Analysis of China’s trade with the EU and VPA countries 2007-2017

This briefing is a summary of the report ‘China’s Trade of Wood Products with EU, EU Member States, and VPA Countries’ compiled by Forest Trends and the Chinese Academy of Forestry as an output of the 2018 meeting of the Bilateral Coordination Mechanism (BCM) on Forest Law Enforcement and Governance (FLEG). The source of the data is China Customs.

Key messages

1. **China has increasingly closed its own forests from harvesting, triggering a rise in imported forest products.** Since 1998, China has introduced a series of strict forest protection measures grounded in high-level initiatives seeking to position China as a global climate leader. These factors significantly increased China’s reliance on wood product imports to meet domestic demand.

2. **China’s forest product imports are at an all-time high, but exports continue to decline, indicating higher domestic consumption.** In 2017, China’s forest product imports (including pulp and paper) reached a historic high in terms of both volume (307 million m³ roundwood equivalent (RWE)) and value (USD 51 billion). Between 2007 and 2017, exports of forest products have decreased, indicating that more imported products are being consumed within China itself. In 2007, China imported just 1 million m³ RWE more than it exported, but by 2017, this gap had grown to 77 million m³ RWE.

3. **China’s imports are dominated by logs and sawnwood but are shifting to more semi-processed wood products.** In the early 2000s, China’s import mix was almost exclusively raw forest products: logs and minimally processed sawnwood. By 2017, China was still heavily reliant on raw materials to feed its wood processing industries.
but was increasingly importing semi-processed and finished wood products, such as particleboard and veneer, albeit in comparatively small volumes. Logs and sawnwood account for a combined 80% by volume and value of total timber product imports, with woodchips constituting an additional 15% by volume and 8% by value. Pulp and paper imports also reached record highs in 2017, increasing by nearly 25% from 2016 to 2017 alone.

4. **Between 2007 and 2017, China’s direct imports from countries implementing or negotiating a Voluntary Partnership Agreement (VPA) with the European Union (EU) on Forest Law Enforcement, Governance and Trade (FLEGT) increased by 113% by volume, and 136% by value, representing 15% of all of China’s forest product imports.** China’s imports from VPA countries hit record highs in 2017, at 42 million m³ RWE by volume and USD 8 million by value. Imports from these 15 countries represent approximately 15% of all forest products imported into China from source countries around the world. The majority of forest product imports from VPA countries are from Indonesia, Malaysia, Vietnam and Thailand.

5. **China is the second largest importer of timber from VPA countries.** Global imports of forest products from FLEGT-VPA countries reached USD 35 billion in 2017. Consumption of forest products from VPA countries has shifted (up for some countries, down for others) since 2007, due in part to the economic crisis of 2008-2009, and growth in Asian markets, including China, the Republic of Korea, Vietnam and others. China is now the second-largest direct importer of timber from VPA countries, behind the United States (US). In contrast, the EU’s share of direct imports from VPA countries fell from 35% in 2007, to 16% in 2017. Based on all countries’ reported imports, China’s market share of forest product imports from VPA countries more than doubled over the period 2007-2017. In 2017, China imported nearly a quarter of global reported imports from VPA countries.

6. **More than half of China’s timber product exports were bound for regulated markets.** As of 2017, more than half (52%) of China’s timber product exports were bound for countries (the US, the EU, Australia, and most recently, Japan) with operational measures aiming to exclude illegally harvested timber from their imports. With Korean legislation entering into force in 2018, and three VPA countries – Vietnam, Indonesia and Malaysia – developing similar measures, the Chinese industry will need to adapt to a new global consensus favouring demonstrably legal timber.

7. **Exports to the EU at an all-time high in 2017 by value but have stayed flat by volume.** Overall, exports of all forest products to the EU have increased by more than 50% by value, but just 0.5% by volume, indicating that EU consumers are purchasing fewer, but higher-priced goods from China, chiefly wood furniture. Three quarters of China’s exports to the EU are bound for just five countries: The United Kingdom (UK), Germany, France, the Netherlands and Belgium.

8. **Continued difficulty in tracking wood products from import to export points.** Because there are no mandated, robust chain of custody systems, and no Chinese import regulations ensuring that all imports are verified as legal, it is challenging to trace wood material sourced in VPA countries (or others), processed in China, and ultimately exported to the EU.
9. **China’s forest product imports from some tropical forested countries are at high risk of being harvested or processed in contravention of the law.** Forest Trends assessed China’s overall forest product imports, with a focus on imports from VPA countries, across three ‘risk indicators’ that are tied to illegal logging: poor governance, conflict, and the presence of a full or partial log export ban (LEB):

- **Governance:** 38% of China’s timber product imports are from countries deemed to have ‘high’ or ‘highest-risk’ of poor forest governance and associated links to illegal logging, defined as such by 14 indices of business, political, governance and corruption risks. This represents a significant decrease, down from over two thirds in 2007. Countries supplying pulp and paper to China, on average, receive a lower risk rating.

- **Conflict:** In 2017, China imported more than USD 2 billion of timber products from countries on the World Bank Harmonized List of Fragile Situations. This represents 8% of total imports, but nearly a fifth of hardwood log and sawnwood imports. Five out of the 15 VPA countries are on the Harmonized List of Fragile Situations: The Republic of the Congo, the Democratic Republic of the Congo (DRC), the Central African Republic, Côte d’Ivoire and Liberia.

- **Log export bans:** From 2007-2017, China imported close to USD 18 billion of logs from 33 countries with either full or partial LEBs. In 2017, nearly a quarter of imports were from the 10 VPA countries with active LEBs.

10. The following developments are poised to impact China’s wood product trade from 2018 onward:

- **US-China trade war:** Trade friction between the US and China has resulted in a series of escalating tariffs on billions of dollars’ worth of products, with material impact on China’s wood product export market. More than a third of all timber product exports from China (by value, as of 2017) are bound for the US, including furniture, wood flooring and plywood. In order to avoid these tariffs, many Chinese exporters have begun re-routing Chinese-manufactured timber products through Vietnam before export to their final destination.

- **Economic slowdown:** China’s economy, a long-time driver of global growth, appears to be slowing, as evidenced across a number of indicators. Annual GDP growth fell from 14.2% in 2007, to just 6.7% in 2016 – its weakest rate in 26 years – before bouncing back slightly in 2017. The country’s housing market is a key driver of the national economy and demand for wood materials. Since its boom in the early 2010s, it has fallen and now appears headed for a recession. In 2018, China International Capital Corporation predicted that new home sales could slide as much as 10%. Other analysts predict as much as a 10% decline in prices and sales volumes. If this results in fewer homes being built, it will have significant impact on domestic demand
for wood material for China’s construction industry, as well as furnishings, flooring and decoration.¹

**Domestic consumption**

Since 2007, China’s economy has grown steadily, supported by various Government stimulus packages, infrastructure projects, and a housing development boom. China’s middle class also expanded rapidly and is expected to rise further, from 430 million in 2017 to 780 million by the mid-2020s. The growing number of middle-class consumers has stimulated consumption of wood products in the forms of furniture and interior decoration and bolstered the construction industry. This growing consumer class is challenging the countervailing narrative of China as the ‘world’s factory,’ with the bulk of its production ultimately consumed in other (often wealthier) countries. On the contrary, in 2017, exports accounted for less than 20% of China’s total wood consumption, indicating the relative dominance of domestic sectors (Figure 1).

**Figure 1. China’s wood product consumption, 2017 (10 000 m³)**

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<thead>
<tr>
<th>Sector</th>
<th>Percentage</th>
<th>Value (10 000 m³)</th>
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<tbody>
<tr>
<td>Exports</td>
<td>100%</td>
<td>17,274</td>
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<tr>
<td>Coal industry</td>
<td>50%</td>
<td>8,638</td>
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<tr>
<td>Farmers’ Uses</td>
<td>30%</td>
<td>5,104</td>
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<tr>
<td>Others</td>
<td>15%</td>
<td>2,552</td>
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<tr>
<td>Others</td>
<td></td>
<td>2,454</td>
</tr>
<tr>
<td>Others</td>
<td></td>
<td>2,731</td>
</tr>
<tr>
<td>Others</td>
<td></td>
<td>6,601</td>
</tr>
<tr>
<td>Others</td>
<td></td>
<td>693</td>
</tr>
<tr>
<td>Others</td>
<td></td>
<td>10,649</td>
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</tbody>
</table>

Source: NFGA, 2018

¹ The decline of China’s housing market may also be due to other factors closely linked to the country’s construction sector, including rapidly growing consumer debt (affecting home-buying behaviour), efforts to control pollution in the building industry, and demographic factors including a slower rate of growth in major cities and an aging population more generally.
Trends in export markets

While imports and domestic demand grew rapidly, China’s exports of wood products have grown at a slower pace. This is due to a number of factors, including: increasing labour costs in China leading manufacturers to relocate; the aforementioned rise in domestic consumption resulting in lower volumes of Chinese-manufactured goods being sold to other countries; and uneven economic recovery following the 2008 global financial crisis.

In recent years, the Chinese wood industry has faced new challenges on the international market, particularly from emerging market manufacturing hubs (such as Vietnam) with low labour costs and abundant resources. It has therefore made efforts to transform and upgrade in order to remain competitive with buyers in both traditional markets in the ‘global north’ as well as emerging economies in Asia, Latin America and the Middle East. In addition, industry leaders are currently marketing exports to Belt and Road Initiative (BRI) countries now engaged in Chinese-supported infrastructure and other development projects in the hope to further strengthen economic ties with these countries.

There is a growing global consensus towards excluding illegally logged timber from consumer markets for wood product imports by way of ‘demand-side’ regulations. Some of China’s main markets for forest products have instituted such import controls, and the percentage of China’s exports to these markets have increased from around 20% in 2008 (when the US Lacey Act was introduced), to over 50% in 2017. Since 2016, the Republic of Korea, Japan, Vietnam, Malaysia and Indonesia have taken steps to develop similar import controls. However, at present, these controls are only operational in Japan and the Republic of Korea. Vietnam, Indonesia and Malaysia are still in the design stages.

In 2008, when the US Lacey Act was the only operational demand-side legislation, just 32% of China’s timber product exports by value were bound for regulated markets. By 2017, with the introduction of Japan’s legislation, this figure had increased to 62%. These two markets, plus the Republic of Korea, Indonesia, Vietnam and Malaysia, accounted for over 70% of China’s timber product exports in 2017. Chinese exporters’ incentives to trade only in legal timber is therefore significant.

China’s imports from VPA countries

The market share of forest products imported from VPA countries (versus all other supplier countries) has hovered between 20-25% over the past decade, peaking at 26% in 2014 (Table 1). Thailand, Vietnam and Indonesia maintain the largest market share among VPA countries, with over 7% of China’s timber products imported from Thailand in 2017. Imports from Thailand, Laos, DRC and Ghana each grew considerably between 2007-2017, while imports from Liberia and Honduras surged – each by a factor of more than 10 000%—though they remain small in absolute terms. For pulp and paper, the market share of VPA countries is quite small, at just over 10%. Indonesia alone accounts for the vast majority of that figure.

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2 This figure includes exports to the US (Lacey Act), the EU (EU Timber Regulation, 2013), Australia (Illegal Logging Prohibition Act, 2013), and Japan (Clean Wood Act, 2017).
Table 1. Percentage of China’s total timber product imports from VPA countries, 2007-2017, by value

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</thead>
<tbody>
<tr>
<td>VPA countries</td>
<td>23.6%</td>
<td>22.4%</td>
<td>23.3%</td>
<td>23.4%</td>
<td>21.6%</td>
<td>24.9%</td>
<td>24.5%</td>
<td>26.1%</td>
<td>25.8%</td>
<td>23.8%</td>
<td>21.3%</td>
</tr>
<tr>
<td>All other countries</td>
<td>76.4%</td>
<td>77.6%</td>
<td>76.7%</td>
<td>76.6%</td>
<td>78.4%</td>
<td>75.1%</td>
<td>75.5%</td>
<td>73.9%</td>
<td>74.2%</td>
<td>76.2%</td>
<td>78.66%</td>
</tr>
</tbody>
</table>

In total, China imported 25.5 million m³ RWE of timber products (valued at USD 5.2 billion) from VPA countries in 2017, an increase of more than 170% from 2007 levels by both volume and value. Timber imports peaked by value in 2014, and by volume in 2016. Pulp and paper imports decreased following the global financial crisis, recovered steadily until 2016, and then nearly doubled – from just under 10 million to 16.3 million m³ RWE, and USD 1.5 to USD 2.9 billion – from 2016 to 2017 alone.

Figure 2. China’s total forest product imports from VPA countries, 2007-2017, by volume and value

Indonesia is the primary VPA country supplying China with pulp and paper. China’s pulp and paper imports from Indonesia nearly tripled between 2007 and 2017, from 5.3 to 14.7 million m³ RWE and from USD 928 million to USD 2.5 billion. Year-over-year growth from 2016 to 2017 was over USD 1 billion. China also imports pulp and paper from several other VPA countries, namely Thailand, Vietnam and Malaysia, albeit in small volumes.
Vietnam, Thailand, Indonesia and Malaysia together comprise nearly 90% of China’s timber imports from VPA countries. The ratio of imports from these four countries has shifted over the years. In 2007, Malaysia was the top VPA country supplying China, capturing 27% of the market; it has since fallen to just 5%. Nonetheless, their combined market share has not dipped below 75%. Imports from Gabon fell from 20% of the total product mix by value to just 4.5%. Six VPA countries – Honduras, Côte d’Ivoire, DRC, Guyana, the Central African Republic, and Liberia – supplied less than 1% of China’s timber imports from VPA countries in 2017 by both volume and value.

From 2007 to 2017, China imported USD 15 billion of sawnwood, USD 12 billion of logs, and USD 8 billion of woodchips from VPA countries (out of a total of USD 42 billion in imports). By volume, woodchips were by far the largest category, comprising 46% of the total.
Figure 4. China's timber product imports from VPA countries, 2007-2017 (all years), by volume and value
China’s exports of timber products

Between 2007 and 2017, China’s top buyers of timber products were the US (35%), the EU (16%), Japan (7%), Hong Kong and Australia (both 4%). Figure 5 below shows China’s top 25 destination countries for timber product exports, which together comprise 93% of exports in 2017. While the absolute value of exports to the EU has increased from USD 4 to 6 billion over the past decade, the European market share has slipped from its pre-financial crisis peak of 23% in 2008.

Figure 5. China’s timber product exports by country (top 25), 2007-2017, by value

The top 25 export destinations for Chinese pulp and paper comprised 87% of total exports by value in 2017. Of note are increases in exports to several emerging Asian markets, such as Vietnam – which went from China’s 18th largest destination for pulp and paper exports to the fifth. Exports to Malaysia are also up, increasing from USD 160 to USD 800 million from 2007 to 2017.
China’s exports of timber products to the EU and EU Member States

As China’s export markets diversified – driven in part by increased demand for wood products from other emerging economies – the share of total exports to the EU has decreased. In 2017 alone, China exported forest products to 216 countries or territories. Only 18% of timber products by volume, and 16% by value, were bound for the EU. At its peak, in 2008, 23% by volume (21% by value) of China’s timber product exports were bound for the EU. An even smaller portion of China’s pulp and paper exports – 9% by volume, and 12% by value – were sent to EU Member States in 2017. Over time, however, this figure has held steady by value but dropped over 30% by volume, indicating that China is exporting higher-value pulp and paper products to the EU.

China exported 10 million m³ RWE (valued at USD 5 billion) of timber to EU Member States in 2017. While this represents a small increase compared to 2007 levels, there is considerable variation over the course of the decade, more so by volume than by value. Exports dropped sharply from 2008 to 2009, finally surpassing 2007 levels in 2014, only to fall again in 2016 and recover the following year. By both volume and value, the top export destinations for Chinese timber are the UK, Germany, France, the Netherlands and Belgium, although these countries were not necessarily the final points of consumption.
Figure 7. China’s exports of timber products to EU Member States (plus Norway and Switzerland), by country, 2007-2017, by volume and value.
Exports of pulp and paper to the EU fell from 2.5 to 1.8 million m³ RWE from 2007 to 2008 alone, due primarily to a sudden decline in exports to Italy and Belgium. Despite rising steadily from 2013 onward, they have still not reached the same level. By value, however, exports increased over 130%, from USD 992 million in 2007 to USD 2.3 billion at their peak in 2015. In addition to the top EU importers of Chinese timber, China exports large amounts of pulp and paper to Italy, Spain, Poland, Sweden and Greece.

Figure 8. China’s exports of pulp and paper products to EU Member States (plus Norway and Switzerland), by country, 2007-2017, by volume and value
Wood furniture dwarfs all other timber products exported from China to the EU, comprising 60% of exports by value and volume in 2007. Over one third of timber product exports to the EU by volume – but just 13% by value – are plywood. Conversely, 10% of exports by volume, but 3% by value, are ‘other articles of wood.’

Of the USD 33 billion-worth of wood furniture exported from China to the EU from 2007-2017, over a third was destined for the UK. A similar proportion of China’s plywood exports to the EU are also bound for the UK, with another 15% imported by Belgium. Germany and the Netherlands respectively import 20% and 15% of ‘other articles of wood’.
Figure 9. China’s top 15 timber product exports to the EU, 2007-2017, by value

Figure 10. China’s top 10 timber products to the EU, by destination EU Member State, 2007-2017 (all years), by value
Comparison to other major export markets

In 2017, for the first time ever, more than 50% of China's timber product exports were destined for markets with import control regulations. With the introduction of Korean legislation in 2018, this proportion is set to increase further. In total, in 2017, China exported 34 million m$^3$ RWE to markets with operational measures or those with similar measures under development (Asian markets including Malaysia, Vietnam and Indonesia), and 22 million m$^3$ RWE to all other markets. Given the rise in demand for legal timber, Chinese companies will need to provide evidence of the legality of wood products exported to 'regulated' markets – particularly for composite or processed products with material originally harvested in high-risk countries. Following on the above analysis of China's exports to the EU, this section briefly describes China's exports to other regulated markets.

Figure 11. China's timber product exports to regulated vs. unregulated markets, 2007-2017, by volume

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3 Figure 11 includes consumer markets as of the year that import control measures – US Lacey Act (2008), EUTR (2013), Australia Illegal Logging Prohibition Act (2013), and Japan Clean Wood Act (2017) entered into force to show the scale of Chinese exports to ‘sensitive’ markets, but recognising that a) some of these laws take effect mid-year, and b) it may be months or years before enforcement capacity and modalities are fully developed.
US

China exported a record USD 16 billion of forest products in 2017, nearly double the value of exports a decade earlier. Exports are expected to decrease from 2018 onward given the US-China trade frictions and various anti-dumping and countervailing duties imposed on Chinese exports. More than half of timber product exports to the US are wood furniture.

Figure 12. China’s forest product exports to the US, 2007-2017, by value

Australia

While China’s forest product exports to Australia have nearly tripled since 2007, reaching USD 2.2 billion in 2017, they remain far below those to the US.
Asian markets developing import legislation

Between 2007 and 2017, China exported over USD 75 billion in forest products to Japan, the Republic of Korea, Malaysia, Vietnam and Indonesia. Over half of these exports were destined for Japan. These markets increasingly rely on imported, finished wood products, with wood furniture and paper comprising more than two thirds of total trade value. Exports to Malaysia and Vietnam in particular have increased in the past decade, by a factor of 400% and 500% in 2017 relative to 2007 levels, respectively. Exports to Japan peaked in 2015, and to Indonesia in 2014, and have since tapered slightly.
China’s imports from countries with LEBs

China is not alone in restricting the harvesting and export of timber from natural forests. An increasing number of tropical forested countries are enacting full or partial LEBs or other policies to restrict or prohibit the export of raw logs. The aim of these policies is generally twofold: to protect forests while bolstering domestic value-adding processing industries. Log export restrictions range from comprehensive bans on all raw or crudely processed logs, to more narrow, partial bans targeting certain types of timber, specific tree species, or distinct regions of harvest. The existence of these bans could indicate a declining availability of logs for import into China – although China’s log imports continue to increase year over year.

In 2017, Chinese companies imported more than USD 2 billion of logs from 33 countries with either full or partial LEBs, amounted to 22% of China’s total imports of logs from all countries – but nearly half (46%) of total hardwood log imports. Logs sourced from a country with a full LEB policy are likely to be considered illegally sourced. Logs imported from countries with partial LEB policies should signal an increased risk that companies could be violating the
specific aspects of each exporting country’s LEB policy, and further due diligence assessments and risk mitigation would be needed to rule out the possibility of LEB violations.\(^4\)

**Figure 15. China’s log imports from countries with active LEBs, 2007-2017, by value**

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\(^4\) To assess the risk that China is importing timber in contravention of source country export regulations, Forest Trends compiled a list of countries with known LEBs in place to analyse China Customs data for imports categorised under HS Code 4403 (wood in the rough, or roughly squared). For the purposes of this study, log exports from Canada, New Zealand and the US were not included (given their high forest governance capacity and low risk of illegal exports). Log exports from Albania (China Customs did not report imports from Albania), or from China itself, are also excluded. This study, therefore, looks at log imports from the remaining countries. The full list of known export bans is available at [https://www.forest-trends.org/known-log-export-bans/](https://www.forest-trends.org/known-log-export-bans/).