8. INDUSTRY OVERVIEW

SMITH ZANDER INTERNATIONAL SDN BHD 201301028298 (1058128-V)
15-01, Level 15, Menara MBMR, 1 Jalan Syed Putra, 58000 Kuala Lumpur, Malaysia
T : +603 2732 7537 W : www.smith-zander.com

SMITH ZANDER

Date: 29 July 2021

The Board of Directors

MTT SHIPPING AND LOGISTICS BERHAD
Unit 13A-1, Level 13A, Tower 8
UOA Business Park
No. 1, Jalan Pengaturcara U1/51A
Seksyen U1
40150 Shah Alam
Selangor Darul Ehsan

Dear Sirs/Madams,

Independent Market Research Report on the Container Shipping Industry in Malaysia, the Container Shipping Industry in Singapore, Thailand, Brunei, Indonesia, India and Myanmar, the Dry Bulk Shipping Industry in Malaysia and Global Container Vessel Chartering Industry ("IMR Report")

This IMR Report has been prepared by SMITH ZANDER INTERNATIONAL SDN BHD ("SMITH ZANDER") for inclusion in the draft Prospectus in conjunction with the proposed listing of MTT Shipping and Logistics Berhad on the Main Market of Bursa Malaysia Securities Berhad.

The objective of this IMR Report is to provide an independent view of the industries and market(s) in which MTT Shipping and Logistics Berhad and its subsidiaries ("MTTSL Group" or "Group") operate and to offer a clear understanding of the industry and market dynamics. MTTSL Group is principally involved in the provision of container shipping services and container vessel chartering services. The Group's provision of container shipping services is primarily focused on service routes between Peninsular Malaysia and East Malaysia. The Group also operates as a regional container shipping operator covering ports outside Malaysia, namely Singapore, Thailand, Brunei, Indonesia, India and Myanmar, collectively referred to as "the Countries Involved". The Group's container shipping business is also supported by container depot services. Further, the Group is also involved in the provision of dry bulk shipping services in Malaysia.

The scope of work for this IMR Report will thus address the following areas:

(i) The container shipping industry in Malaysia;
(ii) The container shipping industry in the Countries Involved;
(iii) The dry bulk shipping industry in Malaysia and
(iv) The global container vessel chartering industry.

The research process for this study has been undertaken through secondary or desktop research, as well as detailed primary research when required, which involves discussing the status of the industry with leading industry participants and industry experts. Quantitative market information could be sourced from interviews by way of primary research and therefore, the information is subject to fluctuations due to possible changes in business, industry and economic conditions.

SMITH ZANDER has prepared this IMR Report in an independent and objective manner and has taken adequate care to ensure the accuracy and completeness of the report. We believe that this IMR Report presents a balanced view of the industry within the limitations of, among others, secondary statistics and primary research, and does not purport to be exhaustive. Our research has been conducted with an "overall industry" perspective and may not necessarily reflect the performance of individual companies in this IMR Report. SMITH ZANDER shall not be held responsible for the decisions and/or actions of the readers of this report. This report should also not be considered as a recommendation to buy or not to buy the shares of any company or companies mentioned in this report.

For and on behalf of SMITH ZANDER:

DENNIS TAN
MANAGING PARTNER

COPYRIGHT NOTICE

The research for this IMR Report was completed on 7 July 2021.

For further information, please contact:

SMITH ZANDER INTERNATIONAL SDN BHD
15-01, Level 15, Menara MBMR
1, Jalan Syed Putra
58000 Kuala Lumpur
Malaysia
Tel: + 603 2732 7537

www.smith-zander.com

About SMITH ZANDER INTERNATIONAL SDN BHD

SMITH ZANDER is a professional independent market research company based in Kuala Lumpur, Malaysia, offering market research, industry intelligence and strategy consulting solutions. SMITH ZANDER is involved in the preparation of independent market research reports for capital market exercises, including initial public offerings, reverse takeovers, mergers and acquisitions, and other fund-raising and corporate exercises.

Profile of the signing partner, Dennis Tan Tze Wen

Dennis Tan is the Managing Partner of SMITH ZANDER. Dennis Tan has over 23 years of experience in market research and strategy consulting, including over 18 years in independent market research and due diligence studies for capital markets throughout the Asia Pacific region. Dennis Tan has a Bachelor of Science (major in Computer Science and minor in Business Administration) from Memorial University of Newfoundland, Canada.

SMITH ZANDER

1 INTRODUCTION TO THE CONTAINER SHIPPING INDUSTRY

Container shipping is a type of sea freight which involves the transportation of containerised goods by means of ocean vessels (i.e. container vessels, tugs and barges), that sail on scheduled routes from and to their designated ports for loading and/or discharge of shipping containers. Container shipping facilitates port to port transportation of goods in sealed and locked fixed-size containers, usually meant for mass transportation of goods. Container shipping services are provided to customers such as manufacturers, exporters, importers and traders as well as freight forwarders who act on behalf of the consignees as their forwarding agent,

A container shipping operator may provide mainline services and/or feeder services to its customers:

(i) Mainline services

- Mainline services refer to the provision of container shipping services whereby containers are loaded and discharged at ports of call along the service route of a mainline vessel operator. The port of call may be the ultimate port of origin and/or destination of the container; or it may be a transshipment port where the ultimate port of origin and/or destination of the containers is a port not covered by the mainline vessel operator.
- Mainline services are usually long-haul transportation services between major ports and ports with no restrictions or limitations (e.g. water level and infrastructure) for large container vessels to sail to and berth. Global mainline services cover ports globally, regional mainline services cover ports within a specific region and domestic mainline services cover ports within a specific country.
- Generally, mainline container vessels are relatively larger than feeder container vessels, hence are suited for deep water and long distance voyages.

(ii) Feeder services

- Feeder services refer to the provision of container shipping services to support mainline services when the port of loading and/or discharge of the mainline vessel operator is not the ultimate port of origin and/or destination of the containers.
- Feeder services are usually short-haul transportation services between a transshipment port and domestic and/or regional ports not covered by a mainline vessel operator, in which these ports may have shallow waters and/or may lack the necessary infrastructure to handle large container vessels. It may also be a commercial decision by mainline vessel operators not to cover these ports.
- Feeder services are provided to mainline vessel operators.

Container depot service as an extended service related to the container shipping industry

In the container shipping industry, a container depot is an integral part of the global supply chain as it is used as a temporary storage area for empty containers after goods have been unloaded and the empty containers are then held in the container depot until their use for the next shipment. Container depots are generally located within ports or in close proximity to ports and may offer other services such as container cleaning, container maintenance and repair as well as container inspection services. In Malaysia, container depot services are provided by container depot operators and container shipping operators.

Impact of the coronavirus disease 2019 ("COVID-19") pandemic

Since early 2020, the outbreak of COVID-19 has impacted many countries around the world. To curb the spread of the COVID-19 pandemic, many countries have closed their country borders as well as imposed nationwide lockdowns and/or operating restrictions/prohibitions in certain economic sectors. China, as the world's largest export market, was one of the first few countries to enter lockdown in early 2020. Even after China's lockdown was gradually eased around the 2nd quarter of 2020, global trade activities and port operations in 2020 remained affected as other major importers, such as United States and countries in Europe (e.g. Germany and United Kingdom), were recording high number of new infected cases and thereby causing continued disruptions to sea freight operations.

The pandemic has also caused unprecedented vessel delays and congestion at major global ports due to longer container turnaround time because of reduced manpower, additional safety measures in place to curb the spread of the COVID-19 pandemic and congestion in warehouse capacity, amongst others. Vessel delays and port congestion have led to a shortage in vessel capacity as vessels are stuck at ports longer than usual. As a result, some container shipping operators have been forced to blank sail[1] to speed up the completion of their voyage to maximise the utilisation of their vessel capacity, or to cancel some voyages to balance vessel capacity supply against the lower demand for container shipping services during the lockdown period. The container shipping industry has also been facing shortages of empty containers due to global port congestion where empty containers have been left uncollected in ports during the period of lower demand in 2020. This situation has been made worse when there have been further delays in collection and unloading of laden containers due to reduced manpower in ports, and concurrently shipping companies rush to secure containers to capture the surge in export cargo from China resulting from backlog export orders since the 2nd half of 2020. Despite the roll out of COVID-19 vaccines globally since end of 2020, the global container shipping industry is still adjusting to the abovementioned supply chain challenges to support the gradual improvement in trade

[1] *Blank sailing is when an ocean vessel does not call at one or more of its scheduled stops.*

activities. The impact of the COVID-19 pandemic to the container shipping industry including container vessel chartering is further elaborated in the sections below.

2 THE CONTAINER SHIPPING INDUSTRY IN MALAYSIA

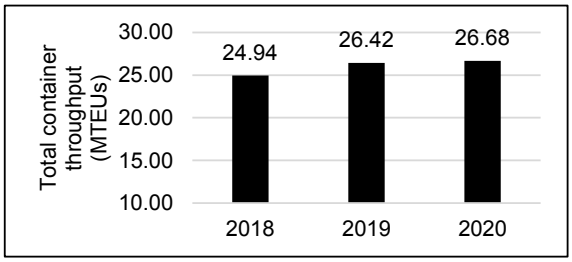
2.1 INDUSTRY PERFORMANCE AND SIZE

Performance, Size and Growth of the Container Shipping Industry in Malaysia

The performance of the container shipping industry in Malaysia is measured in terms of total container throughput. The size of the container shipping industry in Malaysia grew from 24.94 million twenty-foot equivalent units ("MTEUs") in 2018 to 26.68 MTEUs in 2020 at a compound annual growth rate ("CAGR") of 3.43%.

Despite headwinds of the COVID-19 pandemic which have affected many businesses and sectors in Malaysia as well as around the world, the container shipping industry in Malaysia showed positive growth in 2020, mainly due to increased transshipment activities in Malaysian ports.

Total container throughput (Malaysia), 2018-2020



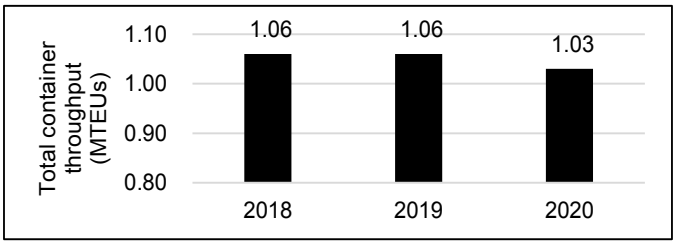
Sources: Ministry of Transport Malaysia ("MOT"), SMITH ZANDER analysis

Performance, Size and Growth of the Container Shipping Industry in East Malaysia

Port Klang and Port of Tanjung Pelepas ("PTP") are the main port hubs in Malaysia and collectively, they contributed to 98.81%[2] of the country's total container throughput for transshipment of 17.61 MTEUs handled in 2020. These ports serve as the connecting points between other Malaysian ports and global ports as it supports transshipment services between mainline container vessels servicing the global and regional routes, and feeder vessels servicing the domestic routes. With Port Klang and PTP being the country's main transshipment ports, trade activities in East Malaysia are commonly serviced by feeder vessels to/from Port Klang or PTP rather than mainline vessels that service international or regional routes.

Total container throughput handled in East Malaysia declined from 1.06 MTEUs in 2018 to 1.03 MTEUs in 2020, at a negative CAGR of 1.43%. A slower performance in 2020 was due to lower external trade, which was affected by disruptions in global supply chains amid the COVID-19 pandemic. Nonetheless, the container shipping industry in East Malaysia is expected to recover when the negative impact from the COVID-19 pandemic subsides and is expected to be supported by the growth in total trade activities in East Malaysia in the long term as described in **Chapter 2.2 – Industry Demand Drivers and Restraints/Challenges.**

Total container throughput (East Malaysia), 2018-2020



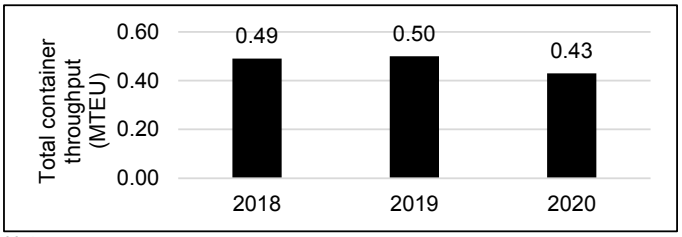
Note:

- *Figures may include the handling of international inbound and outbound containers as well as containers handled within East Malaysia.*

Sources: MOT, SMITH ZANDER analysis

Total container throughput between Peninsular Malaysia and East Malaysia (including Muara, Brunei) declined from 0.49 MTEU in 2018 to 0.43 MTEU in 2020 at a negative CAGR of 6.32%. A slower performance in 2020 may be due to lower trade activities between Peninsular Malaysia and East Malaysia (including Muara, Brunei) amid the COVID-19 pandemic. However, container shipping activities between Peninsular Malaysia and East Malaysia is expected to recover once the COVID-19 pandemic subsides and is expected to be supported by the growth in trade activities between Peninsular Malaysia and East Malaysia in the long term as detailed in **Chapter 2.2 – Industry Demand Drivers and Restraints/Challenges.**

Total container throughput between Peninsular Malaysia and East Malaysia (including Muara, Brunei), 2018- 2020



Notes:

- *Figures exclude container handled within Peninsular Malaysia and within East Malaysia.*
- *Container throughput between Peninsular Malaysia and Muara, Brunei is included as MTTSL Group offers domestic service route with port calls at Muara, Brunei.*

Sources: Major ports in Peninsular Malaysia, SMITH ZANDER analysis

[2] *Sources: MOT, SMITH ZANDER analysis.*

The continuous efforts and initiatives by the Government of Malaysia ("the Government") are pivotal in supporting the growth of the container shipping industry in Malaysia and such efforts include the following Government-driven initiatives to spur the overall shipping industry in Malaysia:

- Introduction of the Malaysia Shipping Master Plan (2017-2022) to promote competitiveness and to build resilience in the shipping industry by promoting employment of Malaysian vessels, promoting employment of Malaysian seafarers and maritime human resources, facilitating access to capital and financing, enhancing Malaysia's attractiveness to shipping businesses, and promoting innovation in and sustainable growth of maritime ancillary services; and
- Extension of the Maritime Development and Logistics Scheme until 31 December 2023 under Malaysia's Budget 2021 which is aimed at providing financial assistance to existing and new companies who are dealing with, or are involved in, maritime related activities and services including aerospace and logistic activities.

2.2 INDUSTRY DEMAND DRIVERS AND RESTRAINTS/ CHALLENGES

Industry Demand Drivers

► **Dependence on sea transportation to facilitate trade activities presents demand for container shipping services**

The container shipping industry plays an important role in supporting trade activities as it facilitates the transportation of goods across international borders as well as domestically. Global trade is highly dependent on sea transportation, whereby more than 80.00%[3] of the world's trade is transported by sea. According to the International Maritime Organization ("IMO"), sea transportation is, by far, considered the most efficient and cost-effective method of international transportation for most goods.

Being a nation surrounded by sea, Malaysia's dependence on seaborne trade activities is prevalent. Building on this, Malaysia has developed Port Klang and PTP into globally recognised container ports. Based on latest available information, in 2020, Port Klang was ranked 13th among the top 25 ports in the world, with a total container throughput of 13.24 MTEUs while PTP was ranked 16th, with a total container throughput of 9.85 MTEUs.[4] Moreover, Port Klang and PTP have grown to be the main port hubs of Malaysia whereby these ports collectively handled 98.81% of the country's total container throughput for transshipment of 17.61 MTEUs in 2020, signifying their importance as a container transshipment port for global, regional and domestic mainline service providers as well as feeder service providers.

Domestic trade activities between Peninsular Malaysia and East Malaysia are also highly dependent on sea transportation to transport goods imported to East Malaysia through Port Klang or PTP, or sourced from Peninsular Malaysia, for East Malaysia's economic, industrialisation and infrastructure development activities. With container vessels servicing the domestic routes contributing to 77.55% of total container vessels calling in East Malaysia in 2020, it signifies East Malaysia's reliance on domestic shipping services.

In addition, the COVID-19 pandemic has led to the closure of many international borders and air travel restrictions. The grounding of passenger aircraft and reduction in flight schedules have resulted in a significant reduction in air freight capacity, causing certain volumes of cargo transportation to shift from air transportation to sea transportation.

► **Growth in international and domestic trade activities drive the demand for shipping services**

The shipping industry is pivotal in supporting growth in international and domestic trade activities as shipping services are required for the movement of goods by sea. Global international trade, measured by total import and export value, grew at a CAGR of 3.45% from USD35.37 trillion (RM152.12 trillion)[5] in 2017 to USD37.85 trillion (RM156.80 trillion)[6] in 2019.[7] However, global international trade declined by 7.93%, from USD37.85 trillion (RM156.80 trillion) in 2019 to USD34.85 trillion (RM146.43 trillion)[8] in 2020 in view of a slowdown in the global economy and major supply chain disruptions caused by the COVID-19 pandemic. Prior to the COVID-19 pandemic, international maritime trade expanded in terms of trade volume loaded, at a CAGR of 1.67%, from 10.72 billion tons in 2017 to 11.08 billion tons in 2019, which was in line with the growth in international trade activities. World containerised trade grew at a CAGR of 2.40% from 144.85 MTEUs in 2017 to 151.89 MTEUs in 2019.[9] The United Nations Conference on Trade and Development ("UNCTAD") estimates that international maritime trade declined by 4.10% and world containerised trade declined by 5.68% in 2020.

Malaysia's total external trade decreased from RM1.88 trillion in 2018 to RM1.78 trillion in 2020 at a negative CAGR of 2.70%.[10] Despite the COVID-19 pandemic, total container throughput in Malaysia in MTEU terms continued to experience growth, increasing from 24.94 MTEUs in 2018 to 26.68 MTEUs in 2020 at a CAGR of 3.43%, indicating the continuous growth in demand for container shipping services, which specifically in 2020, was due to increase in

[3] Source: IMO.
[4] Sources: Alphaliner, MOT.
[5] Exchange rate from USD to RM in 2017 was converted based on average annual exchange rates in 2017 extracted from published information from Bank Negara Malaysia at USD1 = RM4.3008.
[6] Exchange rate from USD to RM in 2019 was converted based on average annual exchange rates in 2019 extracted from published information from Bank Negara Malaysia at USD1 = RM4.1427.
[7] Sources: International Trade Centre, SMITH ZANDER analysis. Latest available figures as at 7 July 2021.
[8] Exchange rate from USD to RM in 2020 was converted based on average annual exchange rates in 2020 extracted from published information from Bank Negara Malaysia at USD1 = RM4.2016.
[9] Sources: UNCTAD - Review of Maritime Transport 2020, SMITH ZANDER analysis.
[10] Sources: Department of Statistics Malaysia ("DOSM"), SMITH ZANDER analysis.

transshipment activities which may have resulted from the growth in e-commerce activities and the shift from air transportation to sea transportation due to a reduction in air freight capacity due to the grounding of passenger aircraft and significant reduction in flights in view of the COVID-19 pandemic.

In East Malaysia, total trade in Sabah declined at a negative CAGR of 4.48% from RM87.12 billion in 2018 to RM79.49 billion in 2020; whereas total trade in Sarawak declined at a negative CAGR of 9.92% from RM144.58 billion in 2018 to RM117.32 billion in 2020.[11] Trade activities between Peninsular Malaysia and East Malaysia declined at a negative CAGR of 7.15% from RM66.11 billion in 2018 to RM56.99 billion in 2020.[12] In view of the disruptions to global supply chains due to the COVID-19 pandemic which led to lower total trade volumes in East Malaysia in 2020, total container throughput in East Malaysia declined from 1.06 MTEUs in 2018 to 1.03 MTEUs in 2020 at a negative CAGR of 1.43%. Nonetheless, the demand for shipping services in East Malaysia is expected to improve with the recovery in Malaysia's external trade activities once the impact of the COVID-19 pandemic subsides.

► **Growth in the economy, particularly in East Malaysia, leads to greater demand for domestic container shipping services**

A thriving economy, measured in terms of gross domestic product ("GDP") growth, generally translates to increased trade activity. An increase in trade activities in turn leads to higher demand for container shipping services for both domestic and international trade.

In Malaysia, real GDP declined from RM1.36 trillion in 2018 to RM1.34 trillion in 2020 at a negative CAGR of 0.74%. Further, the GDP in 2020 shrank by 5.63% as compared to 2019. The decline in real GDP in 2020 was due to an economic slowdown, affected by the measures implemented by the Government to curb the spread of COVID-19 since early 2020. However, Malaysia's real GDP grew by 4.41% from RM1.36 trillion in 2018 to RM1.42 trillion in 2019, indicating healthy economic growth prior to the COVID-19 pandemic. Further, in view of a slowdown in Malaysia's economy in 2020, real GDP of the transportation and storage services sector also declined from RM50.21 billion in 2018 to RM41.90 billion in 2020 at a negative CAGR of 8.65%, which was largely attributed to the restrictions in international travel. Notwithstanding the slowdown in the overall economy, the manufacturing sector grew from RM304.84 billion in 2018 to RM307.92 billion in 2020 at a CAGR of 0.50%.[12]

In East Malaysia, Sabah's real GDP grew from RM83.79 billion in 2017 to RM85.44 billion in 2019 at a CAGR of 0.98%; whereby real GDP for transportation and storage services sector grew from RM6.40 billion in 2017 to RM7.16 billion in 2019[13] at a CAGR of 5.77%; and real GDP for the manufacturing sector grew from RM6.36 billion in 2017 to RM6.47 billion in 2019 at a CAGR of 0.86%. On the other hand, Sarawak's real GDP grew from RM130.17 billion in 2017 to RM136.28 billion in 2019 at a CAGR of 2.32%; with real GDP for transportation and storage services sector growing from RM9.81 billion in 2017 to RM11.03 billion in 2019[13] at a CAGR of 6.04%; and real GDP for the manufacturing sector growing from RM34.81 billion in 2017 to RM36.62 billion in 2019 at a CAGR of 2.57%.[14]

In June 2021, the World Bank revised its forecast for Malaysia's GDP growth in 2021 from 6.00% to 4.50% in view of the surge in COVID-19 cases in 2021, which has resulted in prolonged lockdowns and operating restrictions/prohibitions in many economic sectors. While daily new infected cases remain high, the Government has sped up the administration of COVID-19 vaccines and aim to reach a vaccination rate of 400,000 a day in August in order to achieve 80% herd immunity by September.[15] When infected cases gradually subside and remain under control, movement and business operating restrictions are expected to be uplifted which will allow economic activities to resume and gradually recover to pre-COVID levels. Improved economic conditions is expected to boost demand for container shipping services to support growth in external and domestic trade as a result of growth in businesses and improvement in consumer purchasing power.

► **Inflow of investments into East Malaysia as well as infrastructure growth to drive demand for domestic container shipping services**

Inflow of investments, particularly in the manufacturing sector, into East Malaysia is expected to drive demand for domestic container shipping services when raw materials are imported to East Malaysia through transshipment via ports in Peninsular Malaysia, or sourced from Peninsular Malaysia; and when manufactured goods are exported from East Malaysia to Peninsular Malaysia or to other countries.

In 2020, Sabah recorded a total of 15 approved manufacturing projects worth RM11.95 billion, while Sarawak recorded a total of 24 approved manufacturing projects worth RM15.73 billion.[16] Further, infrastructure growth is another factor in driving demand for domestic container shipping services when raw materials need to be imported into East Malaysia or sourced from Peninsular Malaysia for East Malaysia's construction activities. Under Malaysia's Budget 2021, Sabah and Sarawak were allocated development expenditures amounting to RM5.10 billion and RM4.50 billion respectively, in which these funds will be utilised for building and upgrading water, electricity and road infrastructure as well as health and education facilities. Further, the Government also proposed to allocate funds for several infrastructure projects such as the Infrastructure Project in the Samalaju Industrial Area in Sarawak, continuation of the Sapangar Bay

[11] Figures include foreign trades and trades within Malaysia but exclude trades within the state itself.
[12] Sources: DOSM, SMITH ZANDER analysis.
[13] Inclusive of the real GDP for utilities, and information and communication.
[14] Sources: DOSM, SMITH ZANDER analysis. Latest available figures as at 7 July 2021.
[15] Source: Malaysia to boost COVID-19 vaccination rate to 400k a day by August, New Straits Times, 20 June 2021.
[16] Source: Malaysian Investment Development Authority.

Container Port Expansion Project in Sabah, as well as the construction of the Pan Borneo Highway Sabah from Serusop to Pituru.

Industry Restraints/ Challenges

► **Changes in regulatory policies may have adverse impact on the container shipping industry**

Changes in regulatory policies, whether domestically or internationally, may adversely affect the container shipping industry. An example of a recent change in the domestic regulatory policy which may have affected the container shipping industry was the partial liberalisation of the cabotage policy. The cabotage policy was introduced in Malaysia in 1980 with the Merchant Shipping Ordinance 1952 ("MSO 1952") amended and the Domestic Shipping Licencing Board established. Under Section 65KA of the MSO 1952, it states that no ship other than a registered Malaysian ship may engage in domestic shipping. Under Section 65A of the MSO 1952, domestic shipping refers to the use of a ship to provide services, other than fishing, in Malaysian waters or the exclusive economic zone[17]; or for the shipment of goods or carriage of passengers from any port or place in Malaysia to another port or place in Malaysia, or from any port or place in Malaysia to any place in the exclusive economic zone or vice versa. The use of registered foreign ships for domestic shipping can only be considered if a registered Malaysian ship is unable to meet the demands of certain sectors subject to the terms and conditions set by the MOT. Additionally, under Section 65L of the MSO 1952, it states that no ship shall engage in domestic shipping without a licence save for certain vessels that are exempted from applying for a Domestic Shipping License. This policy restricts foreign vessels without a Domestic Shipping License from conducting domestic shipping activities in Malaysia, with the intention to develop Malaysian ownership, to promote the domestic shipping industry and to minimise Malaysia's dependence on foreign vessels as well as the outflow of foreign exchange in the form of freight payments[18]. Foreign vessels are allowed to call at multiple Malaysian ports, i.e. sailing on domestic routes, for discharge of goods only as this does not fall under the definition of domestic shipping.

Since the implementation of the cabotage policy, the Government has made several announcements for partial liberalisation of the policy and the latest announcement was made effective 1 June 2017[19], whereby allowances are given to foreign vessels to conduct domestic shipping activities between any one port in Peninsular Malaysia to/from any one port in East Malaysia; ports within Sabah; and ports within Sarawak. Such a move to partially liberalise the cabotage policy has allowed foreign vessels to ship domestically between the permitted regions, without having to apply for domestic shipping licenses. However, the cabotage policy remains applicable for inter-state shipping activities within Peninsular Malaysia, inter-state shipping activities within East Malaysia and shipping activities between any one port in Labuan to/from any one port in Sabah or Sarawak. This may negatively affect the domestic shipping industry with increased competition for domestic industry players as they risk losing revenue to foreign players.

Further, the IMO, through the IMO 2020 Global Sulphur Cap, has mandated the use of low-sulphur fuel globally to reduce sulphur oxide emissions by ocean vessels. The IMO has capped sulphur content in bunker fuels at 0.50% mass by mass used on ocean vessels operating outside designated emission control areas effective from January 2020, down from the previously allowed sulphur content of 3.50%. This shift towards using low-sulphur bunker fuel may result in higher operational cost as such fuel is relatively more expensive than traditional higher-sulphur bunker fuel, and vessel operators may be adversely affected if they are unable to pass the cost to their customers.

► **Reliance on bunker fuel to operate container vessels leads to exposure to the volatility of global oil prices**

Container shipping uses ocean vessels for the transportation of containerised goods and ocean vessels rely mainly on bunker fuel to propel the vessel. Bunker fuel is also known as heavy oil or marine fuel, and is used for the generation of power or is burned in a furnace or boiler for the generation of heat for use on ocean vessels. The consumption of bunker fuel is dependent on the size and cruising speed of the ocean vessel whereby consumption increases with the size and cruising speed of the ocean vessel.

The dependency on bunker fuel subjects the container shipping industry to the volatility in global crude oil prices as a result of supply and demand. Any increase in crude oil prices will cause an increase in bunker fuel prices, and this will subsequently increase the operational cost for vessel operators. Nevertheless, any substantial increase in bunker fuel prices may be passed on to customers by vessel operators and thus, minimising the impact of volatile global crude oil prices to vessel operators.

► **Exposure to maritime piracy and armed robbery**

Maritime piracy and armed robbery involve the plundering, hijacking or detention of ocean vessels by pirates as they sail on the ocean. According to the ICC International Maritime Bureau ("IMB")'s Piracy and Armed Robbery Against Ships Report for 1 January 2020 to 31 December 2020, 195 incidents of maritime piracy and armed robbery were recorded worldwide in 2020, increasing from 162 incidents in 2019.

In Malaysia, maritime piracy and armed robbery activities off the waters of Sabah and Straits of Malacca remain a concern for ocean vessels operating along these routes. According to the IMB, the number of incidents of maritime piracy and armed robbery in the Straits of Malacca has dropped significantly due to increased patrols by the relevant

[17] Exclusive economic zone refers to the exclusive economic zone of Malaysia, as proclaimed by the Yang Di-Pertuan Agong vide P.U.(A) 115/80, being an area beyond and adjacent to the territorial sea of Malaysia and extending to a distance of 200 nautical miles from the baselines from which the breadth of the territorial sea is measured and where the limits of the exclusive economic zone area are modified and altered in accordance with the provisions of any written law relating to the exclusive economic zone, the exclusive economic zone shall mean the exclusive zone as so modified and altered. (Source: MSO 1952)

[18] Source: Ministry of International Trade and Industry.

[19] Source: MOT.

authorities since July 2005. However, ocean vessels are advised to continue to undertake strict anti-piracy or robbery watches when sailing along the Straits of Malacca.

According to the IMB, a total of 4 incidents of maritime piracy and armed robbery within Malaysian waters were recorded in 2020. Maritime piracy and armed robbery in Malaysia are often more targeted at tugs and barges and fishing boats due to the lower speed of sailing and ease of access as compared to larger vessels. The consequences of such piracy attacks include, amongst others, loss of cargo as well as jeopardising the physical safety and mental well-being of the affected crew members.

► **Port congestion resulting in delays and increased cost of operations**

Port congestion is a situation where ocean vessels have to queue outside a port and wait for berthing to load or unload goods from the vessels. Such situations may result from bad weather, equipment breakdown, port worker strikes, shortages in port labour and/or sudden spikes in container volumes.

Port congestion results in a back log in shipping activities which adversely affects the shipping industry as it would result in higher cost of operations, delayed schedules and loss of voyage. For example, the COVID-19 pandemic has caused disruptions in the global supply chain where reduced workforce and additional standard operating procedures in place have caused port congestions in several major ports around the world. Between late 2020 and early 2021, Port Klang experienced port congestion due to an increase in ocean vessels overcrowding at the port after delays in preceding ports. This resulted in further delays in schedules due to an increase in waiting time to berth at the port. However, the relevant port authorities implemented several measures such as collaborating with shipping companies as well as feeder vessels to expedite the release of export and transshipment containers as well as prioritising vessels unloading containers to ease the congestion. With the increase in global trade and container and cargo throughput, vessel operators may risk facing increasing port congestion issues if port authorities do not take adequate measures on time to address such problems, thus negatively affecting the industry players.

2.3 COMPETITIVE LANDSCAPE OF THE CONTAINER SHIPPING INDUSTRY IN MALAYSIA

Overview

The domestic container shipping industry in Malaysia is regulated whereby only vessels issued with the Domestic Shipping License or vessels being exempted from obtaining the Domestic Shipping License are allowed to provide domestic shipping services in Malaysia. With the partial liberalisation of the cabotage policy, foreign vessels can now engage in domestic shipping services between the permitted regions in Malaysia, without having to obtain a Domestic Shipping License. As such, container shipping operators in Malaysia, such as MTTSL Group, are in competition with both Malaysian vessels as well as foreign vessels who cover the same ports along similar service routes.

Container shipping operators may own and operate their own container vessels, and/or charter and operate third party container vessels, and/or engage in slot exchange arrangements or slot purchase arrangements with other container shipping operators that provide domestic container shipping services.

Slot exchange arrangement refers to the exchange of container space on one another's vessels and the amount of space that each party receives may vary from port to port depending on the arrangement agreed upon, or may refer to the purchase of container space from third party container shipping operators at an agreed price.

This section of the IMR Report will focus on the competitive landscape of the container shipping industry based on container shipping operators who are involved in the provision of container shipping services between Peninsular Malaysia and East Malaysia, as MTTSL Group is principally involved in the provision of container shipping services, focusing on service routes between Peninsular Malaysia and East Malaysia.

Key Industry Players

The following list of industry players are identified as MTTSL Group's key competitors, on the basis that these industry players are:

- Container shipping operators who are primarily involved in the provision of domestic container shipping services between Peninsular Malaysia and East Malaysia based on publicly available information on the service routes they offer; and
- whereby such services may be provided through the operation of own vessels, operation of chartered vessels and/or through slot exchange or slot purchase arrangements.

The following sets out the key industry players based in Malaysia. In cases where industry players are involved in the provision of other services, segmental revenue is provided to demonstrate the revenue derived from the provision of shipping services.

Company	Business activities	Latest available financial year	Total revenue[a] (million)	Segmental revenue (million)
Harbour-Link Group Berhad	Container shipping services, ship management, integrated logistics services, stevedoring, shipping agency services, and marine services. Other activities not related to the shipping	30 June 2020	RM 617.25	RM 193.18[b]

Company	Business activities	Latest available financial year	Total revenue[a] (million)	Segmental revenue (million)
	industry include property development, heavy lifting and haulage, and engineering and construction services			
Shin Yang Shipping Corporation Berhad	Container and cargo shipping services, shipbuilding and ship repairing, shipping agency services, as well as fabrication of metal structures	30 June 2020	RM 596.50	RM 338.67[b]
MTTSL Group	Container shipping services, container vessel chartering services, dry bulk shipping services and container depot services; and appointed shipping agent for Evergreen Group of Companies in East Malaysia	31 December 2020	RM 514.54	RM 352.51[c]
Malaysia Shipping Corporation Sdn Bhd	Container shipping services, shipping agency services and related services	31 December 2019	RM 184.62	RM 96.72[b]
AML Shipping Sdn Bhd	Container shipping services, integrated logistics services and shipping agency services	30 June 2020	RM 81.57	RM 78.02[b]

Notes:

a Companies may be involved in other businesses besides the provision of container shipping services and as such, total revenue may include revenue from other business segments.

b Segmental revenue comprises revenue from the provision of shipping services. As the company may be involved in the provision of other shipping services besides container shipping, the segmental revenue may include revenue from the provision of container shipping services and/or other shipping services, including the provision of shipping services within and outside Malaysia, provision of cargo shipping services and/or slot fees earned.

c Segmental revenue comprises revenue from the provision of domestic container shipping services.

- *The key identified container shipping industry players include all industry players that were identified by SMITH ZANDER based on sources available, such as the internet, published documents and industry directories. However, there may be companies that have no online and/or published media presence, or are operating with minimal public advertisement, and hence SMITH ZANDER is unable to state conclusively that the list of industry players is exhaustive.*

Sources: MTTSL Group, Companies Commission of Malaysia, Company Annual Report, SMITH ZANDER analysis

The following sets out key industry players based outside Malaysia but is involved in the provision of domestic shipping services between Peninsular Malaysia and East Malaysia.

Company	Business activities	Latest available financial year	Total revenue[a] (million)
CMA CGM Asia Shipping Pte. Ltd. (subsidiary of CMA CGM S.A.)	Container shipping services	31 December 2019	USD 6,982.56 (RM28,926.65[b])
Sealand Maersk Asia Pte. Ltd. (subsidiary of A.P. Moller – Maersk A/S)	Container shipping services	31 December 2020	USD 1,706.18 (RM7,168.69[b])
Advance Container Lines (Pte) Ltd	Feeder services	31 December 2020	USD 157.24 (RM 660.66[b])

Notes:

a Companies may be involved in other businesses besides the provision of container shipping services and as such, total revenue may include revenue from other business segments. Segmental revenue is not publicly available.

b Revenue derived for the financial year comprises revenue generated from services within Malaysia and outside Malaysia. Exchange rate from USD to RM in 2019 was converted based on average annual exchange rates in 2019 extracted from published information from Bank Negara Malaysia at USD1=RM4.1427. Exchange rate from USD to RM in 2020 was converted based on average annual exchange rates in 2020 extracted from published information from Bank Negara Malaysia at USD1=RM4.2016.

- *The key identified container shipping industry players include all industry players that were identified by SMITH ZANDER based on sources available, such as the internet, published documents and industry directories. However, there may be companies that have no online and/or published media presence, or are operating with minimal public advertisement, and hence SMITH ZANDER is unable to state conclusively that the list of industry players is exhaustive.*

Sources: Accounting and Corporate Regulatory Authority, SMITH ZANDER analysis

Market Share

In relation to provision of domestic shipping services between Peninsular Malaysia and East Malaysia

In 2020, total container throughput between Peninsular Malaysia and East Malaysia (including Muara, Brunei) was recorded at 0.43 MTEU. Total container throughput of MTTSL Group between Peninsular Malaysia and East Malaysia (including Muara, Brunei) in 2020 was recorded at 0.16 MTEU and thereby, MTTSL Group captured a market share of 37.21% in terms of container throughput between Peninsular Malaysia and East Malaysia (including Muara, Brunei).

In relation to fleet capacity

In terms of global ranking, MTTSL Group was ranked 62nd in Alphaliner Top 100 container shipping operators worldwide, based on total twenty-foot equivalent unit ("TEU") of fleet capacity for both owned and chartered vessels, as at 7 July 2021. Based on the ranking in Alphaliner Top 100 container shipping operators worldwide, MTTSL Group was the highest ranked Malaysian-based container shipping operator as at 7 July 2021.

3 THE CONTAINER SHIPPING INDUSTRY IN THE COUNTRIES INVOLVED

Performance, Size and Growth of the Container Shipping Industry in the Countries Involved

As MTTSL Group's regional container shipping operations primarily cover ports in Singapore, Thailand, Brunei, Indonesia, India and Myanmar, this section covers the container shipping industry in the Countries Involved.

In Singapore, Thailand, Brunei, Indonesia and India, the container throughput in these countries experienced growth from 2017 to 2019 with CAGRs ranging from 4.04% to 46.76%. However, Myanmar experienced a decline in container throughput from 2017 to 2019, registering a negative CAGR of 3.39%. Nonetheless, Myanmar experienced an increase of 7.69% in 2019 as compared to 2018.

Container throughput in the Countries Involved

Country	Container throughput (MTEU)				CAGR (2017 – 2019)	CAGR (2017 – 2020)
	2017	2018	2019	2020		
Singapore	33.67	36.60	37.20	36.87	5.11%	3.07%
Thailand	9.94	10.24	10.76	N/A	4.04%	-
Brunei	0.13	0.43	0.28	N/A	46.76%	-
Indonesia	12.83	14.06	14.76	N/A	7.26%	-
India	15.43	16.95	17.05	N/A	5.12%	-
Myanmar	1.20	1.04	1.12	N/A	-3.39%	-

Notes:

- *N/A – Information is not publicly available.*
- *Latest available information as at 7 July 2021.*

Sources: Maritime and Port Authority of Singapore, UNCTAD, SMITH ZANDER analysis

In view of the COVID-19 pandemic, the Countries Involved are expected to have been impacted by disruptions in global supply chains and slowdown in global trade resulting from lockdowns and movement restriction measures implemented globally to curb the spread of COVID-19. As such, container throughput in the Countries Involved are expected to have experienced declines in 2020.

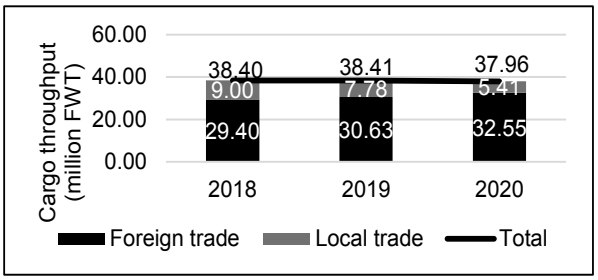
Nonetheless, moving forward, the container shipping industries in the Countries Involved are expected to continue to grow as the global economy recovers once the COVID-19 pandemic subsides.

4 THE DRY BULK SHIPPING INDUSTRY IN MALAYSIA

Dry bulk shipping is a type of sea freight which involves the transportation of dry bulk commodities or solid raw materials by means of ocean vessels, primarily bulk carriers. There are two categories of dry bulk commodities, namely major bulks and minor bulks. Major bulks include coal, grains and iron ores whereas minor bulks include cargoes such as steel products, forest products, cement and fertilisers. Dry bulk shipping services are provided to customers such as producers of raw materials, manufacturers, exporters, importers and traders as well as freight forwarders who act on behalf of the consignees as their forwarding agent.

The performance of the dry bulk shipping industry in Malaysia is measured in terms of total cargo throughput for dry bulk. The size of the dry bulk shipping industry in Malaysia declined from 38.40 million freight weight tonnes ("FWT") in 2018 to 37.96 million FWT in 2020 at a negative CAGR of 0.57%. A slower performance in 2020 was mainly due to a decline in local trade affected by disruptions in supply chain which resulted from the implementation of lockdown and movement restrictions by the Government to curb the spread of the COVID-19 pandemic. Nevertheless, the dry bulk shipping industry in Malaysia is expected to recover when the negative impact from the COVID-19 pandemic subsides.

Total cargo throughput for dry bulk (Malaysia), 2018 – 2020



Sources: MOT, SMITH ZANDER analysis

SMITH ZANDER

5 GLOBAL CONTAINER VESSEL CHARTERING INDUSTRY

Overview

Container vessel chartering is a type of service rendered by container vessel owners who charter out the use of their container vessels to charterers, namely container shipping operators, for domestic, regional or international voyage depending on the suitability of the vessel. Some container shipping operators who own container vessels may charter out their vessels to other container shipping operators as an alternative source of income and to optimise the return on investments on the container vessels when these vessels are not utilised for their own container shipping business. Generally, there are three types of vessel chartering arrangements:

- Time charter - the vessel is chartered for a pre-determined period of time, and the vessel owner remains responsible for the management of vessel and the supply of crew members to the charterer while the charterer decides on the sailing routes of the vessel within the chartering period. The operating costs incurred for the vessel such as ship management and maintenance costs as well as crew costs are borne by the vessel owner, whereas the fuel costs and port dues of the vessel are borne by the charterer;
- Voyage charter - the vessel is chartered for a one-way voyage between specific ports, and the vessel owner remains responsible for the management of vessel and the supply of crew members to the charterer. The operating costs incurred for the vessel which include fuel costs, port dues, ship management and maintenance costs and crew costs are fully borne by the vessel owners; and
- Bareboat charter - the vessel is chartered for a pre-determined period of time. The charterer will decide the sailing route for the vessel and is also responsible for the management of the vessel including the hiring of crew members. The operating cost incurred for the vessel which include fuel costs, port dues, ship management and maintenance costs and crew costs are fully borne by the charterer.

Performance, Size and Growth of the Global Container Vessel Chartering Industry

The range of capacity of MTTSL Group's fleet of container vessels for chartering (existing and future planned purchases) are between 1,000 TEUs and 2,999 TEUs, hence this section focuses on chartering information for container vessels within this capacity.

Based on latest available information, globally, 58.62% of container vessels between 1,000 TEUs and 2,999 TEUs were chartered by vessel owners to third parties, as at 1 June 2021. The total capacity of chartered container vessels of between 1,000 TEUs and 2,999 TEUs grew from 2.05 MTEUs as at 1 December 2018 to 2.21 MTEUs as at 1 June 2021. Further, container vessels of this capacity range had the highest number of chartered vessels where it accounted for 1,200 units out of a total 3,034 units chartered (39.55%), indicating recent strong charter demand for container vessels within this capacity range.

Container vessel fleet breakdown (As at 1.6.2021)

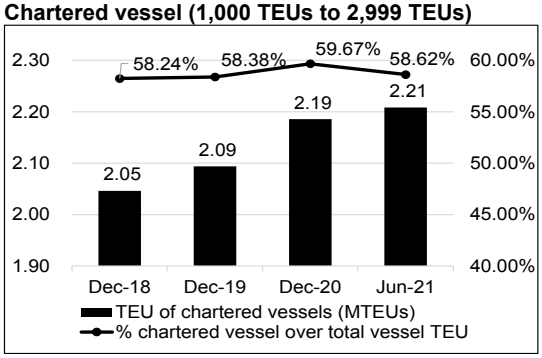
TEU	All vessel		Chartered		
	Units	MTEUs	Units	MTEUs	TEU%
10,000 - 24,000	632	9.27	340	4.70	50.70%
3,000-9,999	1,801	10.70	1,016	5.99	55.98%
1,000-2,999	2,064	3.77	1,200	2.21	58.62%
Less than 1,000	943	0.63	478	0.34	53.97%
Total	**5,440**	**24.37**	**3,034**	**13.24**	**54.33%**

Note:

- *Figures may not add up due to rounding.*

Sources: Alphaliner, SMITH ZANDER analysis

Chartered vessel (1,000 TEUs to 2,999 TEUs)



Note:

- *Figure is as of the first day of the respective months.*

Sources: Alphaliner, SMITH ZANDER analysis

The recent strong charter demand for container vessels of between 1,000 TEUs and 2,999 TEUs is also reflected in the increase in daily charter rates of between USD8,300 per day and USD15,500 per day (as at December 2020) to between USD18,000 per day and USD35,000 per day (as at June 2021).

Charter rates (USD/day)

TEU	Dec 2018	Dec 2019	Dec 2020	Jun 2021
1,000 - 2,999	6,300 - 9,500	6,200 - 10,000	8,300 - 15,500	18,000 - 35,000

Sources: Alphaliner, SMITH ZANDER analysis

As depicted in **Chapter 1 - Impact of the COVID-19 pandemic**, the COVID-19 pandemic has caused an unprecedented shortage of containers as well as port congestion. The delay in port operations and berth delays have led to container vessels overcrowding at ports which has resulted in the disruption in vessel scheduling and prolonged container vessel turnaround time, thus reducing the availability of shipping capacity. As the global economy gradually reopened following the easing of lockdown measures in various countries, container shipping operators rushed to secure more shipping capacity to capitalise on the recovery in shipping demand arising from increasing trade activities. Container shipping operators may have, therefore, resorted to chartering additional container vessels to compensate for the lack of shipping capacity, leading to a surge in demand for container vessel chartering services, as reflected in

the increase in total chartered capacity for container vessels of 1,000 TEUs to 2,999 TEUs from 2.09 MTEUs as at 1 December 2019 to 2.21 MTEUs as at 1 June 2021, an increase of approximately 120,000 TEUs. However, this surge in demand for vessel chartering is expected to ease gradually when global port congestion subsides, and shipping operations revert to pre-COVID-19 conditions.

Nevertheless, moving forward, the global container vessel chartering industry is expected to be driven by the growth in the global container shipping industry. An increase in demand for container shipping services will drive the demand for container vessel chartering to support any long term shipping capacity demand.

Competitive Overview

There are primarily two types of container vessel chartering service providers, namely container vessel chartering companies and container shipping operators. Container vessel chartering companies are involved solely in the vessel chartering business and do not provide shipping services (i.e. do not operate container vessels). Container shipping operators may also offer their unused fleet of container vessels for chartering, which they may call back upon the expiry of the charter contracts for their own operations when they require additional shipping capacity or when the charter market is slow.

Container vessels can be chartered out to any operator around the world subject to the suitability of the container vessels to sail at routes determined by the operators as well as country-specific vessel regulations, if any. Container vessel chartering service providers generally compete in terms of charter hire rates, size, age as well as the condition of the container vessels. The charter hire rates for container vessels are primarily guided by the supply and demand conditions of container shipping capacity available in the market which vary from time to time. Any decrease in demand for container shipping capacity will cause a decrease in demand for container vessel chartering services and reduce charter hire rates, which may affect the growth and profitability of the container vessel chartering service providers.

[The rest of this page is intentionally left blank]