Sustaining the Sea Base

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Current Commercial Resupply Network

- Optimized network of rail, truck, and ships
- Designed to move large volumes over a fixed route
- Relatively inflexible
Adapting the present liner vessel network to provide focused delivery of specific material for a specific purpose

- Selective Retrieval & Discharge
  - In place on sea base, will likely not be available on commercial liner vessels
- Cooperation between commercial and military planners is required
Physical Challenges to Support the Sea Base

• Mooring a Ship into a Sea Base
  – Skin to Skin
  – Fendering and Mooring
  – Relative Motion between Vessels
Physical Challenges to Support the Sea Base

Moored to a Liner Vessel

Moored to an HSV
Physical Challenges to Support the Sea Base

- Discharging cargo to the sea base
  - Cargo handling equipment
    - Motion compensation
      - 6 degrees of freedom
    - Environmental sensing and predictive control
Meeting the Logistical Challenges

- Full visibility throughout the delivery process
  - Total Asset Visibility
  - RFID
  - Just in Time Delivery

➤ Requirement also exists with commercial customers
“... it is perfectly useless to get a thousand tons of gasoline when you need five hundred tons of gasoline, two hundred tons of ammunition, and three hundred tons of bridging material.”


Total Asset Visibility

- Detailed visibility to ensure that needed supplies reach the warfighter
- Customized logistics services focus on in-theater logistics efficiency at any mission stage from pre-engagement design to planning for disengagement
- Global distribution capabilities enable the right supplies delivered to the right hands at the right time for streamlined in-theater logistics
In Conclusion…

Research and development as well as extensive testing has already been done and continues to be performed to meet non-military customers’ requirements.

The military must continue to tap into the sophistication of this commercial knowledge and partner with industry in the advancement of sea basing technology and logistics process development.