EXPLORING ENTREPRENEURIAL LEADERSHIP STRATEGIES: A COMPREHENSIVE LITERATURE REVIEW FOCUSED ON GENERATION Z IN THE DIGITAL ERA

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ABSTRACT

This study analyzes the entrepreneurial leadership strategies employed by Generation Z to address challenges in the digital era. As the digital business ecosystem evolves, there is an increasing demand for innovative and adaptive leaders who can effectively leverage technology. The research methodology adopts a qualitative approach through a literature review, collecting relevant journal articles and books to identify patterns and relationships within Generation Z's entrepreneurial leadership strategies. Data are analyzed using an analytical framework to determine key themes such as entrepreneurial leadership, Generation Z, and the digital era. Findings indicate that effective entrepreneurial leadership strategies for Generation Z require a comprehensive, flexible, and forward-looking approach. Successful strategies must integrate digital literacy, character education, and relevant entrepreneurship training. This research demonstrates the value of adopting an ideal approach that emphasizes three main aspects: leveraging technology as an operational foundation, fostering collaborative and supportive leadership styles, and promoting personalized human resource development.

Keywords: *Entrepreneurial Leadership; Generation Z; Digital Era; Strategic Leadership*

INTRODUCTION

The advancement of digital technology has significantly influenced and impacted various aspects of life, including entrepreneurship. (Saeedikiya et al., 2024). Technology has transformed many facets of human life, including the ways in which business is conducted and leadership is exercised in the corporate world (Goryunova & Jenkins, 2023). One group that has been profoundly affected by this change is Generation Z (Bucovețchi et al., 2019). Generation Z refers to those born into an environment saturated with digital technology from an early age (Paramaguru et al., 2024). Generation Z possesses unique characteristics when it comes to running businesses and developing entrepreneurial leadership in the digital realm. They are known for their high adaptability to technology, creativity, and skills in utilizing digital platforms for entrepreneurship (Banjanahor & Sari, 2023). However, despite having significant potential within the digital landscape, Generation Z still faces challenges in developing effective leadership strategies to ensure business sustainability and growth in this competitive era (Andari, 2024).

In the context of digital entrepreneurship, leadership plays a crucial role in guiding business vision, making strategic decisions, and managing teams and resources efficiently. Previous studies have shown that although Generation Z possesses high motivation for entrepreneurship, they often face challenges in managing businesses sustainably, dealing with risks, and building strong business networks (Mulia et al., 2025). Therefore, a deeper understanding of leadership strategies that can be applied by young entrepreneurs in the digital era is essential.

Several studies have discussed digital literacy and the role of technology in enhancing entrepreneurial interest among Generation Z (Wulandari et al., 2024). However, research specifically analyzing entrepreneurial leadership strategies of Generation Z remains limited (Banjarnahor & Sari, 2023). Another gap in the literature is the lack of studies connecting leadership models with the unique characteristics of Generation Z. Many existing literatures focus on aspects related to digital business but provide minimal discussion on how entrepreneurial leadership can evolve in alignment with the values, communication styles, and thought patterns of Generation Z (Alfiyyah et al., 2025).

Based on identified issues and research gaps, this study aims to provide comprehensive insights into suitable leadership strategies for Generation Z as they navigate their digital businesses. The findings from this research may also serve as a reference for academics, business practitioners, and educational institutions to understand and develop entrepreneurial leadership models that align with the dynamics of the digital era.

LITERATURE REVIEW

Generation Z Entrepreneurial Characteristics and Leadership Manifestations

Generation Z, born between 1997 and 2012, represents a unique cohort characterized by their digital nativity and entrepreneurial mindset (Goryunova & Jenkins, 2023). Research by Bucovețchi et al. (2019) identifies Generation Z as a key factor for organizational innovation, emphasizing their role as valuable organizational resources due to their strong entrepreneurial orientation. This generation demonstrates distinct leadership preferences shaped by their technological sophistication, career-mindedness, and global environmental awareness (Goryunova & Jenkins, 2023). Paramaguru et al. (2024) explore the constructs, traits, and challenges of Generation Z leadership through the lens of Indian knowledge systems, revealing that this generation enters the workforce with a pre-existing entrepreneurial mindset that influences their leadership development. The

manifestation of entrepreneurial leadership among Generation Z is characterized by several key dimensions: technological proficiency and innovation, social inclusion and self-efficacy, and transformational leadership approaches (Saeedikiya et al., 2024). The digital infrastructure cognitions significantly affect innovation among Generation Z entrepreneurs, as they leverage technology for opportunity identification, risk management, and innovation (Saeedikiya et al., 2024). Furthermore, social inclusion emerges as a significant motivator influencing their entrepreneurial intentions, with this generation seeking to create inclusive environments that boost their self-efficacy and entrepreneurial drive (Burlea-Schiopoiu & Popovici, 2024).

Digital Leadership Competencies and Strategic Approaches

The digital era demands specific leadership competencies that differ from traditional leadership models. Research by Kaiyai et al. (2024) identifies essential digital leadership skills including adaptability, strategic vision, digital literacy, cybersecurity awareness, and innovation capabilities. These competencies are crucial for fostering innovation, driving change, and maintaining competitive advantage in the digital landscape. Yılmaz et al. (2024) examine Generation Z's perspectives on leadership, revealing their preference for people-oriented leadership characterized by supportive, empathetic, and collaborative approaches. This generation emphasizes flexible working conditions, continuous training, and appropriate task assignment to enhance employee satisfaction and productivity. Their leadership style is distinctly different from previous generations, being more purpose-driven, less motivated by monetary rewards, and more effective in utilizing digital communication tools (Dreyer & Stojanová, 2022). The strategic leadership approaches employed by Generation Z entrepreneurs include transformational leadership styles characterized by visionary goals, innovation, and strong follower commitment (Ruiz-Vázquez et al., 2024). This is supported by personality traits such as openness and conscientiousness, which are prevalent among Generation Z individuals and facilitate their transformational leadership capabilities.

Technology's Role in Entrepreneurial Education and Development

The integration of technology in entrepreneurial education has become paramount for Generation Z's development as future leaders. Digital literacy emerges as a fundamental skill encompassing understanding of technology, critical information processing, creativity, and effective communication (Wulandari et al., 2024). Research indicates that individuals with high digital literacy levels demonstrate greater confidence in utilizing technology for entrepreneurial purposes. The power of role models in digital leadership significantly impacts entrepreneurial success, with lead entrepreneurs' digital leadership abilities influencing team performance and overall digital entrepreneurial outcomes (Xia et al., 2023). This suggests that mentorship and role modeling are crucial components in developing Generation Z's entrepreneurial leadership capabilities.

Leadership Strategies in Digital Entrepreneurship

Generation Z's leadership strategies in digital entrepreneurship demonstrate adaptation to volatile, uncertain, complex, and ambiguous (VUCA) business environments. Research by Deepika and Chitranshi (2021) identifies four critical leadership dimensions for Generation Z: entrepreneurial leadership, enabling leadership, operational leadership, and architectural leadership. These dimensions enable effective navigation of dynamic business conditions.

Ethical decision-making and social responsibility constitute critical components of Generation Z leadership approaches. This generation is driven by desires to address societal challenges and implement social change through their leadership roles, integrating environmental sustainability and social justice principles into their strategic decisions (Yela Aránega et al., 2023). The emerging digital ecosystems signal strong transformations in leadership models and styles, indicating the need for new paradigms aligned with digital era requirements (Banerjee et al., 2020). Traditional leadership competency models may be inadequate for preparing future leaders for digital age challenges, necessitating fundamental changes in leadership development approaches

METHOD

This study employs a qualitative approach using literature review methods to analyze the entrepreneurial leadership strategies of Generation Z in the digital era. The literature review methodology was chosen because it allows researchers to explore various previous studies, books, and relevant journal articles to gain a deeper understanding of entrepreneurial leadership concepts as applied by Generation Z in digital business environments (Schiuma et al., 2022). This approach enables comprehensive examination of existing knowledge while identifying patterns, relationships, and gaps in the current literature, making it particularly appropriate for examining emerging phenomena where theoretical framework development is needed (Wang et al., 2023). A literature review approach facilitates the synthesis of diverse theoretical perspectives and empirical findings related to Generation Z's entrepreneurial leadership characteristics and strategies, allowing for the development of comprehensive theoretical frameworks while providing practical insights for various stakeholders in entrepreneurship education and practice (Munsamy et al., 2023).

Data sources for this research were obtained from journal articles, theses, and relevant dissertations that address topics related to Generation Z's entrepreneurial leadership. Data collection techniques were conducted through literature searches and analysis based on academic publications related to entrepreneurial leadership that are relevant to Generation Z. The collected data were analyzed using content analysis methods (Kaiyai et al., 2024) aimed at comparing and synthesizing information from various sources regarding aspects of entrepreneurial leadership pertinent to Generation Z. This analytical approach was selected to enable systematic examination of themes, patterns, and relationships within the existing literature while maintaining methodological rigor. This methodological approach provides a comprehensive foundation for analyzing Generation Z's entrepreneurial leadership strategies while maintaining academic rigor and ensuring reliable, valid findings that contribute meaningfully to the existing body of knowledge in entrepreneurship and leadership studies.

RESULTS AND DISCUSSION

This study aims to delve deeper into how Generation Z, born and raised amidst rapid technological advancements, leverages various aspects of digital change to enhance their leadership and entrepreneurial capabilities. Based on the literature review, several factors contribute to the leadership and entrepreneurship patterns that emerge from this generation. The findings from this research illustrate the uniqueness of Generation Z in addressing challenges while seizing opportunities in an era filled with technological disruption. The following are the results regarding the characteristics, challenges, and

opportunities that Generation Z faces within the context of leadership and entrepreneurship.

Characteristics of Generation Z in Entrepreneurship

Generation Z, born in the digital era, possesses unique characteristics when it comes to viewing the world of entrepreneurship. As a group that has grown up with advanced technology and easily accessible information, they bring new approaches to entrepreneurship. Several important characteristics define this generation, such as creativity, willingness to take risks, and high adaptability to technological changes (Goryunova & Jenkins, 2023). These traits influence how they conduct business in the digital age (Paramaguru et al., 2024). Therefore, it is essential to identify how these characteristics shape their entrepreneurial patterns amid the continuously evolving global economy.

Generation Z is recognized as digital natives who are creative and tend to leverage technology in business (Wulandari et al., 2024). This is evident from their inclination to become content creators, vloggers, and startup founders. Additionally, they possess characteristics such as technological literacy and critical thinking skills, along with high social engagement that directly influences their leadership styles and business strategies.

In line with this perspective, research by Aprilita (2024) adds that Gen Z entrepreneurs have high self-confidence, enabling them to take risks in business without relying on others. They tend to be results-oriented and focus more on measurable achievements while possessing the ability to manage risks effectively through technological support. Furthermore, Gen Z exhibits strong leadership qualities that allow them to utilize digital technology in their businesses while emphasizing originality and creativity factors that distinguish them in the competitive digital landscape (Saeedikiya et al., 2024) .

From a different perspective, Aprillita (2024) emphasizes that Generation Z grows up in an era of rapidly advancing technology with strong values of diversity, equity, and inclusivity. They tend to seek meaning in their work, preferring companies that have a positive social impact and promote flexibility and collaboration within their work environments. They also favor systems that support balance between personal and professional life, with flexible policies regarding remote work and employee well-being. Meanwhile, Febiana et al. (2023) highlight various psychological aspects and the mentality of Generation Z entrepreneurs. They possess a clear understanding of life goals, which allows them to be more focused when establishing their businesses. Additionally, Generation Z is known for its high self-efficacy and confidence in working hard to achieve success amid tight competition (Burlea-Schiopoiu & Popovici, 2024). They demonstrate resilience when facing challenges while being decisive in seeking opportunities for innovation (Deepika & Chitranshi, 2021). Furthermore, they are very open to change and eager to learn continuously especially when dealing with rapid technological advancements (Yılmaz et al., 2024).

Sudaryanto and Sylvana (2024) reinforce the previous viewpoint by providing specific data on the strengths and challenges faced by Generation Z in the entrepreneurial world. They exhibit high scores in thinking freely and their ability to seize opportunities, demonstrating creativity and self-confidence in identifying business prospects. However, they also encounter challenges such as a lack of future aspirations, reflected in lower scores regarding leadership spirit and willingness to take risks both crucial aspects of entrepreneurship (Dreyer & Stojanová, 2022).

Furthermore, Faizal, et al., (2023) highlight how Generation Z adapts more quickly to technology and feels more comfortable communicating through social media compared to face-to-face interactions. They also prefer practical and instant solutions, which is reflected in their business operations using digital platforms such as Instagram, TikTok, and WhatsApp. A concrete example can be seen in businesses like Dani Orchids, which initially operated offline but then evolved with live sale strategies and interactions through social media, illustrating how Generation Z optimizes their digital presence (Fitriani & Mashudi, 2023).

Finally, Mulia et al. (2025) emphasize that Generation Z is digital natives who have been accustomed to technology from an early age and can quickly adapt by using digital tools to enhance their efficiency and productivity in business. Independence and innovation are two of their main characteristics, as they prefer to seek solutions independently and create new opportunities (Xia et al., 2023). Additionally, work flexibility is crucial for them, whether in terms of time management or location, allowing them to leverage various technological platforms in their business operations. They also tend to seek knowledge and feedback as part of their growth process in the entrepreneurial world (Kaiyai et al., 2024).

The Role of Technology in Entrepreneurial Education

In facing the digital era and Industry Revolution 4.0, digital literacy has become an essential skill for Generation Z, particularly in entrepreneurial education (Wulandari et al., 2024). This skill encompasses an understanding of technology, the ability to process information critically, creativity, and effective communication. Individuals with high levels of digital literacy tend to have greater confidence in utilizing technology as a means of entrepreneurship (Kaiyai et al., 2024). Furthermore, research indicates that the use of digital tools in entrepreneurial education positively influences entrepreneurial intentions among Generation Z, although not all aspects of this technological utilization show significant effects (Boutaky et al., 2023).

Furthermore, the use of digital tools in entrepreneurial education can significantly enhance entrepreneurial intentions among Generation Z. A study Wulandari et al. (2024), indicates that the use of technology in entrepreneurial learning positively influences entrepreneurial interest among young people in Europe. However, not all aspects of educational technology have a significant impact on learning outcomes. Moreover, technology plays a significant role in enhancing the efficiency of human resource management in the entrepreneurial world (Gao et al., 2024). With digital systems such as HRMS and performance management tools, various administrative processes can be automated, allowing organizations to focus more on developing skills and careers for Generation Z. Consequently, strategies within the entrepreneurial realm can be designed to be more effective (Aprillita, 2024).

Strong digital literacy skills also significantly contribute to increasing entrepreneurial interest among Generation Z (Wang et al., 2023). Those who are accustomed to the digital world can utilize various platforms to seek information, conduct business, and foster innovation in entrepreneurship (Munsamy et al., 2023). With these skills, they are better equipped to differentiate valid information and access various applications and digital services that support their business growth (Rahmadiane & Harjanti, 2024). As technology continues to evolve, Generation Z must also enhance their digital skills to adapt to market changes (Munsamy et al., 2023). Therefore, entrepreneurial leaders in the digital era need to provide ongoing training that keeps Generation Z competitive in an increasingly digitized business world (Febiana et al.,

2023). On another note, Generation Z is recognized for their adaptability toward technology and has broad access to digital information (Kusanke et al., 2023). This capability allows them to better identify business opportunities and innovate. In practice, they extensively utilize social media platforms such as Instagram and Facebook as well as TikTok for business promotion (Siregar et al., 2025).

The digitization of business has become a topic increasingly discussed in various seminars and webinars (Schiuma et al., 2022). In these forums, participants gain insights into how digital businesses can expand market reach and enhance competitiveness (Megahed, 2022). Additionally, speakers share practical steps for starting a digital business that can be effective for Generation Z entrepreneurs navigating the digital landscape (Genoveva & Srihayu, 2024).

In today's entrepreneurial world, technology and digital marketing play a crucial role. Generation Z, having grown up with the internet and social media, tends to prefer digital platforms as a means of marketing their products (Abbu et al., 2022). Therefore, understanding digital marketing strategies as well as the legal aspects and permissions required for sustainable business operations becomes essential (Fikriando et al., 2024).

Moreover, digital literacy also contributes to enhancing self-confidence among Generation Z entrepreneurs (Maheshwari & Yadav, 2020). They increasingly recognize that technology is a vital tool in conducting business especially in leveraging social media for marketing purposes and e-commerce strategies (Banjarnahor & Sari, 2023). Additionally, education about entrepreneurship in the digital realm helps them grasp fundamental concepts such as business analysis and utilizing digital platforms to improve operational efficiency (Pace, 2012).

However, alongside technological mastery, character education also plays an equally important role in the realm of digital entrepreneurship (Gwala, 2023). Values such as accountability, discipline, and critical thinking serve as fundamental foundations for making ethical and sustainable business decisions (Yela Aránega et al., 2023). With strong character education, Generation Z not only becomes financially successful entrepreneurs but also possesses good business ethics and the ability to adapt to challenges in the digital world (Alfiyyah et al., 2025). Entrepreneurial education in the digital era must focus on developing a balance between technological proficiency and character formation (Ngah et al., 2020). By optimally utilizing technology along with strong ethical values, Generation Z can become innovative leaders who are adaptable and capable of facing challenges in the digital business landscape.

Factors Influencing Generation Z's Entrepreneurial Interest

Generation Z's entrepreneurial interest is influenced by a complex interplay of interrelated factors that form a distinctive entrepreneurial mindset and behavior pattern (Saeedikiya et al., 2024). Studies from various sources show that digital literacy, entrepreneurial mental attitude, entrepreneurial education, individual character and lifestyle and career preferences are the dominant factors that encourage Generation Z to enter the business world (Burlea-Schiopoiu & Popovici, 2024; Paramaguru et al., 2024).

First, digital literacy is an important foundation in fostering entrepreneurial interest (Wulandari et al., 2024). Generation Z who grew up with technological developments have the ability to access, utilize and create opportunities through digital media (Goryunova & Jenkins, 2023). Emphasizing that digital literacy not only supports the use of technology, but also expands market reach and business strategies (Xia et al., 2023). This is reinforced by Lesinskis' findings, which prove that digital-based entrepreneurship education in Europe is able to increase motivation and entrepreneurial

readiness among the younger generation. Thus, digital literacy is not only a technical factor, but also affects the psychological and motivational aspects of entrepreneurship (Wulandari et al., 2024).

Furthermore, entrepreneurial mental attitudes such as confidence, courage to take risks and the drive to innovate also have a strong relationship with digital literacy (Ruiz-Vázquez et al., 2024). Individuals with high digital literacy tend to have greater confidence to start a business (Kaiyai et al., 2024). The findings show that courage and motivation are important drivers in starting a business, adding that courage in facing business risks often comes from exposure to technology and extensive access to information. This shows that digital literacy and entrepreneurial mental attitudes reinforce each other (Andari, 2024; Fikriando et al., 2024).

Entrepreneurship education functions as a critical mediator between entrepreneurial attitudes and practical implementation skills (Widodo et al., 2024). Research demonstrates that involvement in entrepreneurship training and learning programs strengthens Generation Z's readiness to face business challenges by fostering critical thinking and problem-solving capabilities essential for modern entrepreneurial competence (Fitriani & Mashudi, 2023).

Meanwhile, individual characters such as independence, fighting power and mental toughness reinforce the previous factors (Mulia et al., 2025). Meylani (2024) stating that this character underlies success in running an independent business. This is in line with the finding that curiosity and perseverance drive individuals to continue learning and adapting to digital developments. This strong character is also the link between entrepreneurship education and real implementation in the business world (Mulia et al., 2025). Furthermore, the lifestyle and life values of Generation Z are sociological dimensions that complement their internal motivations. Generation Z prefers freedom and flexibility to conventional. This is in line with opinions that highlight the importance of work-life balance as the main preference of Generation Z in choosing a career path (Siregar et al., 2025). Generation Z's utilization of social media and technology as promotional and operational tools demonstrates how their digital lifestyle has evolved into a strategic entrepreneurial advantage. Their consumptive and creative lifestyle patterns create new market opportunities that they can capitalize on independently, establishing a cyclical relationship between lifestyle preferences and business opportunities (Alfiyyah et al., 2025).

Finally, career preferences that are inclined towards entrepreneurship show that Generation Z sees the business world as a place for self-actualization (Reginald et al., 2024). Entrepreneurship is viewed as a pathway to realize personal potential while achieving financial success, with flexibility and growth opportunities serving as primary motivational drivers (Rahmadiane & Harjanti, 2024). The desire for independence and personal success creation is driving Generation Z away from traditional work systems toward entrepreneurial ventures that allow for greater autonomy and creative expression (Febiana et al., 2023).

Challenges Faced by Generation Z in Entrepreneurship

Generation Z encounters multifaceted challenges in their entrepreneurial endeavors that span psychological, educational, resource-related, and market dynamics dimensions. Understanding these challenges is crucial for developing comprehensive support systems that enable this generation to realize their entrepreneurial potential effectively. One of the primary psychological challenges facing Generation Z entrepreneurs is the phenomenon of FOMO (Fear of Missing Out), where constant connectivity pressures and

social media engagement can negatively impact focus and consistency in business development (Irawaty & Wicaksono, 2024). This psychological pressure is compounded by their strong desire to balance work and leisure while maintaining meaningful professional engagement, creating internal tensions that can affect entrepreneurial performance.

Generation Z's search for meaning and purpose in their work often collides with the stressful realities of entrepreneurial ventures, creating psychological tensions that must be carefully managed (Yılmaz et al., 2024). Lack of practical experience represents a crucial challenge for Generation Z entrepreneurs (Aprilita, 2024). Research indicates that inadequate experience, poor planning, and mental unpreparedness constitute primary causes of entrepreneurial failure among this generation. This experiential deficit is particularly pronounced in areas such as business management fundamentals, accounting practices, and strategic planning implementation. The gap between theoretical knowledge and practical application presents significant obstacles for Generation Z entrepreneurs (Widodo et al., 2024). Although entrepreneurship education enhances their conceptual understanding, many still struggle to translate knowledge into real-world business applications. This challenge is exacerbated by the rapid pace of technological change, which requires continuous adaptation and learning beyond traditional educational frameworks. Permana et al. (2024) highlight that many Generation Z individuals lack comprehensive understanding of management fundamentals, accounting principles, and business strategy implementation, necessitating more intensive applied training programs. The majority of Generation Z entrepreneurs require structured guidance and graduated experience-building opportunities to develop solid business foundations (Mulia et al., 2025).

Resource constraints present substantial challenges for Generation Z entrepreneurs, particularly in terms of capital access and infrastructure availability (Fitriani & Mashudi, 2023). Limited access to formal entrepreneurial literacy programs and financial resources creates barriers that disproportionately affect young entrepreneurs who may lack established networks and credit histories. The reliance on external support systems and digital trends creates vulnerabilities, as trend fluctuations demand constant adaptation and resource reallocation (Kusuma Siregar et al., 2025). This dependency on external factors can create instability in business planning and long-term strategic development, particularly for entrepreneurs operating in rapidly changing digital markets.

The rapidly evolving digital marketplace presents unique challenges for Generation Z entrepreneurs (Reginald et al., 2024). Changing job market values and global economic conditions demand continuous adaptation and strategic flexibility that can overwhelm young entrepreneurs lacking extensive business experience. Digital platform dependency creates vulnerability to algorithm changes, policy modifications, and platform instability that can significantly impact business operations (Banjarnahor & Sari, 2023). This technological dependence, while providing opportunities, also creates risks that require sophisticated risk management strategies and backup planning. The need for new leadership models aligned with digital era requirements presents challenges for Generation Z entrepreneurs who must navigate between traditional business practices and emerging digital paradigms (Banerjee & Uma Maheshvari, 2020). The speed of innovation acceleration requires leaders to move quickly and pivot organizations faster, necessitating skills and experience that may not be readily available to young entrepreneurs.

Leadership Strategies in Digital Entrepreneurship

Generation Z faces significant challenges in developing strong leadership capabilities and maintaining clear future vision (Sudaryanto & Sylvana, 2024). Research reveals relatively low scores on future aspirations and leadership spirit indicators, suggesting reduced confidence in risk-taking and venture leadership among some members of this generation. The need for social and emotional skill development, including communication and teamwork capabilities that form the foundation of effective leadership, represents a critical challenge area (Faizal et al., 2023). These interpersonal competencies are essential for building and managing teams, establishing business relationships, and creating organizational cultures that support sustainable growth.

Leadership readiness in VUCA (volatile, uncertain, complex, ambiguous) business environments requires specific competencies including entrepreneurial leadership, enabling leadership, operational leadership, and architectural leadership capabilities (Deepika & Chitranshi, 2021). Developing these multifaceted leadership competencies while simultaneously managing business operations presents significant challenges for young entrepreneurs. The integration of comprehensive entrepreneurship curricula in educational institutions remains inadequate, leaving students without essential preparation for entrepreneurial ventures (Fikriando et al., 2024). Traditional educational approaches often fail to address the practical skills and contemporary challenges that Generation Z entrepreneurs will encounter in digital business environments.

The need for interactive learning methods, workshops, and follow-up guidance programs highlights deficiencies in current educational support systems (Genoveva & Srihayu, 2024). Generation Z entrepreneurs require more engaging, practical, and technology-integrated learning experiences that align with their digital-native learning preferences and entrepreneurial aspirations. Educational reform focusing on entrepreneurship preparation emerges as essential for addressing the preparation gap that leaves Generation Z entrepreneurs technically and mentally unprepared for business challenges. The disconnect between academic learning and practical business application continues to create obstacles for young entrepreneurs entering competitive markets

CONCLUSION AND SUGGESTION

Based on various studies, it can be concluded that the characteristics of Generation Z in the world of entrepreneurship are greatly influenced by their digital background. As digital natives, Gen Z shows excellence in creativity, technological adaptability, courage to take risks and confidence to lead and innovate independently. They have a strong orientation on results, the values of inclusivity and flexibility of work and utilize social media and digital platforms as the main means of running a business. On the other hand, despite showing great potential in thinking freely and recognizing opportunities, some of them still face challenges in terms of long-term aspirations, the courage to take higher risks as well as consistency in leadership. Therefore, an effective entrepreneurial leadership strategy for Gen Z in the digital age must be able to accommodate these unique characteristics—with an adaptive, collaborative and technology-based approach, while allowing space for the development of more vision, creativity and leadership.

Technology plays a central role in the education and entrepreneurial development of Generation Z in the digital age. High digital literacy allows Gen Z to be more confident, adaptive and innovative in running a digital-based business. Technology is not only a tool in entrepreneurial learning, but also the main medium in carrying out business strategies, digital marketing, and efficient human resource management. In

addition, the digital skills that Gen Z possesses strengthen their leadership capacity in the fast-paced and digitized world of business. However, mastery of technology must be balanced with the formation of strong entrepreneurial character and ethics so that their leadership can develop sustainably. Therefore, entrepreneurial leadership strategies for Gen Z must integrate digital literacy, technological innovation and character education as the foundation in producing adaptive, ethical and visionary entrepreneurial leaders in the digital era.

Generation Z's interest in entrepreneurship is formed through a combination of digital literacy factors, entrepreneurial mental attitudes, entrepreneurial education, individual character and lifestyle and career preferences. Digital literacy is the main foundation in shaping Gen Z's confidence and creativity in creating and managing technology-based businesses. An entrepreneurial mental attitude characterized by the courage to take risks, confidence and a spirit of innovation strengthens the drive to be entrepreneurial. Entrepreneurship education acts as a link between practical skills and entrepreneurial mental attitudes, while individual characters such as perseverance and independence are internal factors that strengthen their readiness to face the challenges of the business world. Digital lifestyles and flexible career preferences show that entrepreneurship is seen as a means of self-actualization as well as a path to financial independence. Therefore, Gen Z's entrepreneurial leadership strategy in the digital era must be able to accommodate these factors in an integrative manner, in order to be able to produce young leaders who are adaptive, visionary and innovative growth oriented in the digital ecosystem.

Generation Z faces complex entrepreneurial challenges, including psychological pressures such as FOMO and the search for meaning in life, limited practical experience, gaps between theory and practice, lack of access to resources and the ever-changing dynamics of the digital market. Weaknesses in future vision, leadership and social-emotional skills are also obstacles in forming strong leadership. On the other hand, entrepreneurship education that is not fully applicable exacerbates Gen Z's unpreparedness in facing business reality. Therefore, Gen Z's entrepreneurial leadership strategy in the digital age must include strengthening mental resilience, improving practical experience, relevant and contextual training and building adaptive capacity to technological and market changes. Successful Gen Z leaders are those who are able to navigate these challenges with flexibility, resilience and a clear long-term vision.

Generation Z's entrepreneurial leadership strategy in the digital era must be holistic, encompassing technology mastery, interpersonal skills and future orientation. Effective leadership for Gen Z doesn't just rely on innovation and digitalization, but it also emphasizes an adaptive, collaborative, inclusive and supportive approach. This approach is realized through the use of coaching, virtual collaboration, and personalization of career paths and innovation spaces. The strategy reflects the need for leaders who are able to form a flexible work culture, support continuous learning and be oriented towards business sustainability. Thus, Gen Z's leadership in digital entrepreneurship should ideally be built on three main pillars: technology adaptation, coaching-based and collaboration-based leadership, and personal and sustainable human resource development. This approach is expected to strengthen the competitiveness of Gen Z as resilient and visionary entrepreneurs in the midst of an ever-growing digital transformation.

From some of the explanations above, it can be concluded that Generation Z's entrepreneurial leadership strategy in the digital era demands a holistic, adaptive and future-oriented approach. Gen Z, as a digital native generation, has great potential in

creativity, innovation and mastery of technology, but also faces challenges in terms of mental resilience, vision consistency and social-emotional skills. Therefore, an effective leadership strategy must be able to integrate digital literacy, character education and contextual entrepreneurship training. The ideal leadership approach for Gen Z emphasizes three key pillars: technology mastery and digitalization as the operational foundation; coaching, collaboration and inclusivity-based leadership to support individual engagement and growth; and personalization of human resource development oriented towards sustainability and balance of work values. With this strategy, it is hoped that young Gen Z leaders will be born who are not only technologically literate, but also resilient, visionary and able to lead change in a dynamic digital entrepreneurship ecosystem.

Therefore, the next research is recommended to examine the implementation of Gen Z leadership strategies in a real context, for example through case studies or direct observation on digital startups led by Gen Z. In addition, in-depth research on the influence of gender differences, educational background, or geographical region on Gen Z's leadership style can also be an interesting focus and enrich the digital entrepreneurship literature.

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