107TH AAPA ANNUAL CONVENTION

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Valparaiso, Chile
A Snapshot of Shipping Today

- Financial pressures on freight rates
- Global trade levels – impacted by external factors
- More consolidation in the past two years than the past twenty
- Increasing costs from sustainable shipping
- Increased focus on the role of technology and digital in supply chains
Industry moving towards more consolidation

<table>
<thead>
<tr>
<th>Capacity market share, %</th>
</tr>
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<tbody>
<tr>
<td><strong>Maersk Line</strong></td>
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<tr>
<td><strong>MSC</strong></td>
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<tr>
<td><strong>COSCO+OOCL</strong></td>
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<tr>
<td><strong>DMC/CGM</strong></td>
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<tr>
<td><strong>Hapag-Lloyd</strong></td>
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<tr>
<td><strong>ONE</strong></td>
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<tr>
<td><strong>Evergreen Line</strong></td>
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<td><strong>Yang Ming</strong></td>
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<td><strong>HMM</strong></td>
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<td><strong>PIL</strong></td>
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<tr>
<td><strong>Zim</strong></td>
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<tr>
<td><strong>Wan Hai</strong></td>
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<tr>
<td><strong>X-Press Feeders</strong></td>
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Source: Alphaliner, end-June 2018.
Top 5 share is growing

Consolidation wave is rolling again – 8 top 20 players disappeared in the last 2 years

Wave 1

Wave 2

Wave 3

Note: Long haul trades defined as non-intra-regional trades. Source: Alphaliner.
Nominal supply growth increasing in Q2 2018

1) Global nominal capacity is deliveries minus scrapings. 2) Q2 2018 is Maersk Line internal estimates where actual data is not available yet.

Source: Alphaliner, Maersk
Headwinds from external factors in H2 2018

1. Source: Alphaliner
Freight rates in ocean down 1.2% compared with Q2 2017

<table>
<thead>
<tr>
<th>Average freight rate (USD/FFE)</th>
<th>Q1 2017</th>
<th>Q2 2017</th>
<th>Q3 2017</th>
<th>Q4 2017</th>
<th>Q1 2018</th>
<th>Q2 2018</th>
</tr>
</thead>
<tbody>
<tr>
<td>East-West</td>
<td>1,813</td>
<td>1,878</td>
<td>1,831</td>
<td>1,691</td>
<td>1,796</td>
<td>1,782</td>
</tr>
<tr>
<td>North-South</td>
<td>1,843</td>
<td>2,087</td>
<td>2,031</td>
<td>1,970</td>
<td>2,018</td>
<td>2,065</td>
</tr>
<tr>
<td>Intra-regional</td>
<td>1,184</td>
<td>1,245</td>
<td>1,240</td>
<td>1,326</td>
<td>1,433</td>
<td>1,485</td>
</tr>
<tr>
<td>Average freight rate</td>
<td>1,713</td>
<td>1,863</td>
<td>1,829</td>
<td>1,750</td>
<td>1,832</td>
<td>1,840</td>
</tr>
</tbody>
</table>

Source: Maersk
Freight rates have been decreasing, but in 2017 they reversed also ahead of bunker cost.

Maersk Line bunker cost
2016: 202 USD/FFE
2017: 308 USD/FFE
→ 106 USD/FFE increase of which 93 USD is bunker price driven\(^1\)

CAGR 12Q1-16Q4 16Q4-17Q4
Freight rate -8% 7%
Bunker price -18% 24%

\(^1\) Rest is bunker consumption driven. Maersk Line freight rates excludes Hamburg Süd. Bunker price is 380cst Rotterdam.

Source: Maersk, Clarkson
Why digitisation – removing barriers to global trade

More than **USD 4 trillion** value of goods are shipped each year

Over **80%** of international world trade is transported by sea

By reducing barriers within the international supply chain, global trade could increase by nearly **15%**, boosting economies and creating jobs

Estimated costs to all parties in the supply chain arising from limited visibility and lack of standardisation averages **one-fifth** of the overall cost of goods

Blockchain technology

From **Kenya to Europe**, the travel of these documents looks like this:

1. **Farm** fills out the **Phytosanitary Certificate** regarding cargo.
2. **Freight forwarder** fills out the **Certificate of Origin**.
3. **Courier** brings them for approval to the **Mombassa Port authorities**.
4. **Courier** brings them back to **Nairobi** for copying and archival.
5. **Original documents** airfreighted to European **Freight Forwarder**.
6. **Courier** transports them to a consulting company to prepare and package with other import related paperwork.
7. **Courier** transports them to **Antwerp port terminal gate**.
8. **If documents are in order**, a truck driver picks up the container.
9. **Transports it to a Dutch customs controlled area** for phytosanitary inspect.
10. **Documents in order? Container released to customer**.

**With the Shipping Information Pipeline it would look like this:**

1. **Kenyan Farm** fills out the Phytosanitary Certificate and gives it to a **Freight Forwarder**.
2. **Freight Forwarder** fills out the **Certificate of Origin**.
3. **Freight Forwarder** uploads both documents into the cloud.

**Shipping Information Pipeline**

- **Consumer**
- **Forwarder Authorities**
- **Shipping company**
- **Trader**
- **Grower**
As of 1st January 2020, new global regulation require all vessels to emit less sulphur particles from the fuel they burn. Whereas today the limit is 3.5% sulphur, the new sulphur cap will be 0.5%
Helping the generations to come with the IMO 2020 regulations

• Major health & environmental benefits from 80% reduction in sulphur pollution from shipping (particularly for people living near ports and coasts)

• Avoidance of premature deaths

• Reduction in childhood asthma cases
How can shipping lines comply?

THERE ARE THREE WAYS IN WHICH SHIPS CAN COMPLY WITH THE NEW RULES

- Use fuel with 0.5% Sulphur
- Install scrubbers (exhaust gas cleaning systems) onboard
- Use alternative fuel
What does this mean for Maersk?

Around **90%** of the global fleet will comply by using **low-sulphur** fuel by 2020. This is also the case for **Maersk Line’s fleet**.

Maersk Line expects its extra fuel costs could exceed **USD 2 billion**. Container shipping industry costs could rise up to **USD 30 billion**.
What are we doing to prepare?

Maersk is looking into all possible and available options to comply with the 2020 sulphur cap, that is **compliant fuels, LNG, and scrubbers**

Various initiatives are being taken to secure compliant fuels through others own blending and storage capacities. Investments have been made in **scrubbers** for a limited number of vessels in our fleet of around **750 ships**

To enable customers to plan for 2020, Maersk has introduced a **fair, predictable surcharge (BAF)** to recover the extra costs

To ensure a level playing field, Maersk is advocating strong enforcement of the **new rules**
Our commitment to sustainable shipping: Enabling a low carbon future by low impact shipping

Since 2007, Maersk Line has reduced the CO₂ emissions per container transported by **43%** (as of 2017)

Maersk Line has set a bold 2020 target of reducing CO₂ emissions per container moved by **60%** (baseline 2007)

Innovation: A modern fleet, radical vessel upgrades, leading network efficiency and cutting-edge fleet performance management are key
Thank you!