

Fostering Sustainable Siswapreneurship: Collaborative Strategies from University, Government, and Private Sector Support

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Abstract

Purpose: Malaysia is not an exception when it comes to employability challenges, which are becoming more serious by the year. The cooperation of universities, governments, and private enterprises is critical in supporting the national goal in the growth of entrepreneurship in Malaysia and ensuring the sustainability of entrepreneurial fields. The goal of this study was to identify the role of the triple helix model for siswapreneur development and sustainability.

Design/methodology/approach: The qualitative research method was used in this study. The information was gathered through semi-structured interviews. The interview session included 14 siswapreneurs as a sample. The interview transcripts were coded and analyzed using a thematic analytics approach.

Findings: The study's findings indicate that the involvement and support of universities, government agencies, and private corporations is critical if they are to be successful as entrepreneurs after graduation.

Research limitations/implications: The limitation of this study is that the respondents are only from Universiti Teknologi MARA (UiTM) Melaka Branch.

Practical implications: This finding is expected to serve as a guide for policymakers, specifically the Ministry of Higher Education, in applying the triple helix model to boost siswapreneur development in higher education institutions.

Originality/value: This study presents the important involvement of university, Government agencies and Private corporations in supporting the sustainable siswapreneur.

Keywords: Siswapreneur, University, Government agencies, Private corporation, Sustainable development

Introduction

Malaysia was contending with several pressing employment issues. One significant concern was the fluctuating unemployment rates. Furthermore, the global economy is expected to grow at a slower pace in 2023 (EMR,2022). Malaysian government has implemented several programs to support entrepreneurship as a viable career route. To foster a culture of entrepreneurship among students, colleges and governmental institutions have expanded their emphasis on entrepreneurial courses. The number of jobs in the economic sector increased by 2.4 per cent to record 8,827 thousand jobs in this quarter as compared to the same quarter last year (Q2 2022: 8,619 thousand). Meanwhile, a total of 8,637 thousand jobs were filled, achieving a 97.9 per cent rate of filled jobs, which marked an additional of 210 thousand filled jobs compared to the same quarter of the preceding year (DOSM, 2023). The unemployment rate in Malaysia declined to 3.4% in June 2023 from 3.8% in the same month a year

earlier. The number of unemployed dropped by 7.8% from a year ago to 581.7 thousand, while employment increased by 2.3% to 16.31 million. Meanwhile, the labor force participation rate edged up to 70% from 69.5% in the corresponding month of the previous year. In May, the jobless rate stood at 3.5%. (Tradingeconomics, 2023).

Entrepreneurship has emerged as a valuable pathway for Malaysian students to navigate the challenges of the tough employment market. Entrepreneurship provides an avenue for students to create their own employment opportunities. All university students in Malaysia must undergo a compulsory entrepreneurship course. This is in line with the Malaysia Education Blueprint 2015-2025 (Higher Education), which aims to cultivate an entrepreneurial mindset and a drive to create, rather than to merely seek jobs, among graduates (Iskandar, 2022). Entrepreneurship involves skills like creative thinking, problem-solving, empathy and teamwork. It also encourages students to think creatively, identify gaps, be innovative, as well as collaborate with others (Manmeet, 2022). However, in providing a quality of thinking for innovation, the institution requires to provide a good support for the *siswapreneur*.

Further, the integration of industry and education is highly valued by enterprises, universities, and the government (Hua, Zheng, & Fan, 2022). It shows that, the involvement of triple helix in supporting the successful of development of *siswapreneur* is important. At the same time, the cultivation of innovative talent by enterprises and innovation and entrepreneurship education in universities will now become an obvious trend in the future (Qu, 2021). Entrepreneurial activities in higher education include extracurricular competitions, practical socialization, and other activities, in addition to the entrepreneurship education curriculum set by the school (Cui et al., 2021).

Hence, it is anticipated that the results of this study would add to the existing body of knowledge on *siswapreneurship* in Malaysia and assist policy makers in their attempts to improve the entrepreneurial ecosystem in higher education institutions. This study intends to offer insightful information that can direct future policies and strategies by helping to understand the crucial elements that go into the success of *siswapreneurs* and how well the triple helix model supports their journey. In the end, the study aims to help Malaysia's national objective of promoting entrepreneurship and preserving the longevity of the entrepreneurial sectors there.

Literature Review

Student entrepreneur and government support

Government assistance is critical in encouraging student entrepreneurs to innovate. As Mok (2005) points out, government policies and initiatives aimed at assisting student entrepreneurs have the potential to have a significant impact on the innovation ecosystem. A significant component of government assistance is the provision of financial aid, such as loans and grants, to help student entrepreneurs overcome the financial barriers associated with starting a business. Vach (2023). Rukmana, et al. (2023) claimed that such assistance not only strengthens their entrepreneurial skills, but also exposes them to a variety of perspectives and expertise, fostering innovative thinking.

The support from the government is one of the most important factors in encouraging innovation among as they make their way through the treacherous waters of the business world, student entrepreneurs face a variety of obstacles. Some examples of these difficulties are restricted access to financial resources, a lack of relevant experience, and an absence of established support networks. According to Cueto et al. (2022), one of the main challenges faced by student entrepreneurs is the limited access to financing. This can be attributed to the fact that most students do not have a stable income or collateral to secure loans.

The government can play a vital role in providing financial support and incentives to student entrepreneurs (Bu, Li & Huang, 2023). For instance, they can establish funding programs specifically

targeted at student entrepreneurs, offering them low-interest loans or grants to support their business ventures. Moreover, the government can also invest in entrepreneurship education and training programs to equip student entrepreneurs with the necessary skills and knowledge. By collaborating with educational institutions and industry experts, the government can help bridge the gap between academia and entrepreneurship, providing students with the resources they need to succeed.

Student Entrepreneur and University Support

Student entrepreneurship has become increasingly prevalent in recent years, with numerous success stories emerging from collaborations between student entrepreneurs and universities. Thus, universities play a crucial role in supporting and nurturing student entrepreneurs, providing them with the necessary resources and guidance to turn their ideas into successful ventures (Mars et al. 2008). These success stories highlight the positive impact of university collaboration on student entrepreneurship. For instance, many universities have established incubators or entrepreneurship centers that provide student entrepreneurs with mentorship, networking opportunities, and access to funding (Mars et al. 2008). These resources enable students to develop their ideas, refine their business models, and gain valuable industry experience. In addition, universities often facilitate connections between student entrepreneurs and alumni or industry professionals, creating a supportive ecosystem that fosters innovation and growth (Mars et al. 2008).

Universities play a crucial part in preparing students for the challenges they may encounter in the future by providing an environment that fosters creativity, innovation, and the ability to find solutions to problems (Simamora & Pasaribu, 2023). Second, educational institutions make available to student entrepreneurs a wide variety of services, programmed, and other forms of assistance that are developed expressly for this purpose. These educational establishments work hard to foster an atmosphere that is conducive to the success of student businesses by providing resources such as dedicated entrepreneurship centers, mentorship programmed, and funding opportunities. According to Daniel (2016), developing an entrepreneurial mindset equips students with the necessary skills and attitudes to navigate the challenges of the modern workforce.

An entrepreneurial mindset encourages students to think creatively, take calculated risks, and embrace innovation. Fostering an entrepreneurial mindset among students is essential for their personal and professional development, equipping them with the skills and attitudes necessary to thrive in the ever-evolving landscape of the modern world (Daniel, 2016). Programmes and resources, as stated by Politis, Winborg, and Revell (2012), contribute to the development of entrepreneurial skills and mindsets among students, thereby encouraging creativity, innovation, and a proactive attitude towards business. According to Politis, Winborg, and Revell (2012), universities actively contribute to the expansion and success of student entrepreneurs by providing them with various programmes and resources. This enables students to develop the skills necessary to become future business industry leaders and innovators.

Student Entrepreneur and Private Agency Support

The rise of student entrepreneurship has had a significant impact on the economy. As highlighted by Aransyah, Fourqoniah and Riani (2023), student entrepreneurs are increasingly contributing to economic growth through the development of innovative products and services. These young entrepreneurs bring fresh perspectives and creative ideas to the business world, challenging traditional norms and driving technological advancements. Moreover, student entrepreneurship fosters job creation, as these ventures often require additional staff to support their operations. The employment opportunities generated by student-led startups can help address youth unemployment rates and stimulate economic activity in local communities. Furthermore, student entrepreneurship promotes regional development by encouraging collaboration between academia and industry. Universities have become hubs for entrepreneurship, providing students with resources, mentorship, and networking opportunities. This collaboration not only benefits students but also strengthens the connection between

education and the business sector, leading to knowledge exchange and the commercialization of research findings. In conclusion, the rise of student entrepreneurship has had a profound impact on the economy by driving innovation, creating employment opportunities, and fostering regional development (Aransyah, Fourqoniah & Riani, 2023).

Private agencies play a crucial role in providing resources and mentorship to student entrepreneurs. According to S Zamberi Ahmad (2013) article on Education+ Training, private agencies play a significant role in fostering entrepreneurship education and supporting student entrepreneurs in their journey towards success. These agencies often provide financial resources, such as grants or loans, to help students fund their entrepreneurial ventures. By partnering with private agencies, student entrepreneurs gain access to a network of professionals and industry experts who can support their growth and development. Overall, the involvement of private agencies in providing resources and mentorship to student entrepreneurs is essential for nurturing the next generation of innovative business leaders (Ahmad, 2013).

Student entrepreneurs face numerous challenges in their pursuit of starting and running their own businesses. One key challenge is the lack of financial resources and access to capital. According to Haugh (2005), student entrepreneurs often struggle to secure funding for their ventures due to their limited financial means and lack of business experience. This financial constraint can severely limit their ability to invest in necessary resources, such as equipment, technology, and marketing efforts. However, private agency support can play a crucial role in helping student entrepreneurs overcome these challenges. By providing mentorship, guidance, and networking opportunities, private agencies can help student entrepreneurs navigate the complexities of entrepreneurship and gain valuable industry insights. Moreover, private agencies can also offer financial support through grants, scholarships, or investment opportunities, alleviating the financial burden faced by student entrepreneurs. This support can empower student entrepreneurs to overcome their challenges and transform their innovative ideas into successful ventures. (Haugh 2005).

Theoretical Model

All Helix models are built on the assumption that knowledge and innovation, and their accelerated importance in so-called emerging knowledge and innovation-based ecosystems have the potential to organize, educate, and integrate future societies (König, Suwala, & Delargy, 2021).

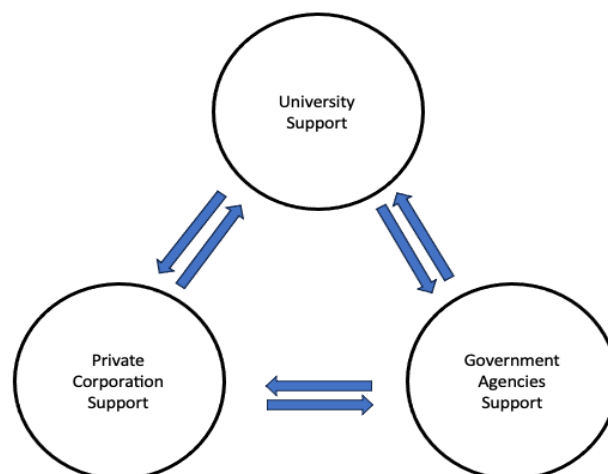


Figure 1: Triple Helix Model

The Triple Helix is a dynamic model in strengthening the engagement between university support, private corporation, and government agencies support. Through this engagement, it will improve the capabilities and competencies of the siswapreneur in their journey in the entrepreneurship. Hence, in

developing a sustainable siswapreneur, the Triple Helix model is important in understanding the strength, opportunities and how each party able to contribute in helping students in entrepreneurship (Zhou, & Etzkowitz, 2021). Hence, the interrelation between university, government, and private corporations in helping the siswapreneur is important for their success and sustainability.

Method

This study utilized a qualitative study which is an exploratory research design. The information was gathered using face to face and semi-structured interviews to get an understanding on what students need for their business to be sustainable. Through the interview session, it allows the researcher to gain the depth information to tackle such a nebulous topic. The population of this study is a student that actively conducts a business and a student that has an experience in doing business. 11 students were chosen as a sample of this study. For this study, the number of interview participants recommended is around 8 to 15 people (Hill et al., 2005). The interviews lasted between 45 and 110 minutes in duration. Data collected thoroughly reviewed using a thematic analysis approach to discover significant themes and patterns connected to the function of the Triple Helix Model in siswapreneur development and sustainability. The interview questions have been modified based on the previous literature and current environment of study.

Findings and Discussions

Table 1 presents the respondent’s profile. Based on respondent profile, the average age of the respondents is between 20 to 26 years old. Gender distributions are almost equal with 5 male and 6 female which indicates equal preferences among the genders of siswapreneurs.

Table 1: Respondent Profile.

Respondent	Age	Gender	Nature of Business	Number of Support Received		
				University	Government	Private
Respondent 1	22	Male	Clothing (modern batik)	1	0	5
Respondent 2	22	Male	Food & beverages	0	0	0
Respondent 3	26	Female	Facemask	1	2	0
Respondent 4	25	Female	Food & beverages	1	0	0
Respondent 5	24	Female	Cloth cosplay	1	0	0
Respondent 6	23	Female	Food & beverages	1	0	0
Respondent 7	24	Female	Food & beverages	1	1	0
Respondent 8	24	Male	Clothing	1	0	0
Respondent 9	21	Female	Clothing	1	0	0
Respondent 10	23	Male	Car detailing	1	0	1
Respondent 11	20	Male	Food & beverages	4	1	0

Most of the business that the respondents involved is focusing on the food and beverage and clothing sector. Majority of the respondents have ever received at least one support from their university, only 3

of them received support from the government while 2 respondents have ever received support from the private corporations in sustaining their business.

Types of support needed by the siswapreneur

Support is an important component for the sustainability of siswapreneur. Table 2 presents the types of support needed by the siswapreneur from the university, government agencies and private corporations. The support has been ranked according to the feedback given by the respondents. The top component with rating 1 in the table represents the most needed support required by the siswapreneurs while the bottom component with rating 7 and 8 is the least needed support.

Table 2: Types of Support Needed by Siswapreneur Rating

University Support		Government Support		Private Corporations Support	
Components	Rating	Components	Rating	Components	Rating
Networking and Mentorship	1	Access to international exposure	1	Sponsorship and funding	1
Funding and Grant	2	Access to funding	2	Mentorship and guidance	2
Entrepreneurship program and courses	3	Network and collaboration platform	3	Collaborating and partnership	3
Intellectual property support	4	Recognition and award	4	Access to network and customer	4
Collaboration opportunities	5	Education and training initiative	5	Recognition and award	5
Incubators and accelerators	6	Business incubation and mentorship program	6	Experiential learning	6
Alumni Network and Partnership	7	Research and development support	7	Expertise and industry insight	7
N/A	N/A	Regulatory Support	8	Business incubator and accelerator	8

Interestingly, the key finding that can be highlighted in this study is that most of the respondents ranked mentorship, guidance and funding as the 1st and 2nd rating from all the university, government, and private corporations (except for 1st ranked in government support). This finding reflects that the most needed support by the siswapreneurs in sustaining their business are **mentorship or guidance** and equally important is the access to funding. Entrepreneurial mentoring is a valuable relationship support between experienced entrepreneurs and novice entrepreneurs that aims to foster personal development (St-Jean & Audet, 2012). This mentoring approach is gaining popularity in entrepreneurship education (Elliott et al., 2017; Hägg and Politis, 2017; St-Jean et al., 2017) and can also serve as a vehicle to empower and inspire disadvantaged group in the public sector workplace (Mcilongo & Strydom 2021). Moreover, entrepreneurs often turn to a diverse range of resources for guidance, which can include seeking advice from professional business consultants, engaging with local chambers of commerce, and participating in networking groups (Kuhn et al., 2017).

According to respondent 2, *“the type of support needed is in terms of mentoring either individually or in groups from experienced mentors. Continuous mentoring is needed to sustain in business.”*

While respondent 11 reported that *“Students need a mentoring system in running a business but do not get access to be involved in the mentoring system”*

Undoubtedly, mentoring and guidance is deemed critical in sustaining the business particularly among siswapreneur as starting and growing a business can be complex and challenging thus having the right mentor or guidance can significantly influence an entrepreneur’s success. It offers entrepreneurs a chance to learn from experienced mentors, avoiding mistakes, navigate challenges more effectively and accelerate their business growth. The insights, advice, emotional support, and networking opportunities provided by mentors will facilitate siswapreneurs in sustaining and expanding the business.

Following comparable importance is **access to funding**. With rare exceptions, money is pivotal to start a business as well as keeping business to sustain. Once profits begin to accumulate, a portion of the revenue can be reinvested in the business to attract more customers and increase financial viability. Sufficient funding will be needed in starting up a business, doing market research and promotion as well as product development. However, as reported by Cueto et al. (2022), a primary obstacle faced by student entrepreneurs revolves around the restricted availability of funding opportunities.

“I initiated my business using my personal funds, supplemented by an investment of approximately RM 6, 000 from my mother, which was used for start-up costs and purchasing equipment.” - Respondent 2.

Thus, students with unstable finances are considered crucial in obtaining financial support from either university, government agencies or private corporations. As supported by Teh and Yong, (2008), funding support from universities is essential for boosting entrepreneurial endeavors in pre-startups and start-ups the business ventures.

As presented in the table, for the university support, the siswapreneur also required **entrepreneurship programs and courses** which ranked as 3rd priority support needed. Respondents might perceive that the role of university which is synonymous to their nature of service is **providing courses**, thus they expect the university should provide an inclusive entrepreneurship program to foster continuous knowledge in running a business. In accordance with the research conducted by Kim & Maritz (2021), which emphasizes the importance of entrepreneurship education (EE) in Malaysia and the entrepreneurship education programs (EEPs) provided by both public and private higher education institutions (HEIs) in the country, it is evident that these educational initiatives play a substantial role in Malaysia's entrepreneurial landscape. Specifically, their study underscores the National Institute of Entrepreneurship's contribution to bolstering the entrepreneurship development ecosystem, fostering collaboration among various government ministries, agencies, and industries, enhancing the skills of entrepreneurs, and preparing them to assume leadership roles and set trends in the market (Kim & Maritz, 2021).

“The University provides programs and training on entrepreneurship, but it is only a one-off program without continuous support. The program also does not focus on the right target group of students.” - Respondent 2

“Training program is needed for social media marketing strategy.” - Respondent 3

Next, from the interview session, the most important support from the government agencies is access to international exposure which is first ranked. Surprisingly, the millennial generations are now looking forward to global exposure in sustaining their business. This might be due to the rapid changes of technology with no boundaries where they can reach out to wider target customers and expand their business globally. This is also supported by gadgets and apps which have mushroomed tremendously in the last decade. The available platforms like Shopee, Tiktok, Amazon.com and many more may

provide additional room and opportunities for businesses to expand and sustain globally. As a result, access to international exposure has become a new expectation among siswapreneurs. Educators and policymakers should actively promote and create opportunities for aspiring entrepreneurs to participate in international and cross-cultural experiences because these experiences have a significant impact on nurturing the essential entrepreneurial skills, offer practical guidance on how to effectively plan and structure such cultural immersions to maximize the lasting entrepreneurial advantages (Pidduck, 2022). Research in entrepreneurship has shown that exposure to different cultures cultivates the motivation to start new businesses, as demonstrated by Dheer and Lenartowicz (2018). Moreover, even short-term experiences abroad have been proven to enhance the ability to identify opportunities, as evidenced by studies conducted by Vandor and Franke (2016).

Lastly, private corporations also play an important role in supporting the siswapreneur and their business sustainability. Based on the findings, other than the importance of mentorship and guidance and sponsorship / funding, the collaborating and partnership is also considered as the important support which is needed by the siswapreneurs (ranked as 3rd priority). This support is expected from the private corporations since they have a broader network for the potential partnership and new customer prospects. The collaborators, partnership and wider networking is critical in sustaining one business in the long run. Conceptually, collaborative conduct is rooted in the presence of synergies, mutual expectations, and enduring trust relationships. In this context, such behavior encourages the adoption of open innovation practices among industries, entrepreneurial universities, and scientific centers, where the contributions and anticipated results of the partners are transparently articulated and mutually understood (Kovacs et al., 2015). In addition to that, entrepreneurial universities and industrial organizations confirm insights regarding a combination of cooperative and opportunistic actions within subsidized partnerships. These efforts primarily lead to an increase in the expenses associated with managing knowledge during the monitoring phases. The prior collaborative agreement foreseen in the partnership anticipated and safeguarded intellectual assets (Guerrero, Herrera & Urbano, 2019).

Siswapreneur Support Model (SSM)

This study analyzes the role of the triple helix model for siswapreneur development and sustainability. The Triple Helix Model is a conceptual framework used to describe the fundamental trends in knowledge-based economies based on the interactions and relationships between three key actors: university, industry, and government (Etzkowitz, 2003). Figure 2 shows the conceptual framework for the model of siswapreneur support which derived from the responses of the respondents. In this study, the top needed support expected from the university, government and the industry or private corporations are mentorship and funding which is believed to help them in sustaining their businesses.

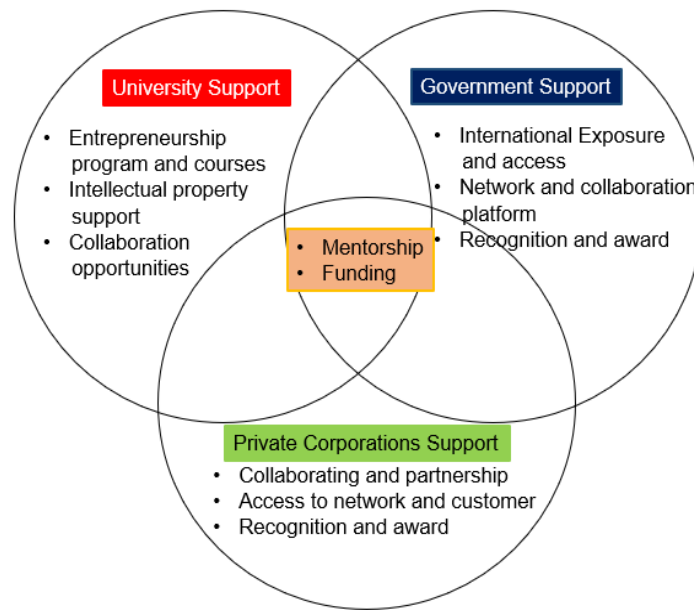


Figure 2: Siswapreneur Support Model (SSM)

They acknowledged a great need for direction and mentorship from knowledgeable people in academia, business, and government who might assist them in overcoming the difficulties of entrepreneurship. Another essential need identified was access to funding such as grants, loans and investments support were all viewed as crucial for growing and scaling their business in the long run. Nonetheless, the siswapreneur also anticipates additional support from each of the key stakeholders, which they have ranked as their highest priorities, as outlined in the following figure.

In addition to the priority support listed in the model, additional support from universities is also anticipated by the respondents including a continuous mentoring program which will be part of the monitoring process in sustaining the business which could be implemented as the apprenticeship program. Besides, respondents expected universities to play a role in providing appropriate platforms for the students to run their business such as entrepreneurship carnival, night market and any program organized in the universities which offered business opportunities. Facilities support in term of storage space, space for cooking or lab in preparing their business is also mentioned by the respondents. In terms of government support, the siswapreneur wished to get special access to run their business such as special rate for the vendor fees and special business spot for siswapreneur during the mega carnival or any impactful program organized by the state. In addition, they also expected to have one to one business coaching from entrepreneurs in private support who come from the similar nature of business that they are currently established.

Conclusion

As a result, the study highlights the critical part that cooperative methods play in promoting long-term entrepreneurship, which was drawn from the viewpoints of student entrepreneurs, emphasizes how crucial it is to have financial support, mentoring, and guidance as foundations of support. These results mark an important aspect for the higher education institution on how to develop entrepreneurial talent in academic settings. Finding of this study present that, it is important for the higher education institution to have a good collaborative between university, private institution, and government agencies to providing a good support in term of mentoring, financial, guidance and the other types of support. It should be a top priority for higher education institutions to establish a mentorship programmed that pair prospective business owners with industrial experts who can assist them in navigating obstacles and seizing opportunities. Encouraging sustainable student in entrepreneurship offers numerous advantages

such as fosters an innovation culture within siswapreneur, knowledge sharing and development program.

Hence, in general, universities, government, and private institutions collectively play pivotal roles in fostering student success in entrepreneurship. Universities provide knowledge, mentorship, and resources through dedicated programs and incubators. Government initiatives offer financial support, regulatory frameworks, and networking opportunities, creating a conducive ecosystem. Private institutions, including investors and corporations, offer funding, industry connections, and practical insights. Together, these entities empower students to develop skills, access capital, and navigate the complexities of entrepreneurship. By nurturing collaboration among academia, government, and private sectors, we fuel the energy needed for students to thrive in their entrepreneurial endeavors, ultimately driving innovation and economic growth.

As for the limitations and future research recommendations, we acknowledge that the limited number of respondents involved in this study may lead to constrained perspectives. With a small sample size, there is a risk that our findings might not fully capture the diversity of siswapreneurs across various age groups, academic disciplines, and backgrounds. Additionally, the constraints of time during the data collection and analysis phases have implications for the comprehensiveness of our findings. The rush to gather and analyze data may have limited our ability to delve deeper into certain aspects of student entrepreneurship and collaborative support strategies. As a suggestion for the future research, researchers should conduct comparative studies across different universities, regions, and countries. Such studies can help examine variations in collaborative support strategies and their impact on student entrepreneurship within diverse contexts. By comparing the effectiveness of strategies in different settings, we can gain deeper insights into what works best and under what conditions.

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