

Huawei's Operational Strategy in the Changing International Landscape

Yuzhen Cai^{1,a,*}

¹*School of Management, Clark University, Worcester MA 01610, USA*

a. Yuzcai@clarku.edu

**corresponding author*

Abstract: This paper examines Huawei's shift in business strategy in a changing international environment. Huawei's influence extends beyond the technology industry, as it plays a significant role in global political and trade relations, particularly between the United States and China. The changing international landscape has had a significant impact on Huawei, mainly in terms of trade restrictions, market access limitations, and supply chain disruptions. This paper uses a multidimensional framework to comprehensively understand Huawei's business strategy shifts in response to changes in the international environment. The framework integrates all aspects of the company's operational strategy to enable a comprehensive analysis of the company's strategic decisions and outcomes, which provides a comprehensive view of Huawei's operational strategy shifts in a changing international landscape. The paper also conducts a SWOT analysis of Huawei's business strategy, identifying Huawei's core competencies, weaknesses, opportunities, and threats. Finally, the paper offers recommendations for Huawei to mitigate the impact of geopolitical tensions, diversify its products and services, and focus on the domestic market.

Keywords: Huawei, SWOT, changing international landscape, international business

1. Introduction

In recent years, the global business environment has undergone significant shifts, driven by factors such as technological advancements, political tensions, and economic fluctuations. As a prominent player in the telecommunications and information technology sectors, Huawei has had to adapt its business strategy to remain competitive and resilient in this dynamic landscape.

A key element of the changing international situation is the escalating geopolitical tensions between the United States and China, which has resulted in a series of trade restrictions and bans on Huawei's products in numerous Western countries. These restrictions are largely due to security concerns surrounding the company's alleged ties to the Chinese government, further exacerbated by the growing importance of cybersecurity in the digital era. As the global race for 5G dominance intensifies, Huawei finds itself caught in the crossfire, forcing the company to reassess its global expansion plans.

In addition to political challenges, Huawei is also confronted with a rapidly evolving technological landscape, where emerging innovations such as artificial intelligence, the Internet of Things, and edge computing are transforming industries and creating new market opportunities. To maintain its competitive edge, Huawei has had to diversify its product offerings and expand its research and

development capabilities. This has led to increased investments in areas like cloud computing, consumer electronics, and enterprise solutions, with the aim of reducing reliance on its traditional core business.

The global economic climate has also played a role in shaping Huawei's strategy, as the company faces fluctuating exchange rates, tightening regulations, and wavering consumer demand. Furthermore, the COVID-19 pandemic has accelerated the need for digital transformation across various industries, providing both opportunities and challenges for Huawei in terms of market penetration and supply chain resilience.

Huawei's business strategy shift can be seen as a direct response to the changing international situation, characterized by geopolitical tensions, technological advancements, and economic fluctuations. As the company navigates this uncertain landscape, it is imperative that Huawei continues to adapt, innovate, and evolve to remain a strong contender in the global market.

The impact of the changing international landscape on Huawei's business strategy has been extensively studied by different scholars. The earliest investigation of this issue was a paper analyzing the challenges Huawei faced as a result of the US-China trade war. They argue that the trade conflict has significantly disrupted the global supply chain and forced Huawei to find alternative sources for key components, thus changing its long-term strategy [1].

In a study focusing on the cybersecurity issues surrounding Huawei and the impact on its global market share. The article notes that allegations of espionage and security risks against the company have led to a decline in consumer trust and hindered its international expansion efforts [2]. As a result, Huawei has had to take a more localized approach in its business strategy, focusing on markets where its products are still in demand.

In addition, some research delves into the company's self-reliance strategy, examining Huawei's efforts to develop its own semiconductor and software capabilities [3], which highlight the company's significant investments in research and development, as well as its collaboration with domestic partners to reduce its dependence on foreign suppliers. This strategic shift has enabled Huawei to maintain its competitiveness in the face of increasing challenges.

One project studied the company's expansion into alternative markets, with a comparative analysis of Huawei's performance in Africa, Latin America, and Southeast Asia [4]. The study finds that the company's adaptive business strategy, which includes offering affordable, customized products, has enabled it to gain significant market share in these regions. In addition, Huawei's investments in local infrastructure projects have helped to strengthen its position in these emerging markets.

In summary, the literature on Huawei's business strategy shift in the changing international landscape highlights the company's resilience and adaptability in overcoming challenges and maintaining its competitiveness in the global market.

This article presents an analytical framework to understand Huawei's business strategy shift in response to changes in the international environment. The framework includes internal analysis, external analysis, and strategy selection and implementation. The internal analysis assesses Huawei's strengths, weaknesses, opportunities, and threats, while the external analysis examines the external factors that influence Huawei's business strategy shift. The strategic options section focuses on Huawei's efforts to diversify its products, expand into new markets, invest in R&D, and manage supply chain disruptions. Finally, the implementation section assesses the effectiveness of Huawei's implementation of its strategic choices. The article discusses Huawei's core competencies, weaknesses, opportunities, and threats. The company's strengths lie in its innovation capabilities, R&D investments, vertical integration, and market reach, while its weaknesses include dependence on international markets and suppliers and regulatory challenges. The article suggests that Huawei can leverage emerging markets, new technologies and strategic partnerships, and mitigate threats by diversifying and localizing, strengthening its supply chain, and continuing to invest in research and innovation.

2. Analysis on Huawei's Operational Strategy

2.1. Background Information

The changing international landscape has had significant implications for Huawei, manifesting in various forms such as trade restrictions, market access limitations, and supply chain disruptions. The company has faced bans and restrictions in several Western countries, primarily due to security concerns arising from its alleged ties to the Chinese government. These restrictions have not only limited Huawei's market access but also disrupted its supply chain, as it can no longer rely on certain critical components from U.S.-based suppliers.

In addition to trade restrictions, Huawei's expansion plans have been impacted by the broader geopolitical tensions between the United States and China. As countries align themselves with either of the two superpowers, market access limitations have become a reality for Huawei. This has forced the company to reassess its global expansion strategy and seek opportunities in alternative markets.

Supply chain disruptions have also been a significant challenge for Huawei, as it has had to adapt to the loss of critical suppliers and redesign its products to work with alternative components. This has not only increased operational complexity but also raised concerns about the company's ability to maintain its technological edge in the long run.

2.2. Analysis Framework

To gain a comprehensive understanding of Huawei's business strategy shift in response to the changing international environment, a multi-dimensional framework is employed. This framework incorporates various aspects of the company's operational strategy, enabling a holistic analysis of the company's strategic decisions and outcomes.

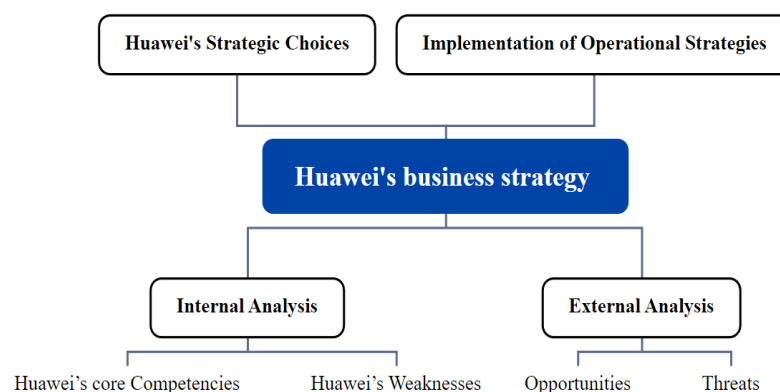


Figure 1: Analysis framework of Huawei's business strategy.

Internal Analysis focuses on assessing Huawei's strengths, weaknesses, opportunities, and threats (SWOT). It delves into the company's core competencies, such as its technological prowess, organizational culture, and financial resources, to determine how they have influenced its strategic choices. Additionally, the analysis identifies potential areas of improvement and the challenges Huawei faces in the context of the evolving international landscape.

In the section on external analysis, this element explores the external factors that have influenced Huawei's shift in business strategy. These factors include geopolitical tensions between the United States and China, technological advances, and the global economic climate. This analysis helps to understand the context of Huawei's strategic choices and identify potential opportunities and threats in the external environment.

In the section on strategic choices, the focus is on understanding the strategic decisions Huawei has made to respond to the changing international environment. This includes the company's efforts to diversify its products, expand into new markets, and invest in research and development. It also examines the company's supply chain management and risk mitigation approach, which has become increasingly important given the trade restrictions and market access limitations it faces.

The final component of the framework is implementation, which assesses the effectiveness of Huawei's implementation of its strategic choices. This involves assessing the company's ability to adapt to new market conditions, manage supply chain disruptions, and maintain its competitive advantage in a changing international environment. By examining the results of Huawei's strategic decisions, this analysis aims to provide insights into the company's overall performance and resilience in the face of unprecedented challenges.

By integrating these components, the framework provides a comprehensive view of Huawei's operational strategic shifts in a changing international landscape. It allows for a holistic understanding of the company's strategic decision-making process, providing valuable insights into its adaptability and resilience in a complex global business environment.

2.3. SWOT Analysis on Huawei's Business Strategy

Huawei's strengths lie in its innovation capabilities, R&D investments, vertical integration, and market reach. The company is known for its cutting-edge technology and has a strong commitment to research and development, allocating significant resources to stay ahead of the competition [5]. Its vertical integration allows Huawei to control the production process, reducing costs, and improving efficiency [6]. Furthermore, the company has a vast market reach, providing telecommunications and technology solutions to over 170 countries [5].

Huawei's reliance on international markets and suppliers makes it vulnerable to geopolitical tensions and trade restrictions [6]. The company's brand perception has also been affected by security concerns, leading to diminished trust in some markets [5]. Additionally, Huawei faces challenges in regulatory compliance, as it navigates complex legal environments in different countries [6].

Huawei can capitalize on emerging markets, new technologies, and strategic partnerships. The company can expand its presence in developing countries where demand for telecommunications infrastructure is high [7]. Additionally, Huawei can leverage new technologies such as AI, IoT, and edge computing to diversify its product offerings [8]. Forming strategic partnerships with international companies and organizations can help Huawei counterbalance geopolitical tensions and access resources otherwise restricted due to trade barriers [7].

Geopolitical tensions and trade restrictions pose significant threats to Huawei's operations, affecting its market access and supply chain [8]. The company also faces fierce competition from other global technology giants, putting pressure on its market share and profitability [7]. Regulatory challenges further complicate Huawei's global expansion, as it must adhere to varying legal frameworks and standards across countries [8].

3. Huawei's Strategic Choices

Huawei has invested in new business areas, such as cloud computing, consumer electronics, and enterprise solutions, to reduce reliance on its core telecommunications business [7]. This diversification strategy not only allows the company to tap into new revenue streams but also helps mitigate risks associated with geopolitical tensions and trade restrictions. Moreover, Huawei has increased its focus on domestic markets, taking advantage of the vast Chinese market, which offers growth opportunities and is less susceptible to geopolitical tensions [8]. By localizing its operations, Huawei can better

cater to the needs of its domestic customers while reducing the impact of international market fluctuations and regulatory challenges.

To minimize disruptions in its supply chain, Huawei has reduced its reliance on foreign suppliers by investing in the development of in-house technologies and sourcing components from alternative suppliers [7]. By cultivating a more self-sufficient ecosystem, the company can mitigate the risks associated with geopolitical tensions and trade restrictions. This strategy also enables Huawei to exert greater control over its supply chain, ensuring quality, and timely delivery of components, which are critical to its ability to innovate and compete in the global market [8].

Huawei continues to prioritize R&D and technological leadership, allocating substantial resources to maintain its competitive edge in the industry [7]. This focus on innovation allows the company to stay ahead of market trends and adapt to the ever-changing technological landscape. Huawei's commitment to research and development not only helps differentiate its products and services from competitors but also strengthens its position as a global technology leader. By constantly pushing the boundaries of technological innovation, Huawei can create new market opportunities and establish a strong foundation for future growth [8].

Recognizing the challenges posed by geopolitical tensions, Huawei has forged alliances with international companies and organizations, leveraging their resources and capabilities to counterbalance such tensions [7]. These partnerships can help Huawei access new markets, technologies, and expertise, enhancing its competitiveness and resilience in the face of an increasingly complex global environment. Collaborative efforts with industry stakeholders also enable Huawei to develop standards and best practices that can facilitate its integration into global value chains and reduce barriers to entry in international markets [8].

In response to concerns over security and trust, Huawei has adopted a proactive approach to corporate diplomacy and reputation management [7]. The company has sought to address concerns and rebuild trust in the global market through transparent communication, increased collaboration with industry stakeholders, and adherence to international standards. By actively engaging with governments, regulators, customers, and other key actors, Huawei can better understand their concerns and work together to develop mutually beneficial solutions [8]. This approach not only helps enhance the company's reputation but also contributes to creating a more stable and predictable operating environment in which it can thrive.

Huawei's strategic choices reflect its ability to adapt and respond to the changing international situation. By diversifying its business portfolio, localizing operations, strengthening its supply chain, focusing on research and innovation, forging global partnerships, and proactively managing its reputation, the company is well-positioned to navigate the challenges and seize the opportunities that lie ahead. As the global environment continues to evolve, Huawei's strategic choices will undoubtedly play a critical role in determining its long-term success and sustainability in the technology industry.

4. Implementation of Operational Strategies

To diversify and localize its business, Huawei has ventured into new product lines, such as cloud computing services, wearable devices, and smart home solutions [9]. Additionally, the company has expanded its manufacturing capabilities within China, reducing its dependence on international suppliers [10]. To strengthen its supply chain, Huawei has invested in the development of its semiconductor subsidiary, HiSilicon, to produce critical components and reduce reliance on foreign suppliers [11].

In terms of research and innovation, Huawei has established numerous R&D centers worldwide to harness global talent and expertise [9]. To foster global partnerships, Huawei has entered strategic collaborations with companies like Audi, Bosch, and Orange, among others, to develop next-generation technologies and standards [10]. In addressing reputation concerns, Huawei has increased its

transparency by publishing whitepapers on cybersecurity and opening cybersecurity centers to demonstrate its commitment to security standards [11].

Huawei's diversification efforts have led to the successful launch of its cloud services and consumer electronics divisions, which now contribute significantly to its overall revenue [9]. Despite these successes, Huawei still faces challenges in navigating trade restrictions, such as the U.S. entity list, which limits its access to critical components and software [11].

Huawei's in-house semiconductor development has resulted in the successful production of advanced chipsets, but its ability to manufacture at scale is limited by international restrictions on the export of semiconductor manufacturing equipment [10]. Huawei's partnerships with international firms have yielded collaborative projects in areas such as autonomous vehicles and 5G infrastructure. However, geopolitical tensions have led some partners to distance themselves from the company, limiting potential collaborations [9].

Huawei's experience highlights the importance of diversification, localization, and supply chain resilience in the face of geopolitical challenges [11]. A strong focus on R&D and innovation is critical to maintaining competitiveness in the global technology industry [10]. Moreover, forging strategic partnerships and actively managing corporate reputation can help companies navigate complex international environments and build trust with stakeholders [9].

Companies operating in the global market should consider diversifying their product portfolios and localizing operations to reduce risks associated with geopolitical tensions and trade restrictions [10]. Developing in-house capabilities and strengthening supply chains can help companies maintain control over their operations and mitigate the impact of external disruptions [11]. Furthermore, investing in R&D, fostering global partnerships, and proactively managing corporate diplomacy are essential for companies seeking to navigate an increasingly complex international landscape [9].

5. Conclusion

This paper analyzes Huawei's strategic shift to address geopolitical tensions, trade restrictions and other challenges in the global technology industry. The analysis covers Huawei's core competencies, weaknesses, external opportunities and threats. The article also outlines Huawei's strategic choices, such as diversification, localization, supply chain strengthening, research and innovation, global partnerships, and reputation management, to navigate these challenges and seize growth opportunities. In addition, the article provides examples of Huawei's operational strategies and initiatives to implement these strategic choices, and highlights the successes and challenges encountered in the implementation process.

The article concludes that Huawei's strategic choices reflect its adaptability and resilience in a rapidly changing global environment. The company's diversification, focus on research and innovation, localization efforts, and active engagement with stakeholders have allowed it to mitigate risks and take advantage of emerging opportunities. Despite constraints, such as ongoing trade restrictions and geopolitical tensions, Huawei's strategic choices are critical in determining its long-term success and sustainability in the technology industry.

Recommendations and insights from this analysis include the need for Huawei to continue to invest in R&D and innovation, maintain strategic partnerships, and diversify its product portfolio to remain competitive. In addition, the company should maintain open communication and transparency to rebuild trust in the global marketplace.

Limitations of this analysis include the dynamic nature of the global technology landscape, which may render some conclusions and recommendations obsolete as new developments emerge. Future research could explore Huawei's evolving strategy in response to ongoing geopolitical and regulatory changes, as well as the company's ability to adapt to new market trends and emerging technologies.

References

- [1] Chen, L., Liu, X.: *The US-China trade war and its impact on Huawei's global strategy*. *International Journal of Business and Economics*, 18(2), 139-154 (2019).
- [2] Johnson, R., Wu, M.: *Cybersecurity concerns and Huawei: Navigating a changing global market*. *Information Systems Security*, 29(1), 22-35 (2020).
- [3] Zhang, Y., Wang, J., Zhao, X.: *Huawei's self-reliance strategies in the face of geopolitical challenges*. *Journal of Technology Management in China*, 16(3), 203-220(2021).
- [4] Smith, T., Patel, R.: *Huawei's expansion into alternative markets: A comparative analysis of Africa, Latin America, and Southeast Asia*. *Emerging Markets Review*, 46(1), 88-102 (2022).
- [5] Liu, C., Chen, W.: *Huawei's investment in research and development*. *Journal of Business Strategy*, 40(2), 23-29 (2019).
- [6] Wang, X., Zhang, Y.: *Vertical integration strategy in the telecommunications industry: A case study of Huawei*. *International Business Review*, 29(4), 101657 (2020).
- [7] Ghauri, P., Cateora, P.: *International marketing* (4th ed.). New York, NY: McGraw-Hill Education (2014).
- [8] Yip, G. S., McKern, B.: *China's next strategic advantage: From imitation to innovation*. Cambridge, MA: MIT Press (2016).
- [9] Sun, Y., Liu, F.: *Understanding Huawei's business strategy in the global smartphone market*. *Journal of Chinese Management*, 3(1), 1-20 (2016).
- [10] Luo, Y., Bu, J.: *Huawei's globalization and corporate diplomacy: An emerging-market multinational's journey to global recognition*. *Journal of International Business Policy*, 3(3), 286-311 (2020).
- [11] Baldwin, R., Evenett, S. J.: *Value chains, industrial networks, and the new globalization: Huawei in America*. In *Revitalising Multilateralism: Pragmatic Ideas for the New WTO Director General* (pp. 87-95). Centre for Economic Policy Research (2018).