RECENT EVOLUTION OF DEVELOPED-ECONOMY MSME PARTICIPATION IN INTERNATIONAL TRADE

Research note #1
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SUMMARY

Micro, small and medium-sized enterprises (MSMEs) comprise 94 per cent of industrial firms in Organisation for Economic Co-operation and Development (OECD) member economies but have relatively lower trade participation compared to larger firms, accounting for only 36 per cent of exports and 41 per cent of imports.

Large firms continue to dominate trade in capital-intensive sectors (e.g., mining and quarrying, manufacturing, and energy-related industries) in OECD countries, whereas MSMEs outperform in some of the services industries, such as real estate or administrative and support services activities.

Since the 2016 World Trade Report’s examination of the participation of MSMEs in global trade, MSMEs have gained in importance in terms of the total share of both their export and import values in the OECD countries examined.
INTRODUCTION

MSMEs, defined in this research note as firms employing less than 250 employees, represent around 95 per cent of all companies globally, and 60 per cent of total global employment (WTO, 2020) – numbers that indicate their economic importance throughout the world. MSMEs have also been recognized as catalysts in promoting economic growth and development (Gade, 2018). However, MSMEs have historically had much lower rates of participation in international trade than large firms, partly due to barriers such as access to information and lack of financing, that continue to hinder MSME international trade participation. Although new technologies have presented new opportunities, inherent resource constraints including in terms of human and financial capital mean that MSMEs are significantly less competitive in trade than large firms.

According to the 2016 World Trade Report (WTO, 2016), which reported findings on MSME trade participation in developed and developing economies, available data from that time indicated that, the larger a firm in a developed economy, the more likely they were to trade internationally. At the time, MSMEs accounted for only 34 per cent of exports on average in developed economies, despite the fact that more than 90 per cent of all firms were MSMEs. To provide more insights into MSMEs in international trade participation, for this research note we have updated the MSME trade information provided in Section B of WTO (2016) for developed economies using data from the OECD’s Trade and Enterprise Characteristic (TEC) database. These data have allowed us to track the evolution of MSME trade performance in developed economies over time since WTO (2016).

TRADE BY ENTERPRISE SIZE IN DEVELOPED ECONOMIES

According to the most recent figures available in the OECD TEC data from 2018 unless otherwise noted, MSMEs account for roughly 94 per cent of total industrial firms in the OECD economies reviewed. Despite their prevalence among industrial firms, total MSME shares in direct exports accounted for only 36 per cent of the value of total exports. On the import side, MSME gross import shares in developed countries are comparably larger than their shares in exports (41 per cent of the value of total imports), a finding confirmed by WTO (2016). These results are also consistent with the general finding that MSMEs which participate in international trade are more likely to be import-oriented (Lanz et al., 2018).

Although MSMEs trade relatively less than large firms, there is a great deal of variability across countries (see Figure 1). MSMEs, particularly in smaller economies like Cyprus, Latvia, Estonia and the Netherlands, make up a higher share of the economy’s total exports and account for more than 50 per cent of export value. This contrasts with larger economies such as France, Germany and the United States, where the value of MSME exports is less than one-third of the total.

In the aggregate, MSMEs account for more than 50 per cent of imports in 20 out of 33 countries, substantially more than for exports. As with exports, smaller economies tend to report larger shares of MSME import values than larger economies.

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1 The present note was prepared by Emmanuelle Ganne, Zakaria Imessaoudene, and Kathryn Lundquist, Economic Research and Statistics Division of the WTO. The authors would like to thank Hongxiao Luo, Lily Luo and Zhengyu Ren from Brandeis University for their 2021 analysis of MSME participation in international trade, which served as the starting point for this note.

2 MSME size classes in the OECD TEC data are based on numbers of employees, with micro firms categorized as those with less than 10 employees, small firms as those with 10 to 49 employees; medium-sized firms as those with 50 to 249 employees; and large firms as those with more than 250 employees. In analysing the data, the following groups were collated: micro, small, and medium-sized firms as MSMEs; small and medium-sized firms as SMEs; and large and “unknown”-sized firms as “Other”.

3 The Slovak Republic is an exception in this regard, as the value of its MSME exports make up only 28 per cent of its total exports. One possible reason for this may be reporting, given that there is a high level of firms of an unknown size for this economy.

4 Data for Canada, Estonia, Israel, and the United States are not yet updated in the TEC database and therefore use 2017 figures; however, for some graphs, data for the United States are from 2015 (where indicated).
Figure 1: MSME shares in the US dollar value of exports and imports for available developed economies, 2018 or the latest year

Note: Figures for Canada, Estonia, Israel and the United States are based on latest figures available in the TEC database and refer to 2017.
Despite their relatively small shares in the US dollar value of exports and imports, MSMEs still represent the majority of trading firms in most developed economies (see Figure 2). For example, in Italy, the Netherlands and Slovenia, MSMEs hold the lion’s share of exporting firms, accounting for upwards of 99 per cent of the total number of trading firms. The share of exporting firms that are MSMEs in large economies is generally high as well, for example in Germany (97 per cent), France (80 per cent) and the United Kingdom (97 per cent).

On the import side, the five economies with the largest MSME share in all of their trading firms are Slovenia (99 per cent), Italy (99 per cent), Austria (99 per cent), Spain (99 per cent) and Finland (98 per cent). The countries with the smallest MSME shares are Belgium (34 per cent) and Iceland (58 per cent). However, one explanation for these lower numbers may be the more limited availability of data, as the numbers of employees are not reported for 65 per cent of Belgian firms and 41 per cent of Icelandic firms. All the other countries reviewed have shares of MSME traders that are greater than 70 per cent.

Figure 2: MSME shares of exporting and importing companies in available developed economies, 2018 or latest year (per cent)

Note: Figures for Canada, Estonia, Israel and the United States are based on latest figures available in the TEC database and refer to 2017).

Source: OECD TEC database.

5 Certain statistics rely on information from national sources that may have different schedules for updating as well as slightly different coverage.
MSME TRADE BY SECTOR IN DEVELOPED ECONOMIES

Looking at the state of MSME trade in 2018 in Figure 3, it appears that MSME shares in exports and imports in developed economies are more services-oriented when compared to other product categories. One observation that stands out is that MSMEs import more services than any other economic sector; however, when it comes to exports, the value generated by MSMEs exporting manufactured goods and services is split almost evenly. Another observation worth noting is that more capital-intensive services, like mining, and certain manufacturing industries, are typically dominated by the larger enterprises, as is made evident by the lower percentages.

Figure 3: MSME trade values for exports and imports by product category, 2018 (percentage)

![Pie charts showing MSME trade values for exports and imports by product category, 2018 (percentage)]

Note: Figures for Canada, Estonia, Israel and the United States are based on latest figures available in the TEC database and refer to 2017.
Source: OECD TEC database.

Figure 4 illustrates the dollar values of trade flows according to firm size and sector in 33 developed economies available from the OECD Database. Exporting MSMEs account for over 50 per cent of the dollar value of trade flows in most industries, and the top three sectors in which they are active are: (1) other services activities (including activities of membership organizations, repair of computers and personal household goods and other personal services activities) (87 per cent), (2) real estate activities (86 per cent), and (3) agriculture, forestry, and fishing (76 per cent). Micro firms appear to have come to dominate certain sectors, such as real estate activities and public administration, defence, and social security, when compared to figures provided in WTO (2016), although this change can partly be traced to the inclusion of new economies in the TEC database, as is discussed later in this note.

Overall, a general trend that can be observed is that exporting MSMEs tend to thrive in less capital-intensive sectors. Conversely, large firms naturally have a competitive advantage in sectors like mining and quarrying (76 per cent), financial and insurance activities (75 per cent), and manufacturing (71 per cent).

On the import side, the sectors with the most MSME shares by gross import are: (1) public administration, defence and social security (92 per cent), (2) real estate activities (88 per cent), (3) agriculture, forestry and fishing (82 per cent), and (4) water supply, sewerage and waste/remediation (81 per cent). Thus, like exporting firms, importing MSMEs make up the largest share of firms in real estate activities, public administration, and agriculture, forestry and fishing. Large import-oriented firms also share similarities with their exporting counterparts, as they congregate around more capital-intensive industries and benefit from economies of scale, such as manufacturing (79 per cent), financial and insurance activities (77 per cent), and mining and quarrying (73 per cent).

Overall, a general trend that can be observed is that exporting MSMEs tend to thrive in less capital-intensive sectors.

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6 Additional economies include Iceland, Israel and Switzerland. Turkish figures were dropped from the analysis because they have not been updated since 2015.
Recent evolution of developed-economy MSME participation in international trade

Figure 4: Trade values by sector – 2018 or latest year (percentage)

Note: Figures for Canada, Estonia, Israel and the United States are based on latest figures available in the TEC database and refer to 2017.
Source: OECD TEC database.
EVOLUTION OF DEVELOPED ECONOMY MSME TRADE PARTICIPATION SINCE 2013

When comparing the figures from 2013 with those from 2018, MSMEs still account for less than half of the value of exports and imports, although their share has increased slightly. From 34 per cent of export value in 2013, MSMEs’ share of export value rose to 36 per cent in 2018, and their total import value rose from 38 per cent in 2013 to 41 per cent in 2018. Although MSMEs comprise a higher share of traders, overall, the value of these exports and imports remains relatively low.

Consistent with the findings from WTO (2016), there is a positive relationship between the size of MSMEs and their trade participation in developed economies. In Figure 5, we can see that, as the size of enterprises increases, the percentage of exporting and importing industrial firms also steadily rises. A greater percentage of medium-sized and large firms engage in international trade, ranging from 74 to 89 per cent on the export side, and from 75 to 90 per cent on the import side, compared to 11 to 44 per cent for micro and small firm exporters, and 44 to 47 per cent for importers.

Figure 5: Percentage of industrial firms that are exporting and importing by enterprise size, 2013 and 2018

Note: Figures for the United States data refer to 2015. Iceland, Israel and Switzerland were also removed for comparison purposes as these economies were not included in the WTO (2016) analysis.

Source: OECD TEC database.

7 Because of additions and changes to available data since WTO (2016), only the following 28 countries were included in the comparison of 2013 and 2018 data for consistency reasons: Austria, Belgium, Bulgaria, Canada, Croatia, Cyprus, Czech Republic, Denmark, Estonia, France, Germany, Greece, Hungary, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Poland, Portugal, Romania, Slovak Republic, Spain, Sweden, United Kingdom and United States.
Comparing the share of MSME exporters and importers between 2013 and 2018, the share of exporting micro firms, which have between one and nine employees, did not change during that period, whereas the share of importing micro firms rose by 2 per cent. All other classes of firms, in terms of size, showed a marginal percentage increase in the shares of exporting and importing firms between 2013 and 2018, especially for medium-sized and large firms. Small and medium-sized importers increased the most, rising by 5 per cent and 6 per cent respectively by 2018.

In terms of trade value, as Figure 6 shows, 18 out of the 30 countries observed in the 2018 OECD data saw at least a 1 per cent increase in their shares of exports in overall MSME trading value, whereas the remaining 12 have either experienced a percentage decrease or remained the same. Several countries showed significant positive changes in MSME exports over the five-year period, namely Cyprus (26 per cent), Luxembourg (22 per cent), the Netherlands (21 per cent) and Belgium (19 per cent). MSME imports rose significantly in those same economies: by 18 per cent in Luxembourg, by 17 per cent in the Netherlands, by 16 per cent in Belgium, and by 6 per cent in Cyprus.

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**Note:** Due to discrepancies in the data on firm size from 2013, the countries in green represent significant changes in the number of reported firms under the "unknown" category (i.e., in which the size of the firm and number of employees are unknown). Significant changes refer to reported unknown-sized firms in 2018 that equalled zero, or less than half, of those reported in 2013.

**Source:** OECD TEC database.
Most economies reported an increase or no change in the number of MSME exporters and importers between 2013 and 2018 (see Figure 7). Countries like Cyprus and Slovenia reported a significant increase in the number of exporting MSMEs, whereas Luxembourg and Ireland saw increases in MSME importers. The reported figures from Romania indicated a growing economy, as the number of both importing and exporting MSMEs expanded significantly.

While most reporting economies indicated an increase, or no change, in shares of MSME trade, a handful of respondents reported declines, with the largest decrease seen in Croatia (see Figure 7). Discrepancies in 2013 in terms of firms in the “unknown” category (i.e., in which the size of the firm and number of employees are unknown) could play a significant role in returning large percentage changes for countries like Germany, Italy and Spain. Regardless, overall, when observing both Figures 6 and 7 it seems that, as the share of MSMEs increases, their share of trade also grows.

Figure 7: Changes in the numbers of trading MSMEs, 2013 to 2018

Note: Due to discrepancies in the data on firm size from 2013, the countries in green represent significant changes in the number of reported firms under the “unknown” category (i.e., in which the size of the firm and number of employees are unknown). Significant changes refer to reported unknown-sized firms in 2018 that equalled zero, or less than half, of those reported in 2013.

Source: OECD TEC database.
As briefly mentioned above, one of the issues observed when comparing the share of MSME exporters and importers between 2013 and 2018 was that countries reporting large numbers of unknown-sized firms also counted the lowest shares of MSMEs. While it is possible that some of these unknown-sized firms may fall under the MSME category, they were categorized as “other” for the sake of the figures, since no official record of the number of their employees has been provided. Challenges associated with obtaining information concerning categories of firms may be responsible for these discrepancies. For example, in 2013 certain economies, including Germany, Spain and Greece, had large shares of unknown-sized firms, but by 2018, most, if not all, firms had been catalogued according to their respective sizes, thereby showing a potentially false increase in the share of MSMEs. In fact, when looking at the latest data, there now appears to be a much smaller proportion of firms that specify an unknown number of employees.

According to a comparison of 2013 and 2018 exports and imports by sector (see Figure 8), it appears that among MSMEs in developed economies, trade values for both exports and imports have remained relatively unchanged over the last five years. MSMEs continue to play a large role in service-based industries, especially in import-oriented tendencies. They have also remained steadfast in adhering to the less capital-intensive industries, as indicated by the lower share in overall trade value for agriculture and mining in both exports and imports.

Figure 8: Exports and imports of MSMEs in selected developed-economy countries by product category, comparing 2013 and 2018 figures (percentage)

Source: OECD TEC database.

Noticeably, between 2013 and 2018, MSMEs increased their share of exports in real estate activities and administrative and support activities (see Figure 9, as well as figures 10 and 11 for comparisons of trade values by sector in 2013 and 2018). The share of MSME exporters declined substantially for arts, entertainment and recreation. The category “other services activities”, which includes activities of membership organizations, repair of computers and personal household goods and other personal service activities, remained the sector with the largest share of MSME exports by value, while agriculture, forestry and fishing remained an important MSME trade sector.

MSMEs also significantly increased their share of imports in 2018 compared with 2013. MSMEs continued to be large importers of agriculture, forestry and fishing services; water supply sewerage and waste/remediation services; and construction services. Education services was another area in which MSMEs increased their imports, whereas imports of arts and entertainment, as well as electricity, gas, steam and air conditioning, fell.
Figure 9: Industrial firm trade values by sector, 2018 (or latest year) compared with 2013 (percentage)

Source: OECD TEC database.
Figure 10: Share of trade values by sector in 2013 and 2018, exports

Source: Figures based on 2013 and 2018 data (or latest available information) from the OECD TEC Database.
Figure 11: Share of trade value by sector in 2013 and 2018, imports

### 2013

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### 2018

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**Source:** Figures based on 2013 and 2018 data (or latest available information) from the OECD TEC Database.
CONCLUSION

Having updated and compared the figures in the WTO's 2016 World Trade Report (WTO, 2016) to the latest available figures in the OECD TEC Database, this research note finds that MSMEs continue to participate relatively less in international trade compared to large firms, although their share of trade value, in terms of both exports and imports, has increased.

The share of MSMEs in imports was found to be higher than in exports, confirming the trend originally observed in WTO (2016). In line with the increasing share of MSME trade value, the percentage of industrial MSMEs that are exporting and importing increased for all firms with one exception, micro firms, which stayed unchanged for exports and rose only slightly for imports. This finding may indicate that, although the trade landscape is allowing more firms to enter, it remains relatively harder the smaller the firm. In terms of sectors, MSMEs continue to be more likely to trade in less capital-intensive sectors, and their share of exports and imports of real estate services increased substantially in this follow-up study. One positive change to the data is that countries have become better at reporting the different-sized firms in their economies as fewer unknown figures were found in the 2018 data. Overall, compared to the 2013 data, there are now more traders across the board.

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