# Implementation of Upgrading in Global Value Chain Activities of Indonesian Coffee SMEs: Results of Empirical Study

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#### **ABSTRACT**

This study discusses the implementation of improvement strategies in the global value chain (GVC) for coffee SMEs in Indonesia. With the background of Indonesia's position as a major coffee producer in the world, this study explores the challenges faced by SMEs in achieving maximum added value, broad market access, and effective governance. The research method uses a qualitative descriptive approach through literature analysis, secondary data and primary data related to the coffee value chain and its improvement strategies. The results show that value-added improvement strategies can be achieved through product, process, and function innovation, as well as product differentiation. Certification such as Geographical Indications helps increase sales value, although benefits for farmers are still limited. Increasing market access involves vertical and horizontal collaboration for diversification and development of marketing networks, including participation in international exhibitions. The role of the government is very important through the development of infrastructure, regulations, and certification support, but needs to be strengthened to reduce the imbalance in the distribution of added value. In conclusion, partnerships involving the private sector, government, and NGOs are key to encouraging the sustainability of coffee SMEs in the GVC. Recommendations include strengthening governance, increasing farmer capacity, and collaboration strategies to expand export markets and increase the competitiveness of Indonesian coffee in the global market.

Keywords: Upgrading, Global Value Chain (GVC), Indonesian Coffee SMEs.

#### **ABSTRAK**

Penelitian ini membahas implementasi strategi peningkatan dalam rantai nilai global (Global Value Chain/GVC) untuk UKM kopi di Indonesia. Dengan latar belakang posisi Indonesia sebagai produsen kopi utama dunia, penelitian ini mengeksplorasi tantangan yang dihadapi UKM dalam mencapai nilai tambah maksimal, akses pasar yang luas, dan tata kelola yang efektif. Metode penelitian menggunakan pendekatan deskriptif kualitatif melalui analisis literatur, data sekunder dan data primer terkait rantai nilai kopi dan strategi peningkatannya. Hasil menunjukkan bahwa strategi peningkatan nilai tambah dapat dicapai melalui inovasi produk, proses, dan fungsi, serta diferensiasi produk. Sertifikasi seperti Indikasi Geografis membantu meningkatkan nilai jual, meskipun manfaat bagi petani masih terbatas. Peningkatan akses pasar melibatkan kolaborasi vertikal dan horizontal untuk diversifikasi dan pengembangan jaringan pemasaran, termasuk partisipasi dalam pameran internasional. Peran pemerintah sangat penting melalui pengembangan infrastruktur, regulasi, dan dukungan sertifikasi, namun perlu diperkuat untuk mengurangi ketidakseimbangan distribusi nilai tambah. Kesimpulannya, kemitraan yang melibatkan sektor swasta, pemerintah, dan LSM menjadi kunci dalam mendorong keberlanjutan UKM kopi dalam GVC. Rekomendasi mencakup penguatan tata kelola, peningkatan kapasitas petani, dan strategi kolaborasi untuk memperluas pasar ekspor serta meningkatkan daya saing kopi Indonesia di pasar global.

Kata kunci: Peningkatan, Global Value Chain (GVC), UKM Kopi Indonesia.

#### Introduction

Coffee is one of the plantation products with high economic value and one of the leading export commodities. Indonesia is one of the largest coffee producers globally. It is supported by the coffee planting area in Indonesia, which has reached 1.26 million ha. The largest coffee-producing provinces are South Sumatra (27%), Lampung (15%), North Sumatra (11%), Aceh (9%), and Bengkulu (8%), all of which are on the island of Sumatra. According to a report from the Central Statistics Agency, throughout 2023, the national coffee export volume reached 276.28 thousand tons, with a total value of US\$915.91 million. In 2023, Indonesia exported the most coffee to the United States (figure 1), with a volume of 36.62 thousand tons or 13.25% of total national exports. The export value reached US\$215.49 million. The following largest coffee export destination countries are Egypt, with a volume of 32.04 thousand tons (US\$84.53 million), and Malaysia, 22.67 thousand tons (US\$60.53 million). After that, there is Italy with a volume of 18.12 thousand tons (value of US\$43.8 million), Japan with 15.31 thousand tons (value of US\$63.02 million), and Germany with 9.46 thousand tons (value of US\$32.91 million).

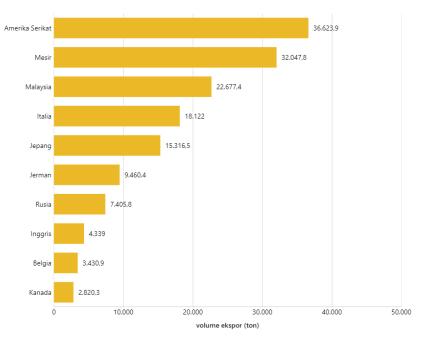


Figure 1. Indonesia's coffee export volume in 2023, by country

The high value of coffee production must be balanced with appropriate processing and marketing activities to maximise its value. These various roles give rise to a supply chain pattern that includes product, information, and financial factors. However, coffee-producing areas have several problems, low production results, weak farmer institutions, and limited government support. Farmers only get around 3.4% of the final price of Indonesian coffee, while exporters and roasters get around 29% and 62.5%, respectively. The difference in prices at the farm and the milling facility indicates an imbalance in the value chain.<sup>4</sup> In a study conducted by Mauladi et al. (2022), coffee beans produced by

Agronomi Mesoamericana 33 (2022).

<sup>&</sup>lt;sup>1</sup> M. A. Mauladi, J. H. Mulyo, dan D. H. Darwanto, "Coffee Supply Chain Management: A Case Study In Ciamis, West Java, Indonesia," *HABITAT* 33, no. 3 (2022): 201–2011.

<sup>&</sup>lt;sup>2</sup> Badan Pusat Statistik, Statistik Kopi Indonesia 2020 (Jakarta: Badan Pusat Statistik, 2021).

C. M. Annur, "10 Negara Tujuan Utama Ekspor Kopi Indonesia (2023)," *Databoks*, 1 Maret 2024, <a href="https://databoks.katadata.co.id/datapublish/2024/03/01/10-negara-tujuan-ekspor-kopi-indonesia-2023-as-teratas.">https://databoks.katadata.co.id/datapublish/2024/03/01/10-negara-tujuan-ekspor-kopi-indonesia-2023-as-teratas.</a>
 S. T. Winarno dan W. S. Harijani, "Rantai Nilai Kopi Robusta (Coffea canephora) di Jawa Timur, Indonesia,"

# 25 Megahnanda Alidyan, Baiq Lekar, Vinsensio M.A. Dugi | Implementation of Upgrading in Global Value Chain Activities of Indonesian Coffee SMEs: Results of Empirical Study

farmers are often marketed conventionally to collectors outside the city mediocre quality, so they get low prices<sup>5</sup>. In addition, the emergence of regulations and standards in coffee, including fair trade and sustainability and formal certification schemes, emerged in response to consumer and NGO concerns about social and environmental ethics and sustainability of production as an effort to decommoditize the coffee trade but are now increasingly driven by large coffee brands as another market capture tool through the process of 're-commoditization'. Much literature has analyzed the impact of fair trade and other certification schemes on coffee producers, often using the GVC analytical framework, with mixed results.<sup>6</sup>

In Indonesia, the coffee value chain is a clear example of this, where the dominant buyers of Indonesian coffee are multinational exporting companies that buy coffee directly from the farmer level<sup>7</sup>. These companies also require farmers to produce coffee according to sustainable criteria (standards and certification). Thus, multinational companies or global private actors also have a considerable influence upstream (as buyers) at the production level. Meanwhile, the role of the government is only seen as a regulator that 'legitimates' the activities of multinational companies to 'regulate' the value chain in developing countries, including carrying out various commercial operations down to the farmer level<sup>8</sup>. Multiple studies indicate that developing countries need greater control over the global value chain to benefit more from their products, especially agricultural ones. One relevant way to do this is through upgrading the agricultural value chain.<sup>9</sup> Therefore, this study is essential to observe the socio-economic upgrading of SMEs in the global value chain of Indonesian coffee.

#### **Literature Review**

The purpose of this study is achieved using a theoretical approach, namely the global value chain approach, to understand how the perspective of the upgrading concept is captured and utilised holistically. This approach has the concept that the value chain of the agricultural sector of developing countries, including Indonesia, is part of the regional and then global value chain (Figure 2). This concept certainly applies to the value chain of plantation products traded in national, regional and international markets (e.g., coffee, cocoa, tea and palm oil).<sup>10</sup>

<sup>&</sup>lt;sup>5</sup> M. A. Mauladi, A. Novianty, dan A. Puspitasari, "Robusta Coffee Farming Marketing Mix Strategy Using Analytical Hierarchy Process (AHP)," *Mimbar Agribisnis* 8, no. 2 (2022): 902–911.

<sup>&</sup>lt;sup>6</sup> M. Vicol et al., "Upgrading for Whom? Relationship Coffee, Value Chain Interventions and Rural Development in Indonesia," *World Development* 110 (2018): 26–37.

<sup>&</sup>lt;sup>7</sup> M. Ibnu, "Peningkatan (Upgrading) Rantai Nilai Sektor Pertanian Indonesia: Kajian Teori dan Hasil-hasil Empiris," *Jurnal Sosial Ekonomi Pertanian* 19, no. 1 (2023): 39–53.

<sup>&</sup>lt;sup>8</sup> M. Ibnu, "Determinan Partisipasi Petani Kopi dalam Standar dan Sertifikasi Berkelanjutan Common Code for Coffee Community (4C)," *Jurnal Tanaman Industri dan Penyegar* 6, no. 3 (2019): 135–144.

<sup>&</sup>lt;sup>10</sup> M. Ibnu, "Penerapan Standar dan Sertifikasi dalam Rantai Nilai Kopi: Peluang dan Kendala bagi Petani," *Jurnal Litbang: Media Informasi Penelitian, Pengembangan dan IPTEK* 19, no. 1 (2023): 1–16.

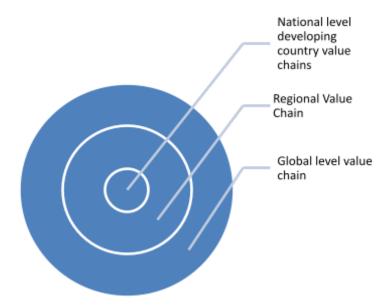


Figure 2. Conceptualisation of the value chain: national, regional and global levels

Upgrading includes strategies that countries, regions, companies, and other economic stakeholders use to maintain or improve their position in the global economy. In an analysis, Kowalski et al. (2015) define upgrading as increasing the share of domestic added value of a product. Therefore, to claim a more rigorous empirical work on how GVC participation can impact a country's economic performance, three forms of GVC participation outcome measures; (1) A country's exports embody the total domestic value added per capita; (2) The technological sophistication of exports; (3) The diversification of export products.

These measures capture export-related benefits that spread to domestic labour and capital. In other words, these would be value-added measures of productivity changes associated with GVC participation (similar to process upgrading). Economic upgrading in global value chains is defined as a firm, country, or region moving into higher-value activities to increase benefits such as security, profitability, value-added, and capabilities from participation in global production. A diverse mix of government policies, institutions, firm strategies, technologies, and worker skills are associated with the success of upgrading. In the GVC framework, four common problems in the value chains of developing countries are related to suboptimal added value, inadequate market access, poor governance, and weak collaboration or cooperation between actors in the value chain. Therefore, value chain upgrading strategies need to be directed to overcome these problems, namely by increasing added value, increasing market access, improving the governance structure of the value chain, and promoting and encouraging partnerships (Figure 3).

<sup>&</sup>lt;sup>11</sup> G. Gereffi, "Export-Oriented Growth and Industrial Upgrading: Lessons from the Mexican Apparel Case," studi yang ditugaskan oleh World Bank (2005).

<sup>&</sup>lt;sup>12</sup> P. Kowalski et al., *Participation of Developing Countries in Global Value Chains: Implications for Trade and Trade-Related Policies* (Paris: OECD Publishing, 2015).

<sup>&</sup>lt;sup>13</sup> M. B. Marcato and C. T. Baltar, "Economic Upgrading in Global Value Chains: Concepts and Measures," *Revista Brasileira de Inovação* 19 (2020), <a href="https://doi.org/10.20396/rbi.v19i0.8654359">https://doi.org/10.20396/rbi.v19i0.8654359</a>.

<sup>14</sup> Gereffi.

<sup>&</sup>lt;sup>15</sup> Ibnu, "Peningkatan (Upgrading) Rantai Nilai Sektor Pertanian Indonesia: Kajian Teori dan Hasil-hasil Empiris,"

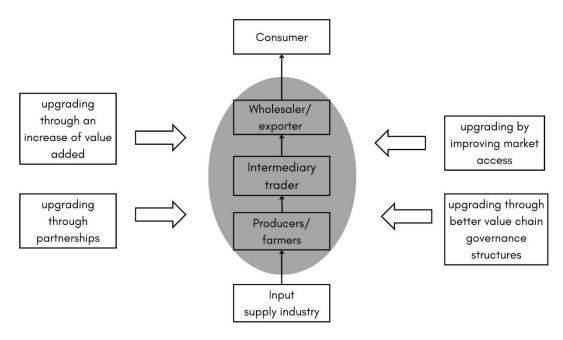


Figure 3. Four upgrading strategies in the value chain based on the literature

In theory, Figure 3 explains that increased added value can occur in at least four forms: product and packaging upgrading, process upgrading, function upgrading (production or distribution), and cross-sectoral upgrading (product differentiation). Upgrading the added value of products and processes is most common in developing country value chains and is always related to (potential) demand in the market. This increase can be associated with improvements in intrinsic attributes (product quality, composition, and packaging) and extrinsic attributes of the product (related to typical characteristics).<sup>16</sup> Upgrading market access is possible through relationships/cooperation, both horizontally and vertically, focusing on finding the proper market channels. For example, horizontal collaboration can be done by forming producer associations educational support or changing the macro-cultural discourse. 17

### Methodology

This qualitative study uses a descriptive approach, which aims to observe the upgrading strategy of SMEs in the global value chain activities of Indonesian coffee. The study focuses on analysing various factors of upgrading strategies in the global value chain of coffee in Indonesia by SME actors. This study uses secondary data sources from multiple literature, reports, publications related to the coffee value chain, upgrading strategies, and Indonesian coffee export data and primary data from interview method.

The study's objectives are achieved through a specific literature review on the global value chain of coffee in Indonesia, theoretical literature and empirical research results. The steps to identify the implementation of global value chain upgrading begin with the selection of literature on the strategy of increasing the value of coffee commodities by Indonesian SME actors. Based on the selected literature, problems of SMEs in coffee in global value chain activities were found, so implementation efforts were seen in upgrading through added value, market access, good governance and collaborative

<sup>&</sup>lt;sup>16</sup> L. F. Mesquita dan S. G. Lazzarini, "Horizontal and Vertical Relationships in Developing Economies: Implications for SMEs' Access to Global Markets," dalam *New Frontiers in Entrepreneurship* (2009): 31–66. <sup>17</sup> Ibnu, 15.

# 28 Megahnanda Alidyan, Baiq Lekar, Vinsensio M.A. Dugi | Implementation of Upgrading in Global Value Chain Activities of Indonesian Coffee SMEs: Results of Empirical Study

partnerships. The study is expected to provide in-depth insight into how coffee SMEs in Indonesia can contribute to global value chain activities through upgrading strategies.

#### **Analysis**

This section presents the upgrading strategies of SMEs in the global value chain activities of coffee commodities. Each approach is based on the results of empirical research in the literature.

#### a. Upgrading coffee SMEs through increasing added value

Most of the upgrading approaches found in the literature focus on increasing value-added production. The forms can vary: (1) Product (and packaging) improvement; (2) Process improvement; (3) Function improvement (production or distribution function insourcing); (4) Inter-sectoral improvement (product differentiation). Increasing the added value of a product is always related to (potential) demand in a market that is associated with intrinsic attributes (product quality, composition, packaging) and extrinsic attributes of the product, which are related to process characteristics.<sup>18</sup>

For example, most of Indonesia's coffee exports are in the form of coffee beans (green beans).<sup>19</sup> With this form, Indonesian coffee, especially the Robusta type, is treated as a commodity in the international market. As a commodity, Indonesian coffee is less differentiated from coffee in other countries, such as Vietnam. Ultimately, what happens is a race to the bottom, where Robusta coffee competes at a low-price level in the international market. Due to certain geographical climate conditions that affect, for example, the taste of coffee, almost all regions in Indonesia where coffee is grown can produce various types of specialty coffee.<sup>20</sup> Arabica and Robusta varieties with unique characteristics (for example, taste and smell) can be considered a specialty coffee. Specialty coffee can get a better price because of its high quality. Indonesian Robusta speciality coffee, for example, can be qualitatively distinguished from Robusta from other countries, so it has the potential to have a competitive advantage and get a particular niche market. Improving innovative packaging products and strong branding can increase the attractiveness of coffee products in the international market. SMEs in Lampung have developed environmentally friendly packaging and attractive branding to penetrate the European and American markets.<sup>21</sup> A study evaluating the benefits of increasing added value through standards and certification found that farmers participating in different certification schemes also experienced different benefits. 4C (Common Code for Coffee Community) certification is known as one of the schemes to increase farmers' income, but not significantly. The increase in income did not significantly impact improving farmers' welfare, especially when considering the sacrifices made by farmers (energy, thought, time, risk) to manage their coffee plantations according to certification requirements. It can further affect farmers' motivation to participate in certification, reduce sales of Indonesian coffee in the international market, and affect the sustainability of Indonesian coffee production. <sup>22</sup>

<sup>&</sup>lt;sup>18</sup> J. Trienekens dan M. P. Van Dijk, *Global Value Chains: Linking Local Producers from Developing Countries to International Markets* (Amsterdam: Amsterdam University Press, 2011).

<sup>&</sup>lt;sup>20</sup> T. Wahyudi dan M. Jati, "Challenges of Sustainable Coffee Certification Indonesia," *International Coffee Council*, sesi ke-109 (2012).

<sup>&</sup>lt;sup>21</sup> M. Ibnu, "Toward a More Sustainable Coffee Production: The Implementation Capacity of Indonesian Standard Coffee," *Pelita Perkebunan* 35, no. 3 (2020): 212–229.

<sup>&</sup>lt;sup>22</sup> M. Ibnu, "Peningkatan (Upgrading) Rantai Nilai Sektor Pertanian Indonesia: Kajian Teori dan Hasil-hasil Empiris," *Jurnal Sosial Ekonomi Pertanian* 19, no. 1 (2023): 39–53.

## b. Upgrading coffee SMEs through market access

An essential requirement for upgrading is the consistent ability to meet market-determined standards. Especially in the food value chain, these standards have become a requirement for market access for producers in developing countries. Mu-radian and Pelupessy (2005) discuss the need for new standards in the coffee sector to offer producers opportunities to generate added value. Improving market access is to improve horizontal and vertical relationships that focus on participation in the proper market channels. Horizontal collaboration can result in product differentiation (inter-sectoral upgrading). Many studies on value chains in developing countries focus on improving horizontal relationships by forming producer associations or cooperatives. Upgrading through vertical market access is a collaboration between producer organisations and exporting companies. <sup>23</sup>

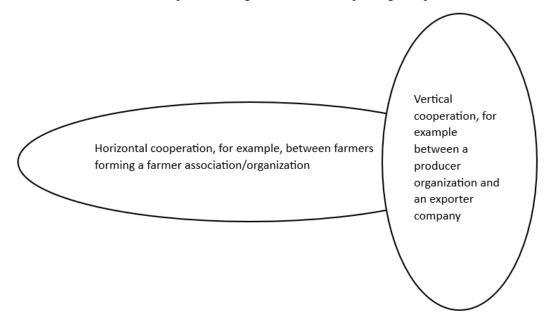


Figure 4. Horizontal and vertical cooperation in the global value chain

Horizontal market access involves market diversification and the development of new marketing networks that enable coffee SMEs to reach a broader range of consumers—identifying and entering new export markets to reduce dependence on a particular market. In Indonesia, problems related to farmer organisations are classic because, in general, the problems have been around for a long time and are indeed rather challenging to address. Lack of attention to the causes of the problem is often cited as the root of the problem, such as incompetent leadership and lack of motivation among farmers to organize.<sup>24</sup> Farmer groups and cooperatives are formal organizations in Indonesia, and these organizations have difficulty performing well unless they have reached a certain level of maturity. Many farmer groups and cooperatives need to function better and may, in the short term, find it challenging to achieve organizational maturity.<sup>25</sup>

<sup>&</sup>lt;sup>23</sup> Trienekens & Van Dijk.

<sup>&</sup>lt;sup>24</sup> M. Ibnu, A. Offermans, dan P. Glasbergen, "Certification and Farmer Organisation: Indonesian Smallholder Perceptions of Benefits," *Bulletin of Indonesian Economic Studies* 54, no. 3 (2018): 387–415.
<sup>25</sup> Ibid.

Meanwhile, the top-down approach from the central government regarding the formation of farmer organizations somewhat ignores these problems, and the initiative from local governments regarding the development of farmer organizations is also still minimal. <sup>26</sup> The national budget related to the development of farmer organizations also needs to be improved. Therefore, the national government must implement other policies, such as expanding partnerships and improving coordination with various parties, both the private/business sector, NGOs, and local universities, to address all problems related to farmer organizations. Moreover, in the era of regional autonomy, coordination between the central and regional governments needs to be improved significantly to develop the facilities and infrastructure needed in rural areas. Several cases of coffee SMEs in West Java have succeeded in expanding their export markets to countries in Southeast Asia and Australia, reducing the risks associated with single market fluctuations. <sup>27</sup> Participation in events such as the World Coffee Expo and the Specialty Coffee Association Expo has helped SMEs from Sumatra and Sulawesi get new buyers and learn about global market trends. <sup>28</sup>

### c. Upgrading through Coffee GVC governance structures

Government bureaucracy, policies, and regulations significantly influence farmers' challenges in developing countries<sup>29</sup>. Government regulations related to trade and property rights (especially land) influence farmers' attitudes and behaviours towards sustainability initiatives, including certification (Roetzel, 2019). From the plantation to the consumer, coffee products from developing countries are subject to various cost burdens (e.g. transportation costs, export taxes, and port fees), which are then exacerbated by the lack of infrastructure such as access to transportation, communication, skilled labour, and the necessary equipment/technology.<sup>30</sup> However, coffee products from developing countries can compete in the international market with prices that tend to be low and fluctuate.

In particular, the government has a crucial role in supporting value chain upgrading with, for example, laws, regulations, and policies. Through its legal apparatus, the government can play a role in providing market access by negotiating lower barriers to (international) trade and supporting the development of physical infrastructure to achieve smooth product flow in the value chain (better roads and distribution facilities, such as better product storage and communication infrastructure); supporting the development of knowledge infrastructure by setting up a functioning education system and providing training facilities; providing access to production technology for value chain actors through subsidies, and providing access to credit; and providing a stable economic and political climate. <sup>31</sup> The Indonesian government's efforts in this regard have invested in developing coffee processing and storage infrastructure, such as modern processing plants and international standard storage facilities. This infrastructure helps SMEs improve the quality and quantity of their coffee production through the assistance program for coffee processing equipment provided by the Ministry of Agriculture. It allows SMEs in areas such as Aceh and North Sumatra to improve their production

<sup>&</sup>lt;sup>26</sup> S. W. Syahyuti et al., *Kajian Peran Organisasi Petani dalam Mendukung Pembangunan Pertanian* (Bogor: Pusat Sosial Ekonomi dan Kebijakan Pertanian, 2014).

<sup>&</sup>lt;sup>27</sup> M. Ibnu, "Determinan Partisipasi Petani Kopi dalam Standar dan Sertifikasi Berkelanjutan Common Code for Coffee Community (4C),"

<sup>&</sup>lt;sup>28</sup> Winarno & Harijani.

<sup>&</sup>lt;sup>29</sup> W. Elrick, H. Luke, dan K. Stimpson, "Exploring Opportunities and Constraints of a Certification Scheme for Regenerative Agricultural Practice," *Agroecology and Sustainable Food Systems* 46, no. 10 (2022): 1527–1549.

<sup>&</sup>lt;sup>30</sup> C. B. Barrett, T. Reardon, J. Swinnen, dan D. Zilberman, "Agri-food Value Chain Revolutions in Low- and Middle Income Countries," *Journal of Economic Literature* 60, no. 4 (2022): 1316–1377.

<sup>&</sup>lt;sup>31</sup> M. Ibnu, "Penerapan Standar dan Sertifikasi dalam Rantai Nilai Kopi: Peluang dan Kendala bagi Petani,"

# 31 Megahnanda Alidyan, Baiq Lekar, Vinsensio M.A. Dugi | Implementation of Upgrading in Global Value Chain Activities of Indonesian Coffee SMEs: Results of Empirical Study

efficiency.<sup>32</sup> The government has adopted strict quality and sustainability standards for coffee products. Certifications such as Geographical Indications (GI) and organic certification help SMEs improve the competitiveness of their products in the international market. For example, Gayo coffee in Aceh has received Geographical Indication certification, increasing its reputation and selling value globally. <sup>33</sup>

## d. Upgrading through partnerships

Value chain upgrading can only be achieved through private, government, and public-private partnerships. Non-chain actors can facilitate the upgrading process by providing technological, organizational, political and educational support or by changing the macro-cultural discourse. There are many actors in the value chain, and each can be an initiative to upgrade the value chain. Changes can be initiated by retailers, industries, producer cooperatives, or even actors from outside the chain, such as government and non-governmental organizations (NGOs or other parties in the chain business environment, such as banking institutions or service providers). It shows that initiatives can come from the public (government) or the private sector (private/business). In governance, the private sector, mainly national companies, with government support, also plays a role in implementing appropriate standards related to quality, labour, environment, and trade. They can also play a role in streamlining the value chain through better communication and planning, the establishment of vertical governance mechanisms that facilitate smooth product flows and better distribution of added value, prepare horizontal governance mechanisms to improve the balance of power in the value chain and improve the bargaining position of small producers; and support technology development. <sup>34</sup>

In 2018, giant coffee buyers such as Nestle and Starbucks targeted 70% of their coffee raw materials to be certified environmentally friendly/sustainable (Bray, 2019). This phenomenon further encourages the urgency of implementing GVC in MSMEs producing Indonesian export commodities, especially coffee. However, implementing GVC cannot be rushed; it requires synergistic strategy, planning, financing, and implementation involving all stakeholders. It is necessary to create an operating environment and a coffee relationship model that involves farmer organizations, supported by government policies, to prioritize the implementation of GVC, for example, by giving a significant role to BUMDES so that they can become GVC agents and organize environmentally friendly certification. The implementation of the ASEAN common market is an example of GVC in Green MSMEs that have been optimally utilized by fruit farmers in Thailand, Vietnamese coffee producers, and palm oil manufacturers in Malaysia to boost their production and exports, without the need to open new land, train many workers, and invest a lot in new factories. <sup>35</sup>

#### Conclusion

This study highlights the upgrading strategy in Indonesia's global value chain (GVC) activities of coffee SMEs. Some of the main findings of this study are as follows: upgrading coffee SMEs is carried out through increasing added value involving various approaches such as product, process, function, and inter-sectoral improvements. The study shows that by improving product quality and packaging innovation, SMEs can increase the attractiveness of their products in the international

<sup>&</sup>lt;sup>32</sup> BPS.

<sup>&</sup>lt;sup>33</sup> R. Cadizza dan Rizanizarli, "Perlindungan Hukum terhadap Indikasi Geografis Kopi Gayo di Tanah Gayo," *Jurnal Yustisiabel* 7, no. 2 (2023).

<sup>&</sup>lt;sup>34</sup> M. Ibnu, "Peningkatan (Upgrading) Rantai Nilai Sektor Pertanian Indonesia: Kajian Teori dan Hasil-hasil Empiris."

<sup>&</sup>lt;sup>35</sup> A. Darmawan, L. A. Wibowo, dan A. Surachman, "Penerapan Rantai Nilai Global Sebagai Strategi Peningkatan Ekspor Produk Kopi," *Coopetition: Jurnal Ilmiah Manajemen* 12, no. 1 (2021): 9–15.

market. For example, speciality coffee with unique characteristics can penetrate a particular market niche and get a better price. In addition, efforts to increase added value through certification steps still need help among Indonesian coffee farmer SMEs, who seem to be the most vulnerable actors in the global coffee commodity value chain. The main factor that makes SME actors vulnerable is meeting certification requirements, including requirements regarding the dryness of coffee beans demanded by the market. If this insignificant price difference continues, certification may slowly lose its relevance for farmers.

Upgrading strategies through market access involves improving vertical and horizontal relationships. It includes market diversification, developing new marketing networks, and participating in international exhibitions. These efforts allow coffee SMEs to reach more comprehensive consumers and reduce dependence on one particular market. The government supports value chain upgrading by providing infrastructure, regulations, and training and certification programs. Government investment in coffee processing and storage infrastructure and adoption of quality and sustainability standards help SMEs improve the quality and quantity of their coffee production. However, the government's role needs to be further enhanced to address the imbalance in the distribution of added value in the coffee value chain. Value chain upgrading can only be achieved through partnerships involving various parties, including the private sector, government, and non-governmental organizations. This collaboration includes technological, organizational, political, and educational support to facilitate upgrading. Case studies show that multinational companies have a considerable influence upstream in the value chain and require coffee production to comply with sustainability standards.

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- 33 Megahnanda Alidyan, Baiq Lekar, Vinsensio M.A. Dugi | Implementation of Upgrading in Global Value Chain Activities of Indonesian Coffee SMEs: Results of Empirical Study
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