,75
5.	Economics	3.448	12,08
6.	Agriculture	1.862	6,52
7.	Mathematics and Science	1.126	3,94
8.	Religious	1.788	6,26
9.	Humanities	737	2,58

10.	Arts	399	1,40
	Total	28.551	100,00

Sources : Higher Education Database (2024)

The total number of active undergraduate and Diploma Program students in Indonesia as of early May 2024 is 6,028,003, distributed according to fields of study as presented in Table 1. The four fields of study with the highest number of students are education (22.75%), economics (19.02%), social sciences (17.56%), and engineering (16.99%). These four fields of study play a crucial role in the internationalization of SMEs through training activities, application of research findings, and mentoring, especially in the process of adopting innovation and technology.

Table 2. Number of Students by Study Programs

No.	Study Program	Total Students	Percentage (%)
1.	Education	1.371.105	22,75
2.	Engineering	1.146.430	19,02
3.	Social	1.058.304	17,56
4.	Health	1.024.231	16,99
5.	Economics	532.935	8,84
6.	Agriculture	313.169	5,20
7.	Mathematics and Science	205.579	3,41
8.	Religious	196.743	3,26
9.	Humanities	128.944	2,14
10.	Arts	50.563	0,84
	Total	6.028.003	100,00

Sources : Higher Education Database (2024)

Another role of universities in supporting the internationalization process is the MBKM Policy for lecturers through the Decree of the Minister of Education and Culture of the Republic of Indonesia Number 754/P/2020 concerning the Main Performance Indicators of State Higher Education Institutions and Higher Education Service Institutions. Each institution is required to carry out higher education transformation that is in line and harmonious with 8 (eight) main performance indicators expected to impact the improvement of graduate quality, lecturer quality, and curriculum quality (Kepmendikbud, 2020). Two indicators related to lecturers relevant to this topic are lecturers engaging in activities outside the campus and the use of lecturers' work results by the community. Both of these activities can be carried out in the form of training, application of research results, and mentoring to SMEs in the internationalization process.

3.2. Business Role

The business or industrial sector plays a crucial role in the internationalization process of SMEs. The industry acts as one of the key elements collaborating with the government and academia to enhance SMEs' capabilities to participate in international trade. The industry contributes to the internationalization of SMEs by (1) opening international markets for SME products, (2) providing funding for SMEs, and (3) acting as a "mentor" for SMEs in managing and marketing products to international markets (Azman et al., 2021). Collaboration between SMEs and the industry opens up access and networks for SMEs. Leveraging the infrastructure already established by companies will assist SMEs in supporting their business needs. To enter international markets, SMEs need to improve the quality of their products. Therefore, adequate funding is required to enhance the quality and productivity of their businesses. Access to funding is one of the challenges facing SMEs. Collaboration between SMEs and capital-providing industries is crucial in supporting the internationalization process. Empowerment of SMEs conducted by the industry through Corporate Social Responsibility (CSR), including through mentoring programs, plasma programs, management coaching, and various activities for marketing SME products. CSR can also be rolled out by the banking industry to provide ease of access to credit for SME stakeholders.

The industry contributes to the internationalization process through several aspects (Etzkowitz, 2008; Aryuniasari, 2023). Firstly, industries can assist SMEs in developing more competitive product innovations and technologies in the global market. Thus, SMEs can improve product quality and enhance competitiveness in the international market. Secondly, industries can collaborate with SMEs and the government to enhance SMEs' capabilities to participate in international trade. This collaboration can help SMEs access broader resources,

technology, and networks, thereby enhancing their ability to participate in international trade. Thirdly, industries can help SMEs improve their capacity through training, education, and human resource development. This can aid SMEs in enhancing product quality and competitiveness in the global market. Fourthly, industries can assist SMEs in developing broader networks among SMEs, government, academic, and industry. These networks can help SMEs access markets, increase sales, and enhance competitiveness in the global market. Fifthly, industries can help SMEs develop more effective policies to support SMEs in the internationalization process. These policies can assist SMEs in accessing markets, increasing sales, and enhancing competitiveness in the global market.

3.3. Government Role

The Indonesian government continues to strive to facilitate SME products' entry into the international market. This is done through outward operation exports and network operation involving aspects of human resources, finance, as well as industry and market, as summarized in Table 3. Several policies have been implemented by the government such as export-oriented business credit financing, provision of exhibition facilities, design development activities, business actor services, market opportunity information, technical guidance and mentoring, promotion and marketing, as well as export financing, guarantee, and insurance.

Table 3. Indonesian SMEs Internalization Policy

International Activity	Human Resources	Finance	Market and Industry
Inward operation	Un-identified	Un-identified	Un-identified
Outward operation export	Technical and managerial training, certification, technical guidance, and specialized mentoring	Export-oriented business financing, insurance, export guarantees, grants	Export SMEs catalog and directory, machinery grants, market intelligence, potential SMEs selection, SMEs consortium, identification of potential buyers and business matching, encouraging the utilization of e-commerce for international markets, especially ASEAN countries
Network operation	Un-identified	Un-identified	International exhibitions, international expos, international representative offices

Sources :Revindo et al. (2019); Ariyani (2022).

Various government policies need to be implemented carefully, systematically, and sustainably considering that SMEs are more vulnerable to changes in external factors compared to large enterprises. Indirect export through large traders as one component of the hexa helix is a short-term strategy for the internationalization of SMEs. Long-term strategies can be pursued through the development of the hexa helix ecosystem to encourage SME involvement in the Global Value Chain (GVC).

Ariyani (2022) recommends three policies to promote the internationalization of SMEs. Firstly, encouraging active involvement of SMEs in competency development by initiating bottom-up programs. Competency enhancement programs can enhance SMEs' capabilities to enter international markets. Secondly, promoting SME involvement through indirect export. This benefits SMEs that cannot yet export directly but can gradually build their capabilities, especially to meet the quality standards set by large industries. Thirdly, developing an ecosystem that supports SME involvement in the GVC, including enhancing the role of industry clusters with large industries as anchors; fostering collaboration among large industries, SMEs, and academia; providing financial incentives for large companies collaborating with SMEs.

3.4. Community Role

Community plays an essential role in the internationalization process of SMEs. In this context, community can be seen as a source of aspiration and serves as an accelerator in the internationalization process (Alfadri, 2023). Thus, community contributes to the internationalization of SMEs by fostering broader networks and cooperation, as well as enhancing SMEs' capabilities to participate in international trade.

In the context of Indonesian culture, SMEs collaborate with the community by combining strengths, forming communities to strengthen each other against competitors. Collaboration between SMEs and the

community plays a role in (1) planning, management, decision-making, and evaluation of SMEs, (2) exploring and preserving culture, and (3) fostering communication, management, and innovation of SMEs (Dhewanto et al., 2021).

3.5. Media Role

The mass media plays a crucial role in the internationalization process of SMEs. In several studies (Putra, 2019; Sari et al., 2019) mass media is seen as an effective partner in showcasing the potential of SMEs and assisting them in enhancing visibility to consumers. Mass media not only provides information but also serves as a facilitator in building brand image and expanding market reach. Thus, mass media aids SMEs in gaining broader exposure and increasing consumer appeal. Additionally, mass media can serve as an educational tool for the public, improving understanding of the importance of supporting SMEs in the economic ecosystem.

Media plays a role in providing information on SMEs and tourism, conducting promotions for SMEs and tourism, implementing mechanisms for checks and balances among actors/stakeholders in SME and tourism activities, and facilitating the development of entrepreneurial marketing media (Putra, 2019). The government plays a role in enhancing the effectiveness of media in achieving the primary goal of internationalization, which is to enhance the competitiveness of SMEs in the international market (SME Observatory Survey Summary European Commission, 2007).

3.6. Tourist Role

The role of tourists as elements in the Hexa Helix concept presents significant potential in supporting the internationalization of SMEs. As purchasers of SME products, tourists play a crucial role in creating market demand for local products in tourist destinations. By purchasing products from SMEs, tourists not only support the local economy but also promote cultural diversity and local products in the global market. Smith (2017) states that tourists often seek authentic and unique experiences during their travels, one of which is the experience of purchasing local products from SMEs. Additionally, tourists can provide valuable feedback to SME owners, whether it be regarding product quality or the services provided. Kolar & Zabkar (2010) also emphasize the importance of tourist feedback as a valuable source of information for SMEs to make improvements and enhance the quality of their products.

In addition to being purchasers of SME products, tourists can also provide positive recommendations to relevant parties, namely SME owners or managers and the government, for improving product quality and services. Through the feedback provided, SMEs can refine their products according to the preferences and expectations of international tourists, thereby enhancing competitiveness in the global market. Furthermore, tourists can serve as brand ambassadors for the local products they purchase, promoting these products to their friends and family upon returning to their home countries. Backman & Crompton (2010) state that positive recommendations from tourists have a significant impact on introducing and popularizing local products in international markets. Thus, the role of tourists as purchasers of SME products and quality advisors can significantly contribute to supporting the internationalization of SMEs and enhancing the competitiveness of local products in the global market.

The roles of each helix can be seen in the summary provided in the following Table 4.

Table 4. Summary of Hexa Helix Roles

No.	Hexa Helix	Roles
1.	Academic	Providing training for SMEs
		Applying research findings to SMEs
		Mentoring SME actors related to internationalization
2.	Business	Opening international markets for SMEs products
		Conducting transfer knowledge to SMEs
		Being a “Godfather” (Mentor) to SMEs
3.	Government	Increasing the quality of human resources
		Export funding
		Facilitating market and industry
4.	Community	Planning, managing, decision making and evaluating SMEs
		Exploring and preserving SMEs’ product
		Establishing communication, management, and SMEs’ innovation
5.	Media	Providing information for SMEs
		Promoting SMEs product
		Checking and balancing stakeholders in SMEs’ activity
		Facilitating the development of SMEs product marketing
6.	Tourist	Buying SMEs’ products
		Providing positive feedback to stakeholders regarding product quality improvement and other positive aspects

Sources : Summarized from various sources

IV. STAGES OF INTERNATIONALIZATION SMEs

According to Nelly & Krzysztof (2012) and Anderson (1993), there are several internationalization theories with various criteria and classifications as seen in Table 5. Various barriers in the internationalization process faced by SMEs also have an impact on the development of coping strategies.

Table 5. Stages of Internationalization of SMEs

Johanson dan Wiedersheim (1975)	<ol style="list-style-type: none"> 1. No export – import regularly 2. Exporting through agents to neighbouring countries 3. Having overseas sales subsidiaries and conducting sales to more distant countries 4. Producing goods abroad
Bilkey dan Tesar (1977)	<ol style="list-style-type: none"> 1. Management is not interested in export activities 2. Management is interested in tapping into unforeseen markets but does not actively explore the feasibility of engaging in export 3. Management actively explores the feasibility of actively engaging in export 4. The company exports on a trial basis to culturally similar countries 5. The company has become an experienced exporter. 6. Management explores the feasibility of exporting to countries with different cultures (<i>high psychic distance</i>)
Reid (1981)	<ol style="list-style-type: none"> 1. Export awareness: identifying issues, opportunities, and realizing the need. 2. Interest in exporting: motivation, attitudes, beliefs, and expectations about exporting. 3. Export experimentation: limited personal experience in exporting. 4. Export evaluation: assessing the outcomes of export activities. 5. Export acceptance: adopting or rejecting exports
Czinkota (1982)	<ol style="list-style-type: none"> 1. The company is not interested in exporting at all. 2. The company is only slightly interested in exporting. 3. The company is exploring the possibility of exporting. 4. The company exports on a trial basis. 5. The company becomes a small-scale exporter. 6. The company becomes a large-scale exporter.
Cavuşgil (1984)	<ol style="list-style-type: none"> 1. Marketing only sells to the local market. 2. Pre-export: the company seeks various information and evaluates the feasibility of exporting. 3. Experimental: the company starts exporting on a limited basis to countries with close cultural proximity (<i>low psychic distance</i>). 4. Active export: exporting to more new countries, direct marketing, and increasing sales volume. 5. Commitment: management continuously allocates limited company resources to both domestic and foreign markets.
Moini (1995)	<ol style="list-style-type: none"> 1. No export activity 2. Beginning to show interest in export 3. Engaged in exporting 4. Exporting is conducted regularly
Leonidou dan Katsikeas (1996)	<ol style="list-style-type: none"> 1. Company involvement in international activities 2. Initiating international activities by starting exports 3. Further, the company intensifies its international activities

Sources :Nelly& Krzysztof (2012) dan Anderson (1993, 1995)

From Table 5, it can be concluded that the key stage for SMEs to internationalize is when they dare to engage in exports. Several considerations for export include aspects such as production capacity, product quality, compliance with international standards, and the ability to compete in foreign markets. According to Suryani & Susanto (2019), SMEs often face challenges in meeting export requirements, including licensing, trade regulations, and quality standards. Additionally, Rahman, A. et al. (2020) emphasize the need for

increased managerial capacity and global market knowledge for SMEs before they are ready to export. Therefore, SMEs must conduct a comprehensive evaluation of their capabilities and readiness before entering international markets, considering various factors that will affect their export success.

V. SMEs GALLERY IN MALANG REGENCY

SMEs community in Malang Regency is organized under the Forum Komunikasi Pelaku Usaha (FKPU), which is divided into several associations according to business areas. FKPU, in collaboration with the Malang Regency National Crafts Council (Dekranasda), has opened three galleries to promote SME products. In its operational activities, FKPU and Dekranasda collaborate with several universities in Malang to receive technical guidance and managerial training. Additionally, some entrepreneurs, such as souvenir shop owners, also support SMEs by acting as mentors in terms of financing and marketing. The media is also directly involved as a means of promoting and publicizing SME galleries to make them more known to the public. Meanwhile, tourists visiting Malang directly shop at the SME galleries located in the city center.

This collaboration illustrates cross-sectoral cooperation to strengthen the SME ecosystem in Malang Regency, known as the Hexa Helix concept. The hexa helix model built within this structure is as shown in Table 6.

Table 6. Hexa Helix Model for SMEs Gallery

Actor		Role
A - Academic	Universities in Malang	Providing mentoring and managerial training for the operational management of SMEs Gallery
B – Business (Industry)	Owner and Manager of Souvenir Shops	Acting as a mentor in terms of financial and marketing
C – Community	Forum Komunikasi Pelaku Usaha	Building network collaborations with various parties
G - Government	National Crafts Council in Malang Regency	Providing Gallery facilities and collecting SMEs products
M – Media	Online and mass media	Disseminating information and promoting the Gallery and SMEs products
T - Tourist	Tourists visiting Malang	Purchasing and recommending SMEs products

Sources : Adapting from Putra (2018)

VI. CONCLUSION

The challenges in the internationalization of SMEs, especially regarding export, encompass various factors such as the complexity of international trade regulations, requirements for quality standards, and the need for adequate managerial capacity and knowledge of the global market. To address these challenges, alternative solutions include improving SMEs' access to export-related education and training, facilitating access to foreign markets through e-commerce platforms, and forming networks and collaborations between SMEs and relevant stakeholders such as government, industry, and SME support institutions. Additionally, strengthening export-supporting infrastructure, such as efficient logistics and distribution systems, is also key to helping SMEs overcome practical barriers in exporting their products to international markets. Thus, with these efforts, SMEs have the potential to succeed in internationalization and enhance their contribution to national economic growth.

In conclusion, the Hexa Helix concept provides a strong foundation for supporting the internationalization of SMEs by recognizing the importance of cross-sector cooperation between universities, businesses, government, communities, media, and tourists. Through sustained engagement and collaboration among various parties, SMEs can gain better access to resources, knowledge, and international markets, as well as receive support in addressing challenges related to internationalization. Thus, the Hexa Helix concept not only strengthens the SME ecosystem but also has the potential to enhance the competitiveness and contribution of MSMEs to the global economy.

As a recommendation for future research, an analysis of the implementation of the Hexa Helix concept and its impact on the internationalization of SMEs can be conducted. Further research can focus on identifying factors influencing the effectiveness of cross-sector cooperation in supporting SMEs in facing internationalization challenges, as well as exploring innovative strategies to enhance sustainable collaboration among them. Moreover, research involving mapping the potential and needs of SMEs in accessing international markets, as well as identifying specific barriers faced by SMEs in entering the global market, can also provide valuable insights for policymakers and practitioners in designing more effective programs and strategies to

support SME internationalization. Thus, future research in this context can make a significant contribution to strengthening the role of the Hexa Helix in advancing SMEs towards the global market.

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