Statement of Commissioner Richard A. Lidinsky, Jr.

FOURTH ANNUAL UPDATE:
U.S. Inland Containerized Cargo Moving Through Canadian and Mexican Seaports
2015: Diversion, Port Expansion, and Shifting Market Shares

Four years ago, the Federal Maritime Commission released the Study of U.S. Inland Containerized Cargo Moving through Canadian and Mexican Seaports (“2012 Study”) at the request of Congressional representatives for the Pacific Northwest. Consistent with our practice since the release of that study, this is the fourth update, which focuses on 2015. This year’s update also contains an annex of other current maritime issues that present serious challenges to U.S. ports.

2015 was a pivotal year for U.S. cargo diversion into Canada and Mexico. Initiation of new vessel alliances and reaction in terminals resulted in congestion at West Coast ports towards the end of 2014 and into the beginning of 2015 caused severe delays. In late 2014, the Federal Maritime Commission was actively monitoring this situation and on November 17, 2014 told carriers to stop attempting to impose proposed congestion surcharges. At one point in 2015, there were twenty ships anchored off the coast of the Ports of Los Angeles and Long Beach, fourteen ships waiting off the coast of the Port of Oakland, and seven ships off the coast of the Ports of Seattle and Tacoma. 2015 saw a dramatic increase in container volumes at the Port of Prince Rupert and Port Metro Vancouver on the West Coast of Canada, and Port Lázaro Cárdenas on the West Coast of Mexico. At the same time, 2015 saw a decrease in container volumes at the Ports of Los Angeles, Long Beach, and Oakland as cargo ships carrying goods bound for the U.S. were diverted to foreign ports. Overall, the United States lost market share in the North American container trade as both Mexico and Canada gained market share.

As identified in previous years’ reports, a leading cause for cargo diversions is port congestion, which is in turned caused by a combination of factors that lead to serious operational disruptions for a port. While severe congestion manifested in Los Angeles, Long Beach, and Oakland in 2014-2015, it is a condition that can develop at any port, in any place in the world and lead to domestic or foreign port cargo diversions. Cargo diversion is not a new phenomenon brought about by the congestion crisis. For years, foreign shippers have been directing vessels into Canadian and Mexican ports because of the benefits they offer as another route into mainland United States. Over roughly the past ten years, as the Port of Prince Rupert’s container operations have come online, U.S. West Coast cargo volumes have decreased. For the Ports of the Northwest Seaport Alliance in particular, inbound rail cargo beyond their Port’s range has decreased from 60-70% of total imports to 50-55% of total imports.
All was not lost for West Coast ports last year. Once the congestion on the West Coast subsided and the vessels waiting outside port could make call, West Coast U.S. ports experienced growth for consecutive months to close out the year. This growth continued through the first quarter of 2016. West Coast ports and the U.S. government have vowed that port congestion on the scale experienced in 2015 will not happen again, with West Coast ports taking steps to insure against a repeat. For example, massive infrastructure improvement and expansion projects are underway to ensure ports can handle the increase in cargo volume due to mega ships, and Super-Post-Panamax cranes are being installed along the West Coast to move more TEUS than ever before. Further, evidence shows that shippers still prefer the efficiency and reliability that comes from using the United States as a gateway into North America.

In light of 2015 representing another year in which Canada and Mexico experienced growth in market share of North American cargo, it is clear that in order to stay competitive with neighboring foreign ports, U.S. ports must continue to expand and improve to handle rising container volumes of the coming years.

I would like to personally thank and give credit for their vital assistance in preparing the report to Colin D. Rowe, a rising 3rd year law student at Tulane University’s School of Law who served as the Commissioner’s summer intern, Michael Gordon, Senior Maritime Advisor in the FMC’s Bureau of Trade Analysis, and Jewel Jennings-Wright, who is Counsel to the Commissioner. To the extent that there are any errors or omissions, they are the responsibility of myself alone.

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Richard A. Lidinsky, Jr.
Commissioner
Chairman, 2009 – 2013
Federal Maritime Commission
Washington, D.C.
June 30, 2016
### 2015 North American Container Trade

The North American container trade grew only 1.6% in 2015, with an increase from 39.9 million twenty-foot equivalent units (TEUS) both inbound & outbound in 2014 to 40.6 million total TEUS both inbound & outbound in 2015.\(^1\) This number represents a further decrease from the already minimal growth experienced in 2014 of 2.5% year-over-year compared to 2013.\(^2\) U.S. ports led all North American ports, handling 31.9 million TEUS in 2015 (representing 78.5% of the North American container trade), with Canadian ports handling about 4.9 million TEUS (12.0%), and Mexican ports handling almost 3.9 million TEUS (9.5%).\(^3\)

### Total North American Container Trade – 2014/2015\(^4\)

<table>
<thead>
<tr>
<th></th>
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<th></th>
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</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>31,628,147</td>
<td>79.1%</td>
<td>31,885,694</td>
<td>78.5%</td>
</tr>
<tr>
<td>Canada</td>
<td>4,676,509</td>
<td>11.7%</td>
<td>4,867,393</td>
<td>12.0%</td>
</tr>
<tr>
<td>Mexico</td>
<td>3,669,673</td>
<td>9.2%</td>
<td>3,855,988</td>
<td>9.5%</td>
</tr>
<tr>
<td>Total North America</td>
<td>39,974,329</td>
<td>100.0%</td>
<td>40,609,074</td>
<td>100.0%</td>
</tr>
</tbody>
</table>

Mexican ports experienced the highest year-over-year growth at 5.1% in 2015. Canadian Ports grew 4.1%, while U.S. ports grew only 0.8% in 2015.\(^5\) Growth experienced by Canadian and Mexican ports in 2015 continued a similar trend from 2014, which saw Canadian Ports grow 1.4%, Mexican ports grow 3.5%, and U.S. ports grow only 2.6% year-over-year.\(^6\) This represents the second year in a row where ports outside the United States experienced a growth rate higher than their U.S. counterparts. Mexican seaports in particular experienced the highest growth for a second year in a row.

Though U.S. container trade was down overall last year, West Coast U.S. ports in particular suffered in 2015.\(^7\) The Ports of Los Angeles, Long Beach, and Oakland experienced a slide of -7.4%, -1.1%, and -5.5%

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\(^3\) Salisbury, *supra* note 1.

\(^4\) *Id*.

\(^5\) *Id*.

\(^6\) *Id*.

year-over-year, respectively, in 2015. The Port of Seattle and the Port of Tacoma, together the Northwest Seaport Alliance, experienced growth of 1.3% year-over-year. East Coast U.S. ports were able to keep the overall U.S. container trade in positive figures, with ports in Georgia, South Carolina and Miami experiencing larger than normal container volumes. In comparison, the Port of Prince Rupert in Canada experienced an increase of 14.3% year-over-year; Halifax experienced growth of 4.6%; and Port Metro Vancouver experienced growth of 2.5%. In Mexico, the Port of Altamira, on the Gulf Coast grew 16.0%; Port Lázaro Cárdenas, on the Mexican West Coast experienced total container growth of 0.6% year-over-year; and the Port of Manzanillo, also on the Mexican West Coast, experienced an increase of 2.1%.

### Fastest Growing North American Ports (TEUS)

<table>
<thead>
<tr>
<th></th>
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<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Altamira</td>
<td>176,559</td>
<td>271,014</td>
<td>232,392</td>
<td>286,619</td>
<td>447,573</td>
<td>519,011</td>
<td>16.0%</td>
</tr>
<tr>
<td>Prince Rupert</td>
<td>358,902</td>
<td>156,998</td>
<td>435,908</td>
<td>153,615</td>
<td>515,900</td>
<td>589,523</td>
<td>14.3%</td>
</tr>
<tr>
<td>Miami</td>
<td>344,439</td>
<td>335,577</td>
<td>408,219</td>
<td>363,235</td>
<td>680,017</td>
<td>771,455</td>
<td>13.4%</td>
</tr>
<tr>
<td>Georgia Ports</td>
<td>1,347,467</td>
<td>1,252,759</td>
<td>1,607,858</td>
<td>1,213,013</td>
<td>2,600,226</td>
<td>2,820,871</td>
<td>8.5%</td>
</tr>
<tr>
<td>Seattle-Tacoma</td>
<td>1,240,528</td>
<td>876,594</td>
<td>1,303,009</td>
<td>841,797</td>
<td>2,117,122</td>
<td>2,144,806</td>
<td>1.3%</td>
</tr>
<tr>
<td>Long Beach</td>
<td>3,560,654</td>
<td>1,397,584</td>
<td>3,619,183</td>
<td>1,286,252</td>
<td>4,958,238</td>
<td>4,905,434</td>
<td>-1.1%</td>
</tr>
<tr>
<td>Oakland</td>
<td>827,427</td>
<td>784,688</td>
<td>813,924</td>
<td>707,928</td>
<td>1,612,115</td>
<td>1,521,852</td>
<td>-5.6%</td>
</tr>
<tr>
<td>Los Angeles</td>
<td>4,204,406</td>
<td>1,705,590</td>
<td>3,978,604</td>
<td>1,493,035</td>
<td>5,909,996</td>
<td>5,471,639</td>
<td>-7.4%</td>
</tr>
</tbody>
</table>

Inbound trade saw a repeat of 2014, with Mexican ports leading growth with a 9.9% year-over-year increase (compared to a 9.2% increase in 2014), followed by a 6.8% growth at Canadian ports (compared with a 7.0% increase in 2014), and 3.8% increase in U.S. ports (6.1% in 2014). Of the total inbound cargo handled at North American ports, U.S. ports saw around 19.9 million TEUS in 2015, Canadian ports saw 2.8 million TEUS, and Mexican ports saw 2.3 million TEUS.

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8 Salisbury, supra note 1.
9 Id.
10 Id.
11 Id.
12 Combined data from Port of Seattle and Port of Tacoma, members of the Northwest Seaport Alliance.
13 Salisbury, supra note 1.
14 Id.
## Total North American Inbound Container Trade Growth

<table>
<thead>
<tr>
<th>Country</th>
<th>2014</th>
<th>2015</th>
<th>Y-O-Y % Change</th>
<th>2014 % of Total</th>
<th>2015 % of Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>19,164,324</td>
<td>19,898,706</td>
<td>3.8%</td>
<td>79.9%</td>
<td>79.4%</td>
</tr>
<tr>
<td>Canada</td>
<td>2,639,571</td>
<td>2,803,953</td>
<td>6.2%</td>
<td>11.1%</td>
<td>11.2%</td>
</tr>
<tr>
<td>Mexico</td>
<td>2,132,930</td>
<td>2,343,625</td>
<td>9.9%</td>
<td>9.0%</td>
<td>9.4%</td>
</tr>
<tr>
<td>Total</td>
<td>23,936,825</td>
<td>25,046,284</td>
<td>4.6%</td>
<td>100.0%</td>
<td>100.0%</td>
</tr>
</tbody>
</table>

The dramatic decrease for U.S. inbound cargo of 0.5% (79.9% versus 79.4%) illustrates a continuation of the trend seen in 2014, where U.S. inbound cargo decreased 0.3%. The increase in both Mexican and Canadian bound cargo of 0.4% and 0.1%, respectively, represents a slight change from 2014, where Mexican inbound cargo increased by 0.3% while Canadian inbound cargo remained constant.

### Aftermath of West Coast Decline of 2015

Major U.S. port on the West Coast suffered in 2015 with major port congestion being the leading cause of the decrease in efficiency and reliability. Statistics released by the *Journal of Commerce* show West Coast ports in 2015 with a slight increase in imports of 2% year-over-year compared to 2014. However, exports from West Coast declined 9%, leading to an overall 3% decrease in total container volume.

West Coast ports can take comfort in the fact that 2015, was anything but normal. A month-by-month analysis of container volumes moving through U.S. West Coast ports bears little resemblance to normal traffic flows. Containerized imports in January 2015 dropped 29% year-over-year, and February container volumes were down 21% year-over-year. The reason for this? 2015 started off with the ongoing contract negotiations between the International Longshore and Warehouse Union ("ILWU") and the Pacific Maritime Association ("PMA"), eventually leading to the PMA discontinuing all vessel work during night shifts at all West Coast ports in January 2015. Congestion was such an issue that night shifts had to be focused on clearing out the container yard in order to accept new containers when work resumed the

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15 Id.
17 Id.
20 Id.
22 Id.
next morning. By February, at least twenty ships were anchored off Los Angeles-Long Beach awaiting their berths, at least fourteen vessels waited outside the Golden Gate Bridge for the Port of Oakland to clear, and at least seven cargo-laden vessels waited outside Seattle-Tacoma. In March, a month that is normally calm after the busy Jan-Feb period, U.S. West Coast Ports experienced massive growth year-over-year compared to 2014 as vessels that had been waiting outside were finally able to call. West Coast March imports grew 51% from March 2014.

These factors led directly to cargo diversions to Canadian Ports. Port Metro Vancouver, which was coming off a record-breaking 2014, had a dramatic increase of 1.5 million TEUS in the first half of 2015. Similarly, the Port of Prince Rupert’s market share grew from 9% to 12% during this stretch.

East Coast and Gulf Coast Ports thrived during 2015, some experiencing record years. On the East Coast, container volume increased as a result of shipper and BCO willingness to divert cargo away from West Coast ports to avoid port congestion. According to a report by American Shipper in March 2015, more than 40% of retailers and manufacturers were planning to shift volume from West Coast ports to East Coast Ports on a long-term basis as a result of chronic congestion. On the Gulf Coast, inbound container volume exceeded that of the overall United States. In 2015, 1.2 million TEUS of inbound container cargo were delivered to the U.S. Gulf Coast, representing 6.1% of the overall 19.9 million laden TEUS inbound to the U.S. Inbound TEU volume increased 9.9% year-over-year over 2014. The chart below reveals a comparison of the top West Coast, East Coast, and Gulf Coast ports in 2015.

23 Id.
24 Id.
25 Mongelluzzo, supra note 7.
27 Id.
31 Id.
32 Id.
## 2015 West/East/Gulf Coast Port Inbound Comparison (TEUS)

<table>
<thead>
<tr>
<th>Port</th>
<th>2014 Inbound</th>
<th>2015 Inbound</th>
<th>Y-O-Y % Change</th>
<th>% North American Market Share</th>
</tr>
</thead>
<tbody>
<tr>
<td>New Orleans</td>
<td>92,902</td>
<td>113,852</td>
<td>22.6%</td>
<td>0.5%</td>
</tr>
<tr>
<td>Georgia Ports</td>
<td>1,347,467</td>
<td>1,607,858</td>
<td>19.3%</td>
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<tr>
<td>Miami</td>
<td>334,439</td>
<td>408,219</td>
<td>18.5%</td>
<td>1.6%</td>
</tr>
<tr>
<td>Houston</td>
<td>753,660</td>
<td>842,381</td>
<td>11.8%</td>
<td>3.4%</td>
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<td>Seattle-Tacoma</td>
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<td>Los Angeles</td>
<td>4,204,406</td>
<td>3,978,604</td>
<td>-5.4%</td>
<td>15.9%</td>
</tr>
</tbody>
</table>

Despite the decline in inbound container cargo, West Coast Ports continue to possess the largest percentage of market share. The Ports of Los Angeles, Long Beach, Oakland, and Seattle-Tacoma collectively make up 38.7% of the North American inbound container market. The Gulf Coast as a whole represents only 4.8% of the total North American inbound container market.

West Coast diversion has stabilized since the early months of 2015. The ILWU and PMA reached a tentative contract agreement in February of 2015. By August 2015, container traffic on the U.S. West Coast began reverting back to previous levels. By December 2015, the Port of Long Beach had seen five straight months of cargo increase. Year-to-date, West Coast ports have seen an increase in container volumes compared with 2015. (It should be noted, however, that the 3,389,035 TEUS handled by the West Coast ports through the first quarter of 2015 were the lowest since the global recession of 2009.) East Coast ports have seen a drop in inbound container traffic compared with last year, while West Coast ports have seen an increase in container traffic.

The annual increase in congestion rates combined with the labor disputes of late 2014 and early 2015 and the growing attraction of foreign ports as a means of getting cargo into the United States all led to the continued growth of cargo diversions in 2015. West Coast slowdowns had a significant impact on state

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33 Salisbury, supra note 1.
34 Combined data from Port of Seattle and Port of Tacoma, members of the Northwest Seaport Alliance.
35 Salisbury, supra note 1.
36 Salisbury, supra note 30.
37 Mongelluzzo, supra note 7.
41 Id.
and national economies. Washington State, for example, lost $769.5 million in economic activity due to the 2014-2015 port management-labor contract dispute. On the national level, port congestion led to a drop in 0.2% in the national GDP through the first quarter of 2015.

**Canadian and Mexican Diversion from U.S. West Coast Seaports**

As previously stated, 2015 saw yet another year in which Canada and Mexico experienced growth in market share in North America as the United States’ market share slipped. In order to stay competitive with neighboring foreign ports, U.S. ports must continue to expand and improve to handle the rising container volumes of the coming years.

**Canadian Port Expansion**

**Port of Prince Rupert**

As identified in the original Study of U.S. Inland Containerized Cargo Moving through Canadian and Mexican Seaport, and repeatedly in annual reports, the Port of Prince Rupert (Prince Rupert) poses as an attractive alternative for U.S. West Coast ports for U.S. inbound container traffic. In the years since Prince Rupert opened, the number of container lines offering services has increased from one to ten. The port currently receives four direct calls per week, including two by COSCO, one by Hanjin Shipping, and one by the 2M Alliance of Maersk Line and Mediterranean Shipping Co. Carriers with slot access include CMA CGM, “K” Line, Yang Ming, and Evergreen Line. Wan Hai Lines is set to start taking slots this summer.

Prince Rupert continues to advertise itself as having “significant competitiveness advantages over other West Coast North American Ports.” Such advantages include the shortest trade route between North America and Asia (68 hours), natural channel depth (channel depths of 35m./114ft. and terminal berths of 17m./55ft.), “modern, state-of-the-art facilities,” and access to “fast, efficient, and uncongested rail.”

Prince Rupert has continued to grow since the original study and continues to take market share away from U.S. West Coast ports. Canada’s third largest port, Prince Rupert, located in British Columbia, was the second fastest growing port in 2015 in North America continuing a trend from 2014. Prince Rupert experienced a 21.5% increase in inbound traffic year-over-year compared to 2014 (18.9% increase of from

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45 Id.

46 Id.


48 Id.
2013 to 2014). In order to keep up this growth, Prince Rupert has invested in a multi-phase expansion of its Fairview Container Terminal. Phase I of expansion will increase the total capacity of Prince Rupert to 850,000 TEUS. Each of the four cranes at Fairview Terminal are super-post panamax capable. Phase II, scheduled for completion in 2017, aims to increase annual capacity by an additional 500,000 TEUS, bringing the total capacity of Fairview Terminal to around 1.35 million TEUS. DP World has since purchased Fairview Terminal and is considering further expansion. Dubbed “Phase II South,” the DP World expansion “could potentially be delivered within the next three to five years depending on demand,” and has the potential to raise total capacity of Fairview terminal beyond 2 million TEUS. Prince Rupert has been approved for an environmental feasibility assessment in accordance with the Canadian Environmental Assessment Agency.

A white paper released by Prince Rupert earlier this year identifies U.S. West Coast port congestion as a cause for the Terminal’s increased volumes earlier this year. The numbers support this claim. Through the first half of 2015, Prince Rupert’s market share for North American container traffic jumped from 9% to 12%. Due to Prince Rupert’s rapid growth, the port is nearing capacity, and as a result, container volumes appear to be flattening out. However, flat volumes at Prince Rupert does not diminish its threat to U.S. cargo diversions. The major concern of Staff members at the Northwest Seaport Alliance is “is what happens when Prince Rupert completes development of additional berths and terminals,” identifying that, “this new capacity will allow continued erosion of US market share.”

Prince Rupert attributes much of its growth to its relationship with the Canadian National Railway Co. (“CN”). CN schedules two intermodal train arrivals and two intermodal train departures per day to and from Fairview Terminal, with an average of fourteen train arrivals and fourteen train departures per week. Prince Rupert has 12,000 feet of on-dock rail and twenty-one reach stackers helping to minimize the time between unloading and loading containers from ship to railcar. The FMC has found that Prince Rupert holds a cost advantage over West Coast ports which could be in the range of $250 to $400 per FEU to Chicago via rail.

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49 Salisbury, supra note 1.
51 Prince Rupert, supra note 44, at 2.
52 Id.
55 Braden, supra note 26.
56 E-mail from Staff Members at the Northwest Seaport Alliance (Jun. 23, 2016, 12:16 EST).
57 Prince Rupert, supra note 44, at 5.
58 Id. at 5-6.
59 E-mail from Staff Members at the Northwest Seaport Alliance (Jun. 23, 2016, 12:16 EST).
Port of Prince Rupert – Inbound TEUS Handled (By Destination)

<table>
<thead>
<tr>
<th>Country of Destination</th>
<th>2014</th>
<th>%</th>
<th>2015</th>
<th>%</th>
<th>% Change Y-O-Y</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>222,455</td>
<td>61.8%</td>
<td>295,990</td>
<td>67.3%</td>
<td>33.1%</td>
</tr>
<tr>
<td>Canada</td>
<td>137,505</td>
<td>38.2%</td>
<td>140,218</td>
<td>32.7%</td>
<td>2.0%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>361,974</td>
<td>100.0%</td>
<td>438,223</td>
<td>100.0%</td>
<td>21.1%</td>
</tr>
</tbody>
</table>

The Port of Prince Rupert handled 19.6 metric tons of cargo in 2015, a 4.8 decline from 2014. Private sources state that as much as 67.3% of cargo imported into Prince Rupert in 2015 had a final destination somewhere in the United States, compared to 61.8% in 2014. As a result, of the 438,223 TEUS inbound to the Port of Prince Rupert, nearly 295,990 TEUS were transshipped to a destination in the United States. In 2014, that number was approximately 222,455. As Prince Rupert nears capacity, it remains to be seen whether the expansion improvements continue the success of the terminal as U.S. West Coast ports get back to normal productivity.

**Port Metro Vancouver**

Also situated in British Columbia on the west coast, Port Metro Vancouver is Canada’s largest port and the fifth largest port in North America. In 2015, Vancouver experienced an increase in inbound cargo of 2.9% year-over-year compared with 2014 (5.7% increase from 2013 to 2014). The port handled 1,542,388 inbound TEUS in 2015, making up 6.2% of the North American container market. It handled a total of 2,608,422 TEUS in 2015, a 2.5% year-over-year increase compared with 2,544,755 TEUS in 2014.

Metro Vancouver also advertises itself as a more advantageous option than other ports. Vancouver offers twenty-eight major marine cargo terminals with three Class 1 railroads converging at the port. The terminals are Super-Post-Panamax capable, and have on-dock rail facilities. Of twenty-eight marine cargo terminals, Port Metro Vancouver has four common-user container terminals supported by fourteen transloading facilities and three container storage and maintenance facilities.

However, the trade-enabling industrial land base in Metro Vancouver has been shrinking over the past thirty years. A study by Site Economics, Ltd., released at the end of 2015 identifies that there is only about 1,000 acres of vacant trade-enabling industrial land available in the region suitable for logistics and goods storage.

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60 Id.
61 Salisbury, supra note 1.
62 Id.
63 Id.
movement required to support the growth of the port." According to the report, "... based on the average annual absorption rates and anticipated demand..." the supply of industrial land in the region “could be depleted within a decade.” If the problem goes unaddressed, Port Metro Vancouver may be unable to remain competitive with other trade gateways. “This issue is critical to the future of the Canadian economy, considering nearly 20% of the value of all goods traded by Canada pass through the port here in Vancouver,” stated Robin Silverston, President and CEO of Port Metro Vancouver. The report also revealed that “roughly 1,500 to 3,000 more acres of trade-enabling industrial lands are required in the next five to ten years to meet the demands of a growing Canadian economy.”

It remains to be seen how the reduction in trade-enabling industrial land will effect expansion plans to GCT’s Deltaport Terminal revealed several months before the Site Economics report was released. The C$200 million project is intended to expand on-dock rail capacity at the terminal in order to improve the port’s ability to handle the increase of U.S.-bound cargo and Canadian volume. The terminal has also purchased two new 23 TEU+ wide cranes which will be operational in early 2017. These two cranes will complement the current ten cranes at the facility. Metro Vancouver has also ordered eight electric, wide-span cranes capable of handling 650,000 TEUS of new rail business, which will be ready to go in July of 2017.

Port of Halifax

U.S. bound cargo coming through Canada is not restricted to the West Coast. The Port of Halifax, located on the East Coast of Nova Scotia, is Canada’s third largest port, and the twenty-third largest port in North America. In 2015, the port experience 4.0% increase of inbound cargo year-over-year compared with 2014 (153,622 TEUS in 2014 to 159,786 TEUS in 2015). The Port of Halifax suffered a period of decline between 2013 and 2014, experiencing a drop in inbound cargo of -6.7%, but now appears to be back on track thanks

67 Id.
69 Port of Vancouver, supra note 66.
70 Id.
72 Id.
73 E-mail from Staff Members at the Northwest Seaport Alliance (Jun. 23, 2016, 12:16 EST).
74 Salisbury, supra note 1.
to new investments and a series of new carrier services since last year. The goal is to continue the trend,” says Patrick Bohan, Director of Supply Chain Logistics. A key growth market for the Port of Halifax is the U.S. Midwest.

Since 2004, the Port of Halifax and its stakeholders have invested over C$200 million in infrastructure, including the addition of several super-post-Panamax cranes and the deepening of both the Halterm and Ceres Container Terminals to 55 ft. The Port of Halifax advertises itself as having “the deepest berths on the East Coast of North America.” Features of the port include on-deck, direct-to-rail discharge, a modern infrastructure using the latest technology, and world class security.

The Halifax Port Authority administers two container terminals. The Fairview Cove Container Terminal, operated by NYK/CERES Corp Co., contains 70 Acres of land and 2,297 linear feet of dock. The terminal boasts 11,000 feet of on-dock, double stack rail. Water depth at the dock has recently been expanded to 55 feet along the entire length of the berth. Fairview Cove Container Terminal possesses five gantry cranes, including three Super-Post-Panamax capable cranes. The terminal has a maximum throughput capacity of 780,000 TEUS. South End Container Terminal, operated by Halterm Container Terminal, Ltd., is comprised of 74.5 acres of land and 8,000 feet of on-dock, double stack rail. The terminal possesses seven gantry cranes, including for Super-Post-Panamax capable cranes. The terminal has a maximum throughput of 750,000 TEUS.

The Port of Halifax remains a popular avenue for cargo and freight bound for the U.S. Midwest. In March 2016, Atlantic Container Line (ACL) signed an agreement to keep using Fairview CERES Terminal for its new G4 roll-on/roll-off ships through 2022. The agreement will make Halifax ACL’s “largest port in North America and our [ACL] gateway for Canada and the U.S. Midwest,” stated ACL president and CEO, Andrew Abbot. According to Abbot, quality improvements to the Canadian National rail service and consistent

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76 Id.
77 Id.
79 Id.
81 Id.
82 Id.
84 Id.
86 Id.
cooperation from the International Longshoreman Association who work the terminal were “influential factors” in the decision to remain at CERES Halifax Terminal.  

**State of Canadian Rail**

In last year’s report, we identified Canada’s railway system as being the backbone of the Canadian ports’ ability to divert cargo away from the U.S. West Coast. That statement is still accurate. All three major Canadian ports, Halifax, Prince Rupert, and Vancouver have extensive on-dock rail for simple and seamless transfer of cargo. The CN’s ongoing US$210 million container terminal outside Toronto will effectively increase the railroad’s capacity by around 350,000 containers. The new hub will connect incoming cargo from both Canadian West and East coasts and provide CN customers access “to the key transborder market as well as the Pacific and Atlantic Coast trade gateways [CN serves] ...”  

CN is extending its reach further south into the U.S. The CN has teamed with the Port of Mobile, Alabama in an attempt to establish a “third coast” gateway under the assumption that shippers burned during the congestion slowdown 2015 will use Mobile to move imports into the U.S. Midwest. CN rail will be able to get to and from the Gulf Coast port in a period of 2 to 3 days. CN’s rail network cuts from busy Canadian ports on the west and east coast into Toronto, then into the U.S. via Chicago and Detroit, and on to Memphis, and then down to the Gulf of Mexico to Mobile. The allure of Mobile is the port’s ability to handle the larger vessels that will be able to move through the renovated Panama Canal. The port possesses water depths of 45 feet, plus an extra two feet of water at high tide, and is capable of handling 350,000 TEUs annually. The Port of Mobile is currently in the middle of an expansion that will increase its annual TEU capacity to 500,000 by the end of this year, with plans to deploy Super-Post-Panamax cranes by the second half of 2017. With the possibility of Mobile taking away vessels from U.S. West Coast ports and its connection to intermodal hubs in Chicago and further into Canada, it is clear why CN aims to establish itself on the U.S. Gulf Coast.

**Mexican Port Expansion**

2015 held mixed results for Mexican seaports. Labor disputes and congestion at U.S. West Coast ports allowed Mexican West Coast ports to experience an uptick in container volumes, and proved that Mexican

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87 Id.
89 Id.
90 Id.
91 Id.
92 Id.
93 Id.
West Coast ports were more than up to the challenge in their ability to handle additional cargo when their U.S. West Coast counterparts experienced congestion.

Mexico’s ability to handle cargo from congested U.S. west coast will be further upgraded when APM’s fully automated Terminal in Lázaro Cárdenas opens in mid-2016, with an annual throughput capacity of 1.2 million TEUS. This combined with the ports current annual capacity will bring the ports annual TEU capacity to 3.2 million in 2016.94

Although the future for Mexican seaports looks bright, there are troubling short term signs for cargo transiting to the U.S. destinations. Kansas City Southern rail operations from Lázaro Cárdenas to points in the U.S. continues to experience growing pains and service reliability.95 Competition from the Panama Canal’s expanded locks will prove challenging by allowing carriers to offer all-water routes from Asia to U.S. Gulf Coast Ports at rates which are competitive with rates on cargo moving through west coast ports to points in the U.S. Gulf. In confirming the latter, Maersk recently announced it was replacing its Mexican intermodal route to Houston with an all-water service using 4,200 TEU ships.96

Maersk Line’s new all-water service to the U.S. Gulf Coast from Asia is a direct result of the 2014 and 2015 West Coast port delays. “It’s a faster product, a more reliable product, and we have shifted away from Lázaro Cárdenas” Soren Eghom, Maersk’s vice president, trade and marketing, for North America, said at JOC’s Gulf Shipping Conference in Houston (6/13/2016).97 Maersk had been moving 200 – 250 forty foot equivalents per week via Lázaro Cárdenas, but expects to move 1,000 boxes per week on the new service.98

### Port of Lázaro Cárdenas – Inbound TEUs Handled in 2015 (by Destination)

<table>
<thead>
<tr>
<th>Country of Destination</th>
<th>Inbound TEUs</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>17,284</td>
<td>3.8%</td>
</tr>
<tr>
<td>Mexico</td>
<td>229,211</td>
<td>50.0%</td>
</tr>
<tr>
<td>Other</td>
<td>211,418</td>
<td>46.2%</td>
</tr>
<tr>
<td>Total</td>
<td>457,913</td>
<td>100.0%</td>
</tr>
</tbody>
</table>


97 Id.

98 Id.
According to numbers provided by the Port of Lázaro Cárdenas, only 3.8% of the cargo imported into Lázaro Cárdenas had a final destination somewhere in the United States. As a result, of the 457,913 loaded TEUs shipped into the Port of Lázaro Cárdenas, approximately 17,284 TEUS were transshipped to a destination in the United States, while 211,418 (46.2%) TEUS were transshipped to destinations other than the United States, and 229,211 (50%) of inbound TEUS remained in Mexico.

**West Coast Rebound**

As congestion eased on the West Coast, the loss of container cargo volume at those ports was stemmed. By the end of 2015, West Coast volume began to increase.

In the Pacific Northwest, container imports at the Northwest Seaport Alliance (comprised of the Ports of Seattle and Tacoma) increased 23.1% year-over-year for the month of November compared to a bleak 2014, beginning a slow progression to retake lost market share due to the slowdown. The Northwest Seaport Alliance was the only U.S. West Coast gateway to experience a year-over-year growth in 2015. Total container volume increased 3.7% year-over-year and inbound container traffic increased 5.0% for the entire year compared to 2014.

Further down the coast, the Ports of Los Angeles and Long Beach see 2016 as a year in which they will return to normal container growth and regain market share. Through the first five months of 2016, West Coast ports have experienced back and forth trade volumes. In March, the West Coast was behind the East Coast in both import market share (45% West Coast compared to 47.8% East Coast), and containerized imports by volume. However, the West Coast, led by strong inbound container growth by the Port of Los Angeles, experienced impressive growth in May to get back to normal. The Port of Los Angeles experienced a 15% year over year increase compared to May 2015 which was the “... busiest May in the Port’s 109-year history,” said the LA Port Authority. The Port of Long Beach’s first five month total volume was down 1.4% year-to-date compared with 2015. However, Oakland and Los Angeles total container volumes were up 8.4% and 8.7%, respectively over 2015. The Port of Oakland, where exports have always led over imports, had an increase of outbound cargo of 5.1% in May over May 2015.

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99 E-mail from Departamento de Atención a Clientes, Port of Lázaro Cárdenas (Jun. 10, 2016, 14:54 EST).
102 Bill Mongelluzzo, supra note 42.
104 Id.
105 Id.
106 Id.
United States – Prince Rupert, YTD Inbound TEU Comparison, 2016\(^{107,108}\)

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<tr>
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<tbody>
<tr>
<td>Los Angeles</td>
<td>259,206</td>
<td>367,209</td>
<td>42%</td>
<td>254,225</td>
<td>372,744</td>
<td>46.6%</td>
<td>430,888</td>
<td>287,231</td>
<td>-33%</td>
<td>328,140</td>
<td>343,547</td>
<td>5%</td>
<td>348,427</td>
<td>400,766</td>
<td>15%</td>
<td>1,620,895</td>
<td>1,771,497</td>
<td>9%</td>
</tr>
<tr>
<td>Long Beach</td>
<td>213,667</td>
<td>278,491</td>
<td>30%</td>
<td>204,462</td>
<td>295,870</td>
<td>45%</td>
<td>317,520</td>
<td>207,635</td>
<td>-35%</td>
<td>317,376</td>
<td>247,316</td>
<td>-22%</td>
<td>327,317</td>
<td>330,639</td>
<td>1%</td>
<td>1,380,342</td>
<td>1,359,951</td>
<td>-1%</td>
</tr>
<tr>
<td>Seattle-Tacoma</td>
<td>81,587</td>
<td>108,441</td>
<td>33%</td>
<td>83,109</td>
<td>107,249</td>
<td>29%</td>
<td>149,910</td>
<td>95,321</td>
<td>-36%</td>
<td>97,502</td>
<td>104,396</td>
<td>7%</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
<td>412,108</td>
<td>415,407</td>
<td>1%</td>
</tr>
<tr>
<td>Prince Rupert</td>
<td>35,013</td>
<td>39,540</td>
<td>13%</td>
<td>32,212</td>
<td>36,215</td>
<td>12%</td>
<td>37,959</td>
<td>26,257</td>
<td>-31%</td>
<td>37,819</td>
<td>42,347</td>
<td>12%</td>
<td>39,986</td>
<td>40,474</td>
<td>1%</td>
<td>182,989</td>
<td>184,833</td>
<td>1%</td>
</tr>
</tbody>
</table>

Through May 2016, West Coast ports continue to take back market share lost to East Coast and Gulf Coast ports during 2015. West Coast inbound cargo increased 2% year-over-year in May 2016, while East Coast imports dropped 20% year-over-year, and Gulf Coast imports dropped 13% year-over-year in May 2016.\(^{109}\)

The West Coast rebound is being led by the Port of Los Angeles. With a new fully-automated container terminal at the Port of Long Beach capable of handling Super-Post-Panamax vessels, and the benefits of the Northwest Seaport Alliance beginning to show, ports up and down the West Coast of the United States are looking to make cargo gains in 2016. However, it remains to be seen how the new Panama Canal locks will affect the U.S. West Coast Ports. It will take a few months after the locks open this July to see its true impact on the U.S. West Coast.

Congressional

New Appropriations for Harbor Maintenance Act

The Water Resources Reform and Development Act of 2014 (WRRDA)\(^{110}\) was designed to address the use of monies collected by the Harbor Maintenance Trust Fund (HMTF) through the Harbor Maintenance Tax (HMT), and reaffirm the HMTF’s original purpose of providing funding for the maintenance and dredging


\(^{108}\) Northwest Seaport Alliance had not released cargo statistics for the month of May at the time of this report.


of U.S. ports and harbors. The law sets the annual HMTF target percentage expenditures, increasing each year until FY2025 when 100% of the collected funds will be put back into the ports for operation and maintenance (O&M) improvements. Additionally, the law allocated 10% of HMTF expenditures for emerging harbors, as well as authorizes donor ports to use the HMT for expanded uses including berths and the dredging of contaminated sediments, environmental remediation, and payments to importers, exporters, and shippers transporting cargo through that port.

After criticism of the Act’s failure to fulfill its promise, Congress is taking measures to send significant funding to the U.S. ports. In April of this year, the U.S. Senate Environment and Public Works Committee approved a Water Resources Development Act (WRDA) reauthorization bill, which aims to improve port and inland waterways infrastructure used by commercial vessels. The bill includes modifications to the cost-share formula used for improvement projects, extension of funding authorization for donor and energy-transfer ports, as well as new language to ensure funds appropriated from the HMT are used as intended until they are distributed in 2025. The House of Representatives also passed a WRDA bill allocating $2.7 billion specifically for navigation projects and studies, including $1.26 billion in funding from the HMTF and full use of estimated revenues from the Inland Waterways Trust Fund. Both bills are widely lauded by the maritime industry and port proponents.

The Northwest Seaport Alliance believes that the HMT Reform bills “attempt to provide a comprehensive solution to HMT reform to address all ports’ priorities with regard to the HMT...” and will “substantially address” concerns about the HMT.

“This funding will go towards important dredging and maintenance projects and will be critical in ensuring our ports are prepared to handle the megaships of the future,” says Representative Janice Hahn (D-CA), a strong advocate of port funding who spearheaded the bill last year. Dredging and maintenance will significantly improve U.S. ports ability to handle larger inbound TEU loads that come with the mega ships, thus reducing port congestion and diminishing cargo diversion to Canadian and Mexican Ports.

FAST Act

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111 Federal Maritime Commission, supra note 88, at 8 (In the original 2012 Study, the FMC determined the average TEU HMT cost to be $109).
112 Water Resources Reform and Development Act, supra note 110.
113 Id. at §2106.
115 Id.
117 E-mail from Staff Members at the Northwest Seaport Alliance (Jun. 23, 2016, 12:16 EST).
118 Id.
The Fixing America’s Surface Transportation, or FAST, Act will allow the Department of Transportation to monitor port efficiency through data-collecting and input from the industry.\textsuperscript{119} The FAST Act requires the Bureau of Transportation to collect and annually report performance measures for the nation’s top 25 ports, as measured by total tonnage, containers (TEUS), and dry bulk tonnage.\textsuperscript{120} A working group, made up of members including the Federal Maritime Commission, Army Corps of Engineers, Customs and Border Protection, the Coast Guard, and members of the maritime shipping industry, port authority community, and Labor representatives, among other federal agencies, will report to Congress with recommendations as to how the Department of Transportation can best calculate and provide information on port congestion.\textsuperscript{121}

\textit{21\textsuperscript{st} Century U.S. Port Competitiveness Initiative}

The U.S. Department of Commerce is seeking public input to improve the efficiency and competitiveness of U.S. seaports.\textsuperscript{122} The initiative identifies Congressional intent to avoid a similar situation as the 2014-2015 West Coast seaport slowdown. The agency identified that, “... the department’s goal is to ensure that U.S. seaports and their supply chain have the tools they need to strengthen U.S. port and supply chain competitiveness, facilitate international trade and catalyze local, regional, national economic growth and job creation.”\textsuperscript{123}

The Department of Commerce has requested all interested parties provide input via internet or mail regarding several questions, including: what are the most important challenges and opportunities facing U.S. port-related operations and efficiency; what federal policies could be modernized to promote port-related investment and performance; how the federal government can best collaborate with port stakeholders; what are the best practices for improving port-related operations; among others.\textsuperscript{124} So far, the department has held a series of regional meetings and roundtables with seaports, stakeholders, and port users, and asks input be provided by the cut-off date of July 11, 2016.\textsuperscript{125}

\textbf{Conclusion}

As examined in great detail, several factors are contributing to continued use of neighboring foreign ports for U.S. inbound cargo: 3 major findings are port congestion, stale trade growth, and the ability of U.S. importers to determine cargo routing as part of their corporate import strategy. While there are positive

\begin{itemize}
\item \textsuperscript{119} Fixing America’s Surface Transportation Act of 2015, Pub. L. No. 114-94.
\item \textsuperscript{121} 49 U.S.C §6314.
\item \textsuperscript{122} 21\textsuperscript{st} Century U.S. Port Competitiveness Initiative: Request for Public Comment, 81 FR 33657, (May 27, 2016).
\item \textsuperscript{124} Id.
\item \textsuperscript{125} Id.
\end{itemize}
signs in the Pacific Northwest, this remains a situation that has to be closely monitored by the FMC and U.S. port interests.

This past year saw an increase in Canadian and Mexican inbound cargo diversion away from U.S. West Coast seaports. In 2015, Mexican ports led growth with a 9.9% year-over-year increase (compared to a 9.2% increase in 2014), followed by a 6.8% growth at Canadian ports (7.0% increase in 2014), and 3.8% increase in U.S. ports (6.1% in 2014). Of the total inbound cargo handled at North American ports, U.S. ports saw around 19.9 million TEUS in 2015, Canadian ports saw 2.8 million TEUS, and Mexican ports saw 2.3 million TEUS. As a result of port congestion, U.S. West Coast ports lost market share to Canadian and Mexican competitors while industries using the ports lost billions of dollars.

However, the West Coast is responding to competitive demands. With cargo volumes at the Port of Los Angeles returning to normal, a new fully-automated and environmentally friendly container terminal opening at the Port of Long Beach, and the benefits of the Northwest Seaport Alliance beginning to show, ports up and down the West Coast of the United States are looking to make cargo gains in 2016. These ports have both the responsibility and the ability to regain cargo lost to neighboring foreign ports, as well as attracting future trade into their facilities.

Annex

In preparation for this fourth annual update we have identified several vital issues that are touched upon in this study which have broader implications and are worthy of note during this year and in the future.

Legacy of Previous Years

Problems and Inefficiencies That Lead to Congestion

Continued Equipment Shortages

Chassis shortages have continued to plague the U.S. intermodal commerce system. Last year’s report identified a provision in the ILWU-PMA agreement requiring safety inspections of certain chassis by ILWU workers, as having the potential to cause significant delays.

Chassis shortages represent a serious issue as ocean carriers have dropped out of the chassis business allowing equipment leasing companies to take over. During the last several years, container lines have transferred an estimated 90% of their U.S. chassis to leasing companies or other entities, in an effort to cut costs. Despite reiterating they have left the chassis leasing business, ocean carriers continue to

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126 Salisbury, supra note 1.
127 Id.
128 Hutchinson, supra note 43.
stipulate specific chassis leasing companies in contract agreements. As a result, truckers are finding it increasingly difficult to obtain the specified chassis before picking up cargo at West Coast Ports. To cover for the lack of chassis, chassis-leasing companies rolled out a “pool-of-pools,” in which the three major chassis providers in Southern California guaranteed equipment availability at major ports by maintaining a massive pool of available chassis. However, chassis shortages continue. Truckers are finding it increasingly difficult to meet ports’ mandatory appointment times as they are not able to obtain the proper chassis specified by the ocean carrier.

The Federal Maritime Commission as well as several other U.S. government agencies have begun to look into congestion as a result of chassis availability. The U.S. Department of Commerce’s Advisory Committee on Supply Chain Competitiveness (ACSCC), issued a series of recommendations earlier this year noting that, “equipment shortage blocks containers from leaving the port, overwhelming terminal space and leading to delay charges.”

ACSCC issued three recommendations regarding the improvement of container chassis availability and container flow:

1) “The Federal Government, including the Federal Maritime Commission, should facilitate the establishment of agreements among interested seaports, terminal operators, equipment providers, and other stakeholders to create and operate common (“gray”) chassis pools, at those seaports where such agreements are not already in place.

2) Motors carriers that provide port service should be encouraged to acquire and use their own chassis, with initiatives and assistance from industry partners to help financially constrained truckers to purchase or lease equipment.

3) The Federal Government, including the Secretary of Commerce, should reach out to the port labor-management groups on each coast to resolve any jurisdictional questions regarding gray pool chassis inspection and maintenance.”

While the Federal Maritime Commission does not have jurisdiction over chassis leasing companies, the Commission will undoubtedly continue to add the shipping public in any way that it can, to ensure fair and efficient practices.

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133 Bonney, *supra* note 131.

134 Advisory Committee on Supply Chain Competitiveness, U.S. Dep’t of Commerce, Recommendation to the Secretary of Commerce Regarding U.S. Seaport and Connecting Infrastructure Congestion, 3 (Jan. 21, 2016).

135 *Id.* at 6-7.
PIERPASS
As industry experts continue to analyze factors that contribute to marine terminal congestion, several suggest modifying the controversial PierPass traffic mitigation fee.  

PierPass was put in place in 2005 at the Ports of Los Angeles and Long Beach to address congestion, security and air quality. The PierPass traffic mitigation fee currently charges $69.17 per TEU, Monday through Friday, 3:00 AM to 6:00 PM. The purpose of the charge is to encourage and incentivize cargo owners to move cargo during off peak hours and on weekends. John Cushing, President of PierPass, Inc., says the daytime charge was designed with the specific purpose of pushing traffic into nighttime shifts when freeways and roadways are less congested that during the day. According to Cushing, the PierPass program, “... continues to succeed in doing that.”

PierPass has been a point of contention between terminal operators, beneficial cargo owners (BCOs) and trucking interests over the past several years. “PierPass causes congestion ...” says Weston LaBar, Executive Director of Harbor Trucking Association. The fee provides an incentive for trucks to line up outside ports until the 6:00 PM deadline, leading to further congestion. In an attempt to improve the traffic mitigation system, the Ports of Los Angeles and Long Beach will be implementing mandatory appointment systems this year to help mitigate truck traffic. The appointment systems will be on most of LA-Long Beach’s thirteen terminal operators. LaBar admits that the Harbor Trucking Association is open to appointment systems if they are effectively managed.

Continued Construction of Mega Vessels
Just as the sailing of Malcolm McLean's SS IDEAL X marked the dawn of the container revolution, it might be said Maersk’s order of 20 Triple E’s in early 2011 ushered in the era of the mega container ships (18,000 plus TEUS). Cost economics was the driving force behind Maersk’s decision to order the Triple E’s. Although never publically announced, David Skov, former head of Maersk’s Southern China market claimed the Triple E’s breakeven point was below 70% utilization. This brought slot costs down to record breaking levels, which translated to huge profits for carriers with these types of vessels in their inventories.

138 Mongelluzzo, supra note 137.
139 PierPASS, supra note 138.
140 Mongelluzzo, supra note 137.
141 Id.
142 Id.
143 Id.
Maersk’s Triple E order was soon followed by orders for these type of ships from other carriers not wanting to be left at a competitive disadvantage. The Maersk order, combined with record low interest rates on ship building loans, and competition between ship yards launched a ship buying frenzy among owners. Competition between shipyards brought the cost of an 18,000 TEU container ship down to about $200 million. Lower prices in the range of $190 million, as in the case of the Triple E’s, were offered to carriers placing multiple orders. In 2015 alone, eleven ships with a capacity of over 18,000 TEU were built. Since Maersk placed its order in 2011, twenty-one ships with a capacity of 18,000 plus TEUS have been launched, and this does not include the numerous ships in the 16,000 to 17,000 TEU range which were also purchased during the same time frame.

The advent of the mega container ships has had mixed results. In a perfect world, where demand exceeds capacity, there is no doubt on the cost advantages the larger ships bring to their owners, but the current glut of orders for these ships, combined with a mild recession, has left these ships wanting of cargo.

“During the last quarter of 2015, global shipping capacity increased by 7% while demand grew by only 1%. As a result, the price of shipping a container fell by nearly half.” Global capacity will increase by 4.5% in 2016, and 5.6% in 2017; almost all of it due to new ships in the 18,000 plus TEU range. The excess capacity, combined with the recession allowed freight rates fell to record lows. Combined with record low volumes of cargo, record low freight rates, and unexpected congestion at ports ill prepared to handle vessels of such size, the record profits envisioned when these vessels were ordered are proving elusive, and has the trade wondering how much longer carriers can afford to run these ships before having to lay them up, much like they did with their overextended fleets in 2008. Even Saren Skou, CEO of Maersk Lines admits that it misjudged the container shipping market when it ordered the 20 Triple E’s. Since this 2013 comment by its CEO, the reality of market conditions forced Maersk to lay up one of its Triple-E’s in October 2015 for the winter season, with the prospect of more layups possible.

Is a New Port Balance the Way of the Future?

With the West Coast shipping industry returning to a sense of normalcy, it is likely that the West Coast U.S. ports will continue to see an increase in market share. The benefits of using West Coast ports as a

148 Id.
gateway into mainland United States still exist. For the time, labor disputes have settled down and congestion has diminished as a result.

Continued Benefit of West Coast vs. Canada/Mexico

In June of 2016, Xeneta, a Norwegian-based company that provides container freight rate benchmarking and market intelligence, revealed the top three reasons why freight shippers switch containership carriers: price, risk management, and loss of trust. The same can be said for why an ocean carrier will decide to switch ports. In a business that changes as rapidly as the container shipping industry, time is money. The ocean carrier’s cargo-laden vessels were spending massive amounts of money by waiting outside port. The increase in cost for a West Coast call lead to a lack of trust between carriers and U.S. West Coast ports. In some cases, carriers were driven to Canadian and Mexican ports through necessity and risk management.

Data shows that cargo diversions has been occurring since far before 2012. The attractiveness of Canadian and Mexican ports still exists. Last year’s labor disputes and subsequent slowdown magnified the issue. However, the majority of shippers will likely revert back to West Coast U.S. ports despite the attractiveness of foreign ports if U.S. ports manage to automate, expand, and take steps to minimizing congestion. They can do this through infrastructure improvements to better handle inbound cargo from mega-ships, improved turn-around time for truckers, and quicker resolutions to labor disputes. This is certainly feasible, and if successful, West Coast U.S. will continue to see containerships return to port as trust, price, and risk mitigation allow.

West Coast Infrastructure Improvements

In order to hold onto market share recovered since the slowdown of 2014/2015 and compete with rapidly modernizing Canadian and Mexican ports, U.S. West Coast ports are going through large expansion projects. The Ports of Los Angeles and Long Beach are prepared for continued growth into the future. “The San Pedro Bay ports will revolutionize the industry,” says Jon Slangerup, chief executive of the Port of Long Beach. The LA/LB port complex is in the middle of a 10-year, $7 billion investment plan to rebuild marine terminals, raise cranes to accommodate mega ships, densey terminal operations through automation, and expand intermodal rail access.

Improvements, including automation projects that will increase the ports throughput capabilities are currently underway at TraPac terminal in Los Angeles and Middle Harbor terminal in Long Beach. At full

153 Id.
tilt, Middle Harbor will have an annual throughput capacity of 3.5 million TEUs (compared to Prince Rupert’s planned 1.35 million TEUs and Lázaro Cárdenas’ planned 4.1 million TEU throughput capacity at its TEC2 terminal). Additional improvements include BNSF rail’s proposed Southern California International Gateway, which will provide the ports with an additional large near-dock facility adjacent to Union Pacific’s ICTF facility about five miles from the harbor. A California Court has recently ruled against the original proposal for the railway, making its future uncertain.

The Port of Los Angeles has recently been approved a $1.17 billion budget for FY2016 and 2017 to continue port improvements. The Port of Long Beach has recently completed Phase I of its $4 billion Middle Harbor expansion providing the terminal with full-automation and Super-Post-Panamax capable cranes capable of handling 20,000+ TEU vessels. Phase II of the terminal is on-schedule for 2019.

In April of this year, The Northwest Seaport Alliance approved $141 million for terminal upgrades. Plans for the terminal include expansion and the installation of Super-Post-Panamax cranes at Husky Terminal and South Harbor. The expansion is the “... first major investment that the commissions will be approving in our harbors and gateway ...” said the Port of Seattle President, John Creighton, and represents “... a real historic moment for the alliance.”

The Port of Tacoma’s Husky Terminal will receive reconstruction of Pier 4 to align it with Pier 3 to establish a continuous 2,960-foot berth. The expansion also includes at least two Super-Post-Panamax cranes to add to the two under construction. Improvements will allow two 18,000 TEU mega-ships to dock simultaneously. Construction is expected to be finished in 2018.

The Northwest Seaport Alliance is taking a number of steps to stay competitive, including making The Northwest Seaport Alliance operational, terminal redevelopment projects, deepening channels, and undertaking operational improvements by working with customers and stakeholders to establish an Operations Service Center, greater visibility of shipment status, and managing gateway performance.

154 Id.
155 Id.
160 Id.
161 Id.
through mutually-agreed upon metrics.\textsuperscript{162} Both Seattle and Tacoma have major terminal modernization projects underway that will provide improvements allowing the port to handle larger ships, including having the right number and size cranes, enough container yard space, as well as an efficient road, rail, and gate complex with sufficient queue.\textsuperscript{163}

West Coast ports are hoping that infrastructure investments in the region “... position the waterfront for the future as bigger ships change the landscape.”\textsuperscript{164} In a recent 2015 Annual Report, the Pacific Maritime Association says that such investments, “are critical in helping the West Coast respond to competitive challenges from the opening of the Panama Canal ... growing Canadian ports, and modernized port facilities ... in the Gulf States and on the East Coast.”\textsuperscript{165}

THE IMPACT OF THE AMENDMENTS TO THE INTERNATIONAL CONVENTION FOR THE SAFETY OF LIVES AT SEA, 1974

In 1974, the International Maritime Organization (IMO) adopted the International Convention for the Safety of Life at Sea (SOLAS) that is currently in force today.\textsuperscript{166} The SOLAS convention sets minimum standards for the construction of, equipment on, operation of ocean going ships.\textsuperscript{167} In 2010, the IMO initiated a study of the inaccuracy of container weights after improperly reported container weights were implicated in vessel causalities including the beaching of the MSC Napoli.\textsuperscript{168} As a result, in November 2014, the IMO issued amendments to the SOLAS Convention for provision of verified gross mass (VGM):

\begin{quote}

\footnotesize

162 E-mail from Staff Members at the Northwest Seaport Alliance (Jun. 23, 2016, 12:16 EST).
163 \textit{Id}.
165 \textit{Id}.
166 The first version of SOLAS was adopted in 1914 in response to the sinking of the Titanic. Between 1929 and 1960, three additional versions of the convention came into effect. In 1974, the acceptance procedures – providing that “an amendment shall enter into force on a specified date unless, before the date, objections to the amendment are received from an agreed number of Parties.” International Maritime Organization, International Convention for the Safety of Life at Sea (SOLAS), 1974, \url{http://www.imo.org/en/About/Conventions/ListOfConventions/Pages/International-Convention-for-the-Safety-of-Life-at-Sea-(SOLAS)-1974.aspx} (last visited Jun. 16, 2016).
168 On January 18, 2007, the MSC Napoli was beached after the hull suffered structural damage during inclement weather in the English Channel. Once grounded, 660 of the remaining containers were weighed. Of those 660, 137 were each more than 3.3 tons greater than their declared weight. In total, those 137 containers alone were approximately 344 tons over the weight listed on the manifest. Dennis Bryant, \textit{SOLAS is Critical to Seafarer and Cargo Safety}, \textit{THE JOURNAL OF COMMERCE}, May 24, 2016, \url{http://www.joc.com/regulation-policy/transportation-regulations/international-transportation-regulations/solas-critical-seafarer-and-cargo-safety_20160524.html} (last visited Jun. 16, 2016).

\end{quote}
“4 In the case of cargo carried in a container, except for containers carrier on a chassis or trailer when such containers are driven on or off a ro-ro ship engaged in short international voyages as defined in regulation III/3, the gross mass according to paragraph 2.1 of this regulation shall be verified by the shipper either by:

1) Weight the packed container using calibrated and certified equipment; or
2) Weighing all packages and cargo items including the mass of pallets, dunnage and other securing material to be packed in the container and adding the tare mass of the container to the sum of the single masses, using a certified method approved by the competent authority of the State in which packing of the container was completed.

“5 The shipper of a container shall ensure the verified gross mass is stated in the shipping document. The shipping document shall be:

1) Signed by a person duly authorized by the shipper; and
2) Submitted to the master or his representative and to the terminal representative sufficiently in advance, as required by the master or his representative, to be used in preparation of the ship stowage plan.

“6 If the shipping document, with regard to a packed container, does not provide the verified gross mass and the master or his representative and the terminal representative have not obtained the verified gross mass of the packed container, it shall not be loaded on the ship.”

The two main takeaways from the SOLAS Convention amendments are the requirement for the shipper to provide the verified weight of the container to the carrier and to the terminal operator sufficiently in advance of the sailing, and if the weight is not verified it will not be shipped. Further, the IMO issued methods in which the verification of VGM could be achieved:

1) Weighing the packed container; or
2) Weighing all packages and cargo items, including the mass of pallets, dunnage and other securing material to be packed in the container and adding the tare mass of the container to the sum of the single masses, using a certified method approved by the competent authority of the State in which packing of the container was completed.

The U.S. Coast Guard, who has the primary responsibility for enforcing the SOLAS VGM amendments in the United States, issued a Marine Safety Information Bulletin on April 28, 2016 addressing the amendments declaring that “the existing U.S. laws and regulations for providing verified container weights

are equivalent to the requirements in SOLAS Regulation VI/2.”170 The Coast Guard also noted that there is a dynamic and flexible business relationship between parties in the export supply chain, and the equivalency allowed for flexibility to reach arrangements to ensure compliance.171 Further, the Bulletin acknowledged that shippers, carriers, terminals, and maritime associations had, to that point, outlined multiple acceptable methods for providing VGM, including “(1) the terminal [weighing] the container, and when duly authorized, [verifying] the VGM on behalf of the shipper, and (2) the shipper and carrier reach [an] agreement whereby the shipper verifies the weight of the cargo, dunnage, and other securing material, and the container’s tare weight is provided and verified by the carrier.”172

Prior to the Coast Guard determination of equivalency, the Ocean Carrier Equipment Management (OCEMA) issued a set of best practices that went to address the VGM requirements.173 The best practices issued by OCEMA were identical to the SOLAS regulations in that they required the shipper to weigh the container, however, the OCEMA regulations seemed to require that shippers weigh the container away from the port.174 These practices were met with widespread disapproval from shippers, with the primary concern being that they should not be held legally liable for the container weight, in the event the tare weight on the container is incorrect.175

In recent weeks there has been some agreement on methods that should be employed to implement the requirements. OCEMA carriers and six East Coast and Gulf ports filed an agreement with the FMC to discuss implementation of SOLAS.176 The Commission unanimously approved this agreement with expedited review on June 24, 2016, allowing the agreement to go into effect prior to the July 1st implementation of the regulations.177 Further, in a statement issued on June 17, 2016, the Ocean Carrier Equipment Management Associations (OCEMA) acknowledged its strong support of the use of on-

171 Id.
172 Id.
176 FMC Agreement No. 201233.
terminal scales to weight containers. According to the statement, under the OCEMA Terminal Weighing Approach”

“U.S. ports and marine terminal operators could weigh containers moving through their truck gates and provide the gross container weights directly to the ocean carrier stowage planners. Shippers availing themselves of this option would not be required to provide a signature to the ocean carrier for each container, but would acknowledge that the use of on-terminal scaling provides a VGM.”

This new development was positively received by members of the shipping public, including the leaders of AgTC, who were the strongest opponents to the previous methods suggested by OCEMA.

Though much progress has been made, there is still more details to sort out, including which terminals will provide weighing services and whether they will charge for those services. For example, the Ports of Savannah and Charleston are offering weighing services for free while the Ports of Baltimore and New Jersey will charge. On the West Coast, members of both the West Coast MTO Agreement (WCMTOA) and the Oakland MTO Agreement have stated that they will continue to weight trucks arriving at their ports with containers as they have under the requirements of the Occupational Safety and Health Administration (OSHA) requirements. They will continue to provide the weights to the ocean carriers for use at their discretion, and the trucker provided weight of the truck and the chassis, or a formula using average truck tractor weight and chassis weight, can be deducted from the gross weight as a manner of calculating the gross mass of the container.

While the previous mentioned developments are welcome, the discussion regarding who is going to provide the VGM to the carriers has not been resolved. There has been push back from the marine terminal operators (MTOs) regarding the OCEMA Terminal Weighing Approach. The National Association of Waterfront Employers (NAWE) issued a statement on denouncing the notion that, “marine terminal operators who have no continuing commercial or insurable interest in the shipper’s cargo, should bail everyone out of the impending requirements.”

181 Id.
It should be noted that though some industry parties have suggested that the new VGM requirements will lead to congestion at U.S. ports, the true effect of VGM on congestion will not be known until well after July 1. For its part, the IMO has suggested that administrators and authorities should take a “practical and pragmatic” approach when enforcing the VGM amendments for the first three months following implementation. Further, it remains to be seen whether shippers will divert export cargo to ports where VGM weighing services are provided on the terminals. However, it would be logical to conclude that if VGM regulations do lead to additional congestion at US ports, the industry could see shippers divert more cargo to different ports as was done in the wake of the 2014-2015 congestion crisis on the West Coast.

Panama Canal Expansion
Renovations to the Panama Canal have the potential to have a substantial impact on cargo diversions away from the U.S. West Coast the Atlantic and Gulf ports. The expansion opened on June 26 of this year with the passage of the COSCO SHIPPING PANAMA through the Cocolí. The nine-year, $5.4 billion expansion more than doubles the canal’s cargo capacity. A third channel is being added to the canal to accommodate vessels up to 14,000 TEUS. While the canal still will not be able to handle some of the modern mega-ships with upwards of 18,000 TEUS, it is still a massive upgrade over the Canal’s former passage, which struggled with vessels of 5,000 TEUS.

The expansion was necessary for the Panama Canal to maintain a competitive in the international shipping industry. The expansion shortens the route between Asian markets and the U.S. East Coast by five days. So far, 136 ships that previously would not have been able to fit through the pre-expansion canal have made reservations to navigate the new route. Six vessel strings, four from CKYHE alliance and two from the G6 alliance have announced enhanced services with ships between 6,000 and 10,000 TEUS. MSC has replaced Panamax ships with 8,000-9,000 TEU vessels for its Europe-West Coast South America route through the canal. The 2M alliance plans to shift one Asia-East Coast currently running through the Suez Canal to Panama.

Expansion will no doubt have an effect on U.S. West Coast ports. According to a recent report by Boston Consulting Group and C.H. Worldwide Inc., the expansion is expected to shift about 10% of the Asia-to-
U.S. container traffic from West Coast ports to the East Coast. An earlier report, written by an organization of West Coast interests called “Beat the Canal” estimated the expansion would shift 20% of West Coast cargo to the East and Gulf Coasts. The industry has responded to the expansion. On the East Coast, ports hope that the expansion will continue the trend of larger ships calling at East Coast ports to avoid West Coast Congestion. On the U.S. West Coast, ports are confident that multi-million dollar expansion projects will help maintain a competitive advantage over East Coast ports. Meanwhile, the Canadian National Railway is teaming with the Port of Mobile in hopes of establishing an intermodal railway through the American heartland. The effects of the Panama Canal expansion likely will not be seen for several months, but that doesn’t stop the industry from preparing for the future.

188 Id.
189 Bonney, supra note 185.
190 See Pacific Maritime Association, supra note 165.
191 See Szakonyi, supra note 91.