## Box 1.2: Rising Contribution of Services Exports to the Singapore Economy

### Services-oriented activities are growing in importance in the Singapore economy

The services sector is playing an increasingly important role in the Singapore economy. With the growth of exportable services industries such as finance & insurance and wholesale trade over the years, and as manufacturing industries progressively move into knowledge- and skill-intensive services activities, the Singapore economy has become more services-oriented. Indeed, services' share of Singapore's nominal Gross Domestic Product (GDP) has gone up over the last decade, from 64 per cent in 2003 to 70 per cent in 2013. Correspondingly, the share of manufacturing in the economy has moderated from 26 per cent to 19 per cent over the same period. This phenomenon is not unique to Singapore; several developed economies including Japan, Denmark, Sweden, France and the United Kingdom have also experienced a rising share of services as a proportion of GDP over the past decade (Exhibit 1).

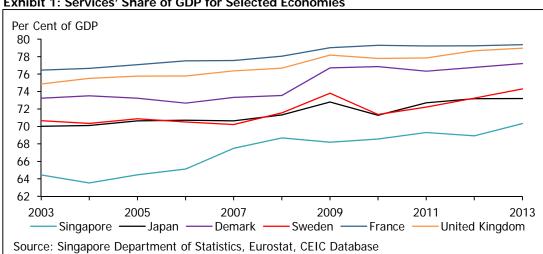
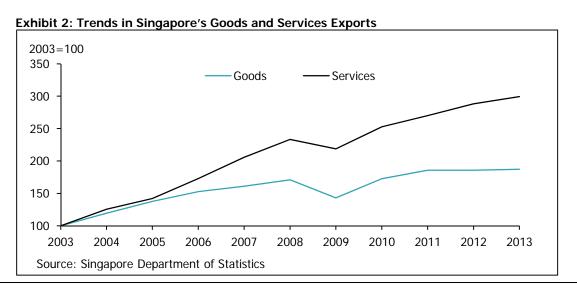


Exhibit 1: Services' Share of GDP for Selected Economies

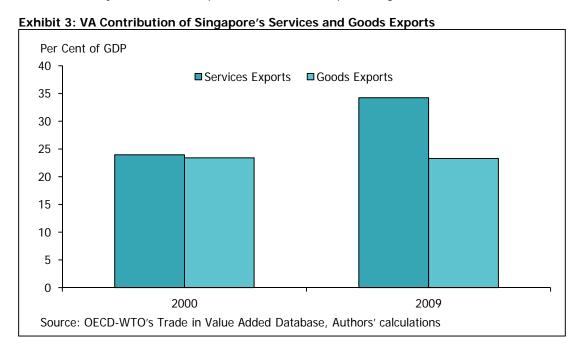
## Services exports reflect the growing importance of services activities

The rising contribution of services activities to the Singapore economy is also reflected in our trade statistics. In gross value terms, services trade has grown in size, even though goods trade continues to account for a dominant share of total exports. Specifically, the share of services exports in total exports rose from 16 per cent in 2003 to 23 per cent in 2013, as growth in services exports significantly outpaced that for goods exports over this period (Exhibit 2).



While gross value measures are useful, they do not adequately capture the value-added (VA) that is generated in the Singapore economy from exports. If we examine the VA contribution of exports, the expanding role of services exports becomes even more pronounced. Based on OECD-WTO's Trade in Value-added (TiVA) data for Singapore, the VA contribution of services exports to the economy increased considerably between 2000 and 2009, rising from 24 per cent of GDP to 34 per cent of GDP (Exhibit 3).<sup>1,2</sup> By contrast, the VA contribution of goods exports has remained stable, at around 23 per cent of GDP over the same period.

The increasing VA contribution of services exports is partly explained by the much faster growth of services exports in gross value terms. Another factor is the higher VA per dollar that accrues to the economy from services exports. As documented in an earlier study by MTI, the VA per dollar of services exports (51 cents) was 1.5 times as high as the VA per dollar of the domestic exports of goods (34 cents) and nearly 4 times the VA per dollar of the re-exports of goods (13 cents).



### What are the key drivers of services exports?

We next examine the key drivers of services exports in terms of the types of exports and the markets we are exporting to.

With regard to the types of services exports, it is useful to categorise them based on whether they are related to "traditional", "modern" or "other" services. A description of the services exports classified under each of these categories is provided in <a href="Exhibit 4"><u>Exhibit 4</u></a> below.

The TiVA database is compiled by OECD and WTO using a global input-output table that describes interactions between industries and consumers for 58 economies. It provides data on the export VA generated by a country in the production of goods and services that are exported. 2009 is the latest year of data available.

In comparison, a few domestically-oriented industries including construction & real estate, retail trade, and food services saw declines in their VA share of GDP between 2000 and 2009, as they grew at a more modest pace compared to the overall economy over this period.

For more details, please refer to Chan and Lim (2012). The higher VA per dollar of services exports reflect the fact that the manufacture of goods in Singapore tends to use more imported products as intermediate inputs, compared to the production of services. Similarly, re-exports, by definition, have a very high level of foreign input content.

Exhibit 4: Description of Services Exports Categories **Services Categories** Share of Description Services Exports in 2013 **Traditional Services Exports** Repair work performed by residents on goods that are owned by Maintenance & Repair 6% Services non-residents, and include maintenance and repairs performed on ships, aircraft and other transportation equipment. 34% Carriage of passengers, the movement of goods, charter of carriers Transport with crew, and related supporting and auxiliary services. Goods and services consumed by travellers during visits to a 15% Travel particular economy for less than one year. Commissions and associated income/expenditure arising from the Trade-related Services 4% trading of goods such as agency fees and distributor fees as well as discounts received/allowed. Modern Services Exports Financial 14% Financial intermediary and auxiliary services which can be charged explicitly or implicitly. Insurance Net premiums earned or incurred for reinsurance, life insurance, 3% general insurance and freight insurance. Telecommunications, The transmission of sound, images and other information by 3% Computer & telephone, cable, satellite, etc, as well as business network services, Information teleconferencing and related technical support services. Charges for the use of 2% Fees and charges for the use of patents, industrial design, Intellectual Property manufacturing rights, trademark and franchising fees, reproduction and distribution rights of computer software and audiovisual products, etc. Other Business Services 18% Accounting services, advertising and market research services, (Excluding Tradearchitectural services, business management services, engineering related Services) and technical services, legal services, research and development services etc. Other Services Exports Government Goods & 0.2% Expenditure of foreign diplomatic and consular missions and foreign armed forces in Singapore, including personal expenditure incurred Services by diplomats and consular staff located in Singapore. Work performed on construction activities by employees or Construction 1% enterprises in areas outside Singapore Personal, Cultural & Services related to the production of motion pictures, radio and 0.3%

Source: Singapore Department of Statistics and Ministry of Trade and Industry

# Traditional services remain important and are tied to domestic manufacturing and regional trade flows

television programs and musical recordings.

Traditional services are closely related to Singapore's historical status as an entrepot port and are typically associated with a substantial level of physical interaction. Exports of traditional services constitute the bulk of our services exports, at around 59 per cent in 2013. <sup>4</sup> Such exports – which are typically associated with the movement of goods, charter of vessels, port services, commissions and incomes from trading of goods, etc – are in turn reliant on domestic manufacturing activities in Singapore as well as trade flows in the region. There is thus a strong correlation between the growth rates of traditional services exports and manufacturing and wholesale & retail VA (Exhibit 5).

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Recreational

Among the traditional services exports, transport-related services exports form the largest category, at 58 per cent.

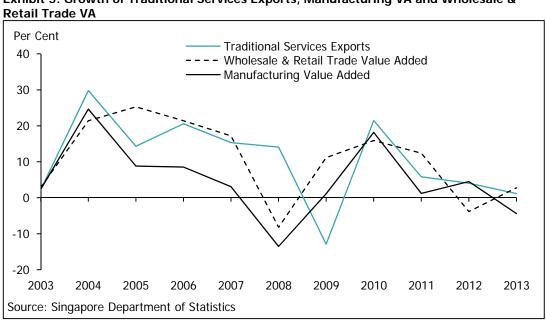
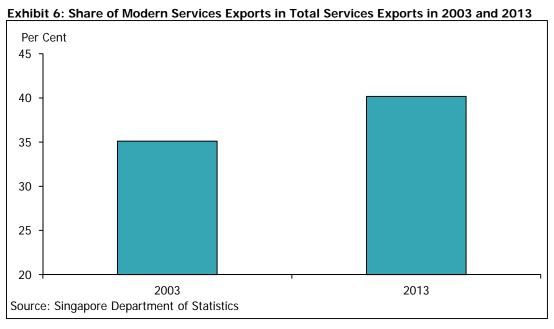


Exhibit 5: Growth of Traditional Services Exports, Manufacturing VA and Wholesale &

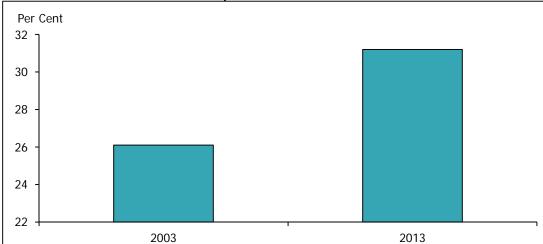
However, modern services are rising in importance in tandem with the growth of exportable services sectors in Singapore

While traditional services remain important, modern services have grown in importance in the last decade. Modern services are services that require less physical interaction as compared to traditional services, can be stored and traded digitally, and are not subject to many of the trade barriers that physical exports must overcome. These include finance & insurance, telecommunications, computer & information and other business services. Between 2003 and 2013, the share of modern services exports in total services exports grew from 35 per cent to 40 per cent (Exhibit 6).



The importance of modern services exports rose in tandem with the growth of related exportable services sectors in Singapore. Specifically, the finance & insurance, information & communications and business services sectors together accounted for 31 per cent of GDP in 2013, up from the 26 per cent share in 2003 (<u>Exhibit 7</u>). Apart from fast growing demand in key export markets, growth in finance & insurance services exports was boosted by financial sector liberalisation in these markets, while business services and information & communications exports have benefited from Singapore's increasing attractiveness as a global headquarter for businesses and an IT hub.<sup>5</sup>

Exhibit 7: GDP Shares of Related Exportable Services Sectors in 2003 and 2013



Source: Singapore Department of Statistics

Notes: Exportable services here refer to finance & insurance, information & communications and

business services.

## Services exports increased substantially across our major markets

Turning to the markets for our exports, between 2003 and 2012, services exports increased substantially across all our major services exports markets (Exhibit 8). As a single economic region, the EU remains our largest trading partner accounting for 18 per cent of our services exports in 2012. However, Asia as a whole accounted for 43 per cent of our services exports in 2012.



Source: Singapore Department of Statistics

Notes: Data on major trading partners are based solely on data from the International Trade in Services Survey for which the latest year available is 2012. Asia includes ASEAN, Japan, China and India.

<sup>&</sup>lt;sup>5</sup> For more details on the determinants of modern services growth, please refer to the MAS Macroeconomic Review (October 2011).

Within Asia, our services exports to China grew at a compound annual growth rate of 16 per cent between 2003 and 2012, significantly faster than the 11 per cent growth in services exports to the whole of Asia. When we look at the composition of these exports, traditional services exports continue to form the bulk of our services exports to China, at 62 per cent in 2013. However, modern services exports to China grew at a faster pace of 29 per cent between 2003 and 2012, in tandem with the rising affluence of the Chinese consumers and hence their demand for modern services.

### Role of services exports expected to expand further

The importance of services exports to the Singapore economy is expected to continue to increase, supported by three broad trends.

First, the ongoing servicisation of manufacturing. This refers to the phenomena where manufacturers diversify into complementary services (e.g. R&D, engineering, supply chain management) to cope with growing competitive pressures at the production stage and to enhance product differentiation vis-à-vis their competitors. An example of a manufacturing company that has undergone servicisation is Rolls Royce. It is the leading player in the global aerospace industry and has consolidated its global market position by integrating services into its traditional product offerings. To take advantage of Singapore's comparative advantages in services, Rolls Royce currently undertakes a wide spectrum of activities including R&D, testing, repair and overhaul (MRO), and overall service and parts management in Singapore. The servicisation of manufacturing is expected to gather pace, with the increasing adoption of new technologies such as additive manufacturing and robotics in the manufacturing process. Given Singapore's deepening R&D and engineering expertise, and increasingly skilled workforce, more manufacturing companies in Singapore will be able to move into services provision to capture value along their respective value chains.

Second, the increasing fragmentation of production and continued proliferation of global value chains. As global value chains become more pervasive alongside production fragmentation, services that facilitate the movement of goods across borders such as wholesale trade, transport and logistics, will necessarily increase in scale and magnitude. Given Singapore's status as a global trading and transport hub, our exports of such transport- and trade-related services are thus expected to grow. Furthermore, as advances in infocomm technology allow for more cost effective cross-border provisions of business and professional services (e.g. architectural design, accounting, legal services, consultancy and business management), our exports in modern services are also expected to increase.

Third, the growing domestic demand for services in Asian economies such as ASEAN and China, underpinned by rising wealth and urbanisation. In particular, as China re-orientates its economy towards consumption-led growth and steps up reforms to its services sector, there would be greater opportunities for major services exporters in Singapore. Within ASEAN, the expected completion of the 9th package of commitments under the ASEAN Framework Agreement on Services (AFAS) this year will also give services trade among ASEAN economies a boost as businesses enjoy a progressive reduction of services barriers. Looking further ahead, the Regional Comprehensive Economic Partnership (RCEP) which links ASEAN, China and five other FTA partners is another significant trade agreement. When completed, it is expected to boost intra-regional trade flows, particularly in services trade. At the same time, the Government is looking into ways to grow and improve the competitiveness of our export-oriented services industries – this will help ensure that Singapore is in a good position to ride on the growth in regional demand for services over the longer term.

According to estimates by OECD, by 2020, the size of the Asia's middle class population could reach 1.7 billion, up from 0.5 billion in 2009. As a share of global middle class, Asia's middle class population was estimated to rise to 54 per cent in 2020, from 28 per cent in 2009.

These are Japan, Republic of Korea, India, Australia and New Zealand.

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