While the country has a rich history as being a significant exporter of beans, a variety of impediments such as coffee rust, shifting dynamics within the global industry and insufficient government support have caused the domestic industry to atrophy in recent decades.

The Philippines’ current coffee production levels are analogous to small-scale nations such as Guinea, Togo, and Madagascar. The value of its 2015 exports of green and roasted coffee accounted for less than 0.0004% and 0.003% of global trade, respectively.

Despite low coffee production and exports, the Philippines has been a leading importer of instant coffee by volume since 2011 and is projected to become one of the world’s largest five consumers by 2021.

The Philippines’ most pronounced strength in the coffee GVC relates to geographic conditions that allowed the industry to flourish and produce all four varieties of coffee namely Robusta, Arabica, Excelsa and Liberica throughout the country.

Globally, the coffee industry is valued at approximately US$77 billion with trade amounting to US$66.5 billion in 2015. It is characterized by production that is concentrated in developing countries in the so-called “coffee belt” around the equator, while consumption is concentrated in northern regions.

The coffee GVC can be divided into five categories namely production, processing, trade, roasting and marketing. The production stage of the chain that is usually carried out in developing countries in the “coffee belt” gains the lowest value. Meanwhile, the marketing stage of the chain remains concentrated in developed countries.

The two main species of coffee are Arabica, which is considered to exude superior taste and commands higher market price; and Robusta, which is typically used in lower-value segments of the market like instant coffee. In terms of emphasis in production, quality and marketing are key factors in
Arabica profitability, while high productivity and farm efficiency are critical determinants of Robusta profitability.

There are important structural evolutions in the global coffee industry in recent years. These include the following:

**The de-commoditization of the coffee sector in the last two decades.** Today, coffee is no longer classified as simply Arabica or Robusta. Marketing strategies have raised consumer awareness not only in the quality of coffee, but also about its specific origin, type and flavor profile as well as the social and environmental conditions under which it is produced.

**Instant coffee has been losing market share to fresh coffee in mature markets, leaving Asia as a key source of demand.** Companies are shifting to Asia, where coffee consumption is still in its relative infancy. Instant coffee is used as an inexpensive way to draw consumers. Key emerging markets in the Asia Pacific region, such as China, Indonesia and Philippines, are expected to become important sources of growth for the global coffee industry. The said countries are expected to add US$1.5 billion in new sales in the next five years.

**Traceability and sustainability have become increasingly important.** These characteristics are highly valued in specialty coffee and certified coffee. In specialty coffee, products are sold based on their specific origin and quality that is attributed to its production location. In certified coffee, on the other hand, products are sold based on reassurance to consumers that the product has been produced based on a specific set of economic, social and environmentally sustainable norms. As an effect, this has led to the restructuring of the supply chain as roasters are now purchasing coffee directly from farmers in producing regions.

**The Philippines in the Coffee GVC**

All four coffee species are grown and produced in the Philippines. Robusta is the dominant variety accounting for 69% of 2015-2016 production by volume (48,463 of the 70,586 metric tons), followed by Arabica (24%), Excelsa (6%), and Liberica (1%). The largest coffee producing regions in the country are based in Mindanao, specifically in Central Mindanao, the Autonomous Region of Muslim Mindanao, and Davao.

However, the Philippines’ footprint in coffee GVCs is relatively small. Its current coffee production levels are analogous to small-scale nations such as Guinea, Togo, and Madagascar. In 2015, Philippine exports of green and roasted coffee accounted for less than 0.0004% and 0.003% of global trade, respectively, with less than 10 companies exporting coffee in any form. Its imports, meanwhile, have surged across the value chain significantly increasing from US$69 million in 2007 to US$262 million in 2014.

While production and exports remain slight, the Philippines has established itself as a vibrant coffee market. As is the case in most of Asia, domestic demand for instant coffee is especially high—90% of coffee consumed in the Philippines is instant coffee, and the country has been a leading importer of soluble coffee by volume since 2011.

The expanding demand and inflows of instant coffee has prompted the government to take steps to boost the domestic sector. Broadly speaking, the focus has been on improving product quality through process and functional upgrades in the short term to allow for import substitution, while also positioning the country to build its reputation as a source of specialty coffee for the export market. In the upstream segments of the chain, the Department of Agriculture...
The Philippines in the Chemical Global Value Chain

The Department of Agriculture (DA) has attempted to expand the distribution of inputs while also engaging in extension services to increase the quality of the product.

Meanwhile, the Department of Trade and Industry (DTI) has generated research outputs in the last five years that have analyzed the country’s competitiveness in the sector and outlined recommendations for addressing inefficiencies. Furthermore, development programs of the Departments of Science and Technology (DOST) and Environment and Natural Resource (DENR), and the Philippine Rural Development Project (PRDP), including a host of other government agencies are being implemented to further build the sector.

Advantages

The Philippines’ most pronounced strengths in the coffee GVC relate to its geographic conditions that have allowed the industry to flourish at various points in the last century.

Geographic conditions allow for the production of all four varieties of coffee—Robusta, Arabica, Excelsa and Liberica—throughout the country. In 2015, 92% of all production was either Robusta or Arabica, with Robusta grown in the island of Mindanao and in the Southern Tagalog region (around the province of Cavite), while Arabica is concentrated in Northern Luzon—in the Benguet area and the Cordillera region. The profile affords the country opportunity to engage in both the instant coffee market that is popular throughout Asia as well as niche categories for higher-quality Arabica.

The archipelagic geography also provides natural barriers to disease. While the Philippines is not impervious to outbreaks of coffee diseases, its geography provides insulation from coffee rust disease spread by fungus spores that are dispersed through the wind.

Support from government and private sector stakeholders such as the Departments of Agriculture, Trade and Industry, Environment and Natural Resources, Science and Technology, Labor and Employment, the Cooperative Development Authority (CDA), and TESDA have provided vigorous support for the coffee industry. Likewise the Bank of the Philippine Islands, other private sector actors, as well as universities and educational institutions, are working with the CDA and local governments to distribute seedlings.

The attention from government stakeholders has accelerated the improved organization in the production segment of the chain. While still young and developing, cooperative networks have strengthened in recent years in some production regions, especially in the Arabica areas in Benguet. To cite one example, membership to the Tuba Benguet Coffee Growers Association grew from 30 to 129 from 2014 to 2016.

Challenges

Varied constraints have prevented the upgrading of the sector, and at different phases of the chain. Together, these cause low production volumes and low coffee quality, and restrict the country’s possible upgrading trajectories. Most prevalent are the Philippines’ low production levels; its emphasis on Robusta, and its lack of wet washing stations.

The limited stock of quality seedlings and lack of modern production techniques constrain upgrading of the industry. While the DA’s seedling program has had some successes in increasing input distribution to producers, the quality of the plants can be substandard, with offices other than the DA issuing deficient varieties. Meantime, aging farmers with little formal education and training -
and the lack of extension services over the past decades - continue to produce coffee using outdated agricultural techniques.

There are a handful of wet processing facilities around the country compared to dry processing facilities. This is brought about by the emphasis on lower-quality Robusta. Because of **crude post-harvest processing methods**, farmers do not benefit from the higher value Arabica, which require wet processing methods. For farmers to engage in process upgrading and improve their post-harvest capabilities, further training should also be conducted on the benefits of sorting coffee species based on optimum post-harvest processing.

Even with the government’s focus on the sector and existing cooperation among individual segments of the chain, communication often falters between the various nodes. **Lack of coordination among industry stakeholders** becomes evident at the national level, for example, with multiple government agencies offering similar services when these could be coordinated and streamlined to result into a more cohesive and effective initiative.

**Gaps in collection and distribution of research and technical knowledge** are apparent as data collected by the DA and the PSA about the country’s production volume are inconsistent with the estimates offered by international organizations such as the ICO. Furthermore, there is limited transfer of knowledge and technology from R&D centers to producers, with best practices not being adequately communicated.

Lastly, the **popularity of instant coffee** has allowed Nestlé to establish itself as the dominant consumer of the Philippines’ coffee beans. Traditionally, Nestlé has not emphasized specialty coffee or premium quality, instead accepting Robusta beans that meet minimum standards. As global trends have moved toward single-source Arabica coffee, the existing profile has required a paradigm shift for farmers seeking to enter higher-value segments.

**Preliminary Upgrading Trajectories**

The Philippines can benefit from studying countries like Vietnam and Guatemala, and countries with similar constraints and levels of development. Short, medium, and long-term measures to support upgrading involve product or process upgrading which include adopting improved technologies, generating a new product or engaging in an entirely fresh set of activities. Upgrading can also allow actors to capture greater value from their participation in GVCs.

**Process Upgrading (Short Term):** The country’s aging trees and inefficient agricultural operations have undermined productivity of the sector. Increasing yields is particularly important in improving the competitiveness of the Robusta crop. Local market demand provides producers with better potential for sales as they build up skills for the more sophisticated international market. Further, entry to the global market must also be assessed against the production of Vietnam, Brazil, and Indonesia as well as global concerns regarding the current prices of natural Robusta and Arabica.

For the Philippines, a short-term strategy would be to maximize trees that are already growing, and in the long term, considering a shift towards Arabica production may be more practical. The strong move towards product differentiation throughout the industry indicates that forward-looking investments need to be towards a higher quality product, particularly as trees take four or so years to become productive and last up to 15 years more.

**Product Upgrading (Short to Medium Term):** Achieving success in product upgrading will require overcoming constraints such as weak rural infrastructure. The Philippines is far behind global producers with respect to wet processing but can learn from the practices of other countries such as Guatemala and...
For high quality Arabica, cherry beans must be able to reach washing stations within 24 hours to maintain their quality. Good quality beans are required to serve the growing local demand for specialty coffee, including third wave coffee shops that can serve as outlets for local coffee, while producers increase skills and production to export abroad. Improved returns for coffee production can also help retain and grow young talent in the industry.

**Functional Upgrading: Branding (Medium Term):** The Philippines needs to rebuild its reputation as a coffee producer once the country has improved its production and processing techniques. Branding efforts need to be tailored to the coffee segments where origin is of importance—specialty and sustainable coffee, most prominently in Arabica. This requires raising the Philippines profile as a specialty producer, drawing buyers and roasters to the country, and creating linkages between producing organizations and buyers. These include organizing trade missions for buyers, hosting of the ‘Cup of Excellence’ competition, and developing a “compelling story” to engage socially and environmentally conscious buyers. These have been applied as part of the upgrading strategy by several coffee producing countries to enhance their competitiveness.

Marketing efforts are not necessary for the Robusta operations. So long as the country can provide competitively priced Robusta, it will have a market in the region’s instant coffee industry.

**Conclusion**

The Philippines’ footprint in coffee GVCs is relatively small but the country has established itself as a vibrant coffee market. Its most pronounced strengths in the coffee GVC relate to the geographic conditions that allowed the industry to flourish at various points in the last century. Despite recent attempts to revive the sector, farmers continue to exit the industry, production is on a downward trajectory, and processing is plagued by outdated technology. As a result, policymakers face questions about how to reverse these trends and leverage the opportunities in the domestic and, ultimately, the export markets.

Upgrading the country’s capabilities in the coffee GVC requires a broad development strategy that needs the engagement and involvement of a wide range of stakeholders. Initiatives include availability and accessibility to training programs, activities to improve human capital for farmers and other producers, support in ensuring that Philippine coffee meets enhanced quality standards, and improved marketing for the resurgence of the country’s brand of coffee.

The following table summarizes upgrading trajectories and policy recommendations for Philippine participation in the coffee GVC.
Figure 1. The Philippines and the Coffee GVC: Upgrading Trajectories and Policy Recommendations

<table>
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<tr>
<th>Time Frame</th>
<th>Upgrading Trajectory</th>
<th>Key Benefits</th>
<th>Philippines Challenges</th>
<th>Specific Recommendations</th>
<th>Transversal Recommendations</th>
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<tr>
<td>Short Term</td>
<td>Process upgrading in production of natural Robustas &amp; Arabicas</td>
<td>• Increased productivity • Lower unit costs increase competitiveness of local coffee • Allow for build-up of skills to potentially engage in export market</td>
<td>• Low yields due to aging trees, outdated production techniques • Farmers approaching retirement • Competition from regional peers such as Vietnam</td>
<td>• Engage in more expansive training to ensure increased adoption of best agricultural practices • Focus on tree rejuvenation program • Encourage increased cooperation among coffee growers through CDA programs to improve economies of scale, reduce cost of inputs through collective purchasing and facilitate dissemination of good agricultural practices • Improve market linkages between producer cooperatives and/or exporters and foreign buyers to increase competition for local beans.</td>
<td>Given the size of its domestic market, there is incentive for the government to encourage a move toward increased efficiency in the coffee value chain. Over the long term, these efforts may lead to greater participation in the coffee GVC. Across all segments of the chain, the Philippines should prioritize the following: • Strengthen coordination between all sector stakeholders, including public, private actors and educational institutions via the creation of a joint working group building on earlier Roadmap initiative.</td>
</tr>
<tr>
<td>Short Term</td>
<td>Product upgrading into higher value specialty Arabica</td>
<td>• Possible entry into lucrative export market • Increased opportunity for product differentiation • Higher unit value income • Employment in both production and processing stages of the chain</td>
<td>• Historical orientation toward Robusta supported by popularity of instant coffee, limited market signals locally about value of Arabica • Producers view coffee as a commodity • Limited access to quality seedlings • Limited knowledge of production &amp; harvesting techniques required to maintain quality • Lack of washing station infrastructure</td>
<td>• Increase plantings of Arabica and incentives for planting of seedlings in high altitude areas • Provide training regarding traceability requirements to both Arabica producers and washing station workers • Facilitate farm to washing station linkages either through supporting infrastructure or transportation alternatives to ensure timely delivery of beans post-harvest • Support an increase in the number of qualified cuppers at washing stations and dry mills</td>
<td>• As part of that effort, form sub-committees to focus on training, research, certification &amp; quality control and marketing. • Research component should improve data collection and expanded dissemination of robust research agenda. • Research should also include independent assessment of coffee production, tree ages, soil &amp; leaf analyses and agronomic techniques being used in coffee growing regions.</td>
</tr>
</tbody>
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### Short-Medium Term

#### Functional upgrading into processing with introduction of environmentally friendly washing stations

- Facilitate entry into specialty coffee market
- Encourage environmental upgrading by reducing water pollution associated with wet processing
- Build new specialty coffee reputation and brand based on sustainable practices
- Create source of inexpensive organic fertilizer

#### Over-reliance on dry processing facilities

- Insufficient capital to finance investments

#### Increase number of wet processing stations through internal and external financing strategies

- Outreach to stakeholders to communicate value of wet processing and pollution reduction
- Evaluate regulatory environment to encourage proper disposal of contaminants around wet processing sites

- Certification and quality control can spur alignment with fair trade or other standards used by global roasters.

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### Medium Term

#### Functional upgrading into branding

- Building the Philippines’ reputation as a sophisticated coffee producer
- Differentiate Philippine coffee from commodity market
- Access higher-value product segments of coffee GVC

- Erosion of country’s reputation as a coffee producer
- Underdeveloped backward linkages between retailers and domestic sector

#### Over-reliance on dry processing facilities

- Insufficient capital to finance investments

#### Increase number of wet processing stations through internal and external financing strategies

- Outreach to stakeholders to communicate value of wet processing and pollution reduction
- Evaluate regulatory environment to encourage proper disposal of contaminants around wet processing sites

- Certification and quality control can spur alignment with fair trade or other standards used by global roasters.

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### Source: Authors.
This policy brief highlights specific issues and policy implications cited in the study by the authors Penny Bamber, Jack Daly, and Gary Gereffi of Duke Global Value Chains Center (GVCC), submitted to the Department of Trade and Industry. The full study can be downloaded at www.industry.gov.ph.

The views and opinions expressed in this policy brief are of the author/s and do not necessarily reflect Philippine government policy.

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