

Strategies to Maximize Port Utilization while Minimizing Traffic Congestion in Hampton Roads

White Paper

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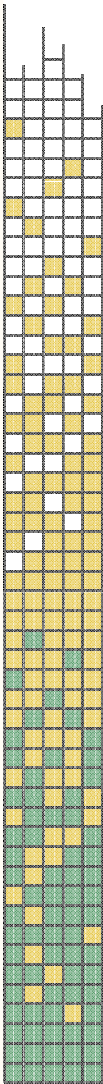
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Agenda

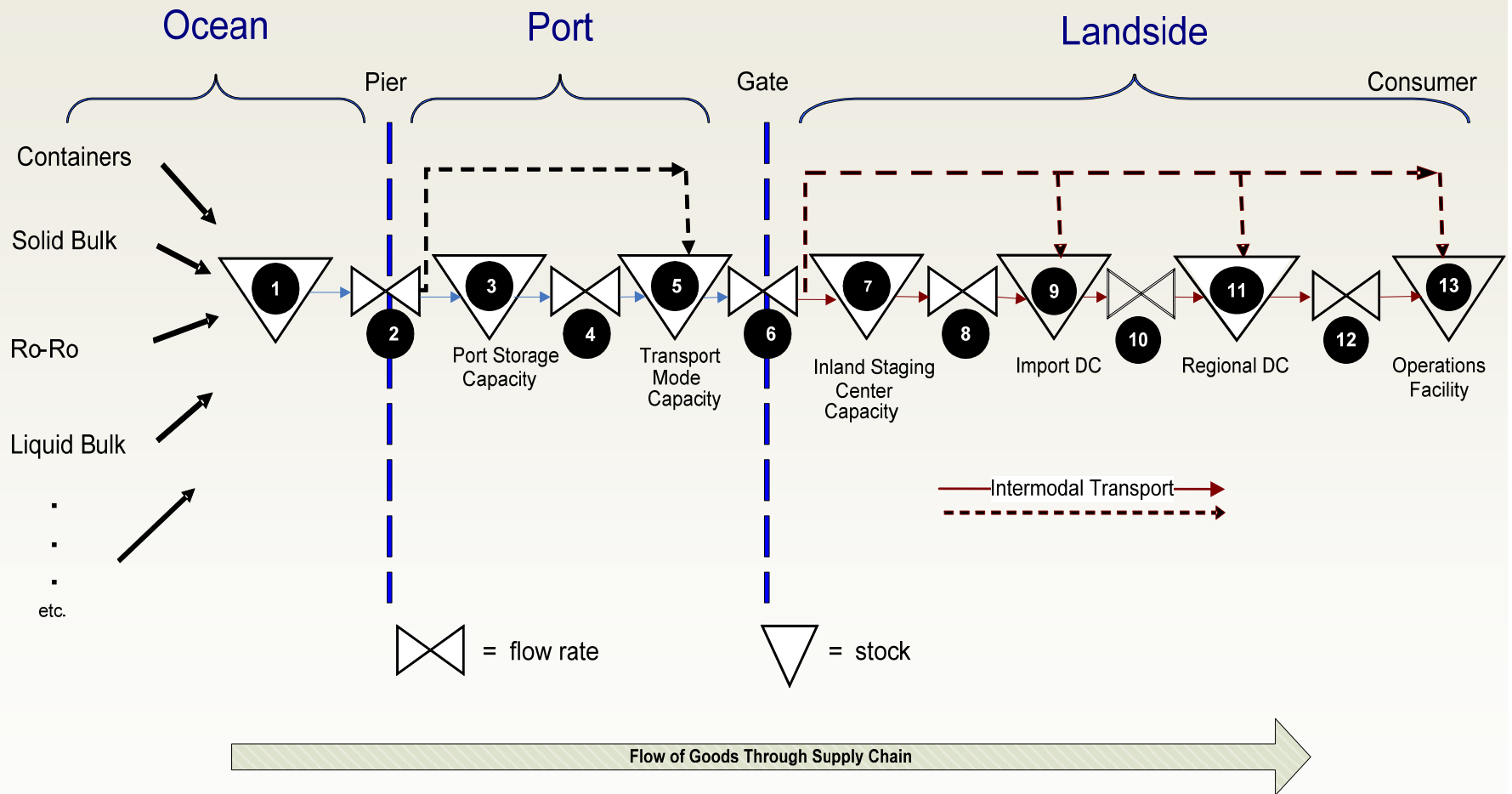
- The Goal of the Study
- How Ports Compete—the Nature of Supply Chains
- How Shippers Choose Transportation Modes
- Important Similarities and Dissimilarities with other Supply Chains
- Conclusions and Recommendations

Our Goal

- Understand the supply chains that flow through Hampton Roads
- Study Hampton Roads infrastructure that facilitate supply chain flow from terminals
- Find ways to negotiate the difficulties of maintaining a competitive port while managing the resulting congestion



How Ports Compete-the Supply Chain



How Shippers Choose Transport Modes

- Ports compete with one another based on:
 - Port Characteristics
 - Deep Water
 - Access to Logistics choices (e.g. Heartland Corridor, Virginia Inland Port, Local Distribution Centers)
 - Supply chain cost
 - Charges, Fees, and Ease of Use
 - Delivery time constraints
 - Their own and Customers



How Shippers Choose Transport Modes

Many Strategies:

- Logistics Modes
 - Truck, rail, barge, inland ports, intermodal parks, creative combinations, etc
- Distribution and Warehousing
 - Import Distribution Centers
 - Regional Distribution Centers
 - Crossdocking/Trans-loading
- Shippers consider *all-in* costs and delivery time in decision making



Important Similarities/Dissimilarities

- Lessons Learned
 - Alameda Corridor
 - Achieved intended congestion reduction results?
 - Application of fees to modify behavior
 - Do fees help or hinder or both?
 - Intermodal Parks
 - Centralized facilities—focuses planning, traffic
 - What about existing infrastructure?
 - Changes in Logistics Strategies by shippers
 - Can change on the proverbial dime!

Conclusions and Recommendations

- Big Picture decision making
 - Participants only see only a small part of the supply chain picture
 - Planning solutions need to consider the complexity and network characteristics of the supply chain
 - Cost to shippers drives decision making so any slight change can lead to significant results—good and bad
 - Loss of traffic is problematic because of the difficulty in regaining new and old traffic
 - Economic conditions create even more risk



Q&A

