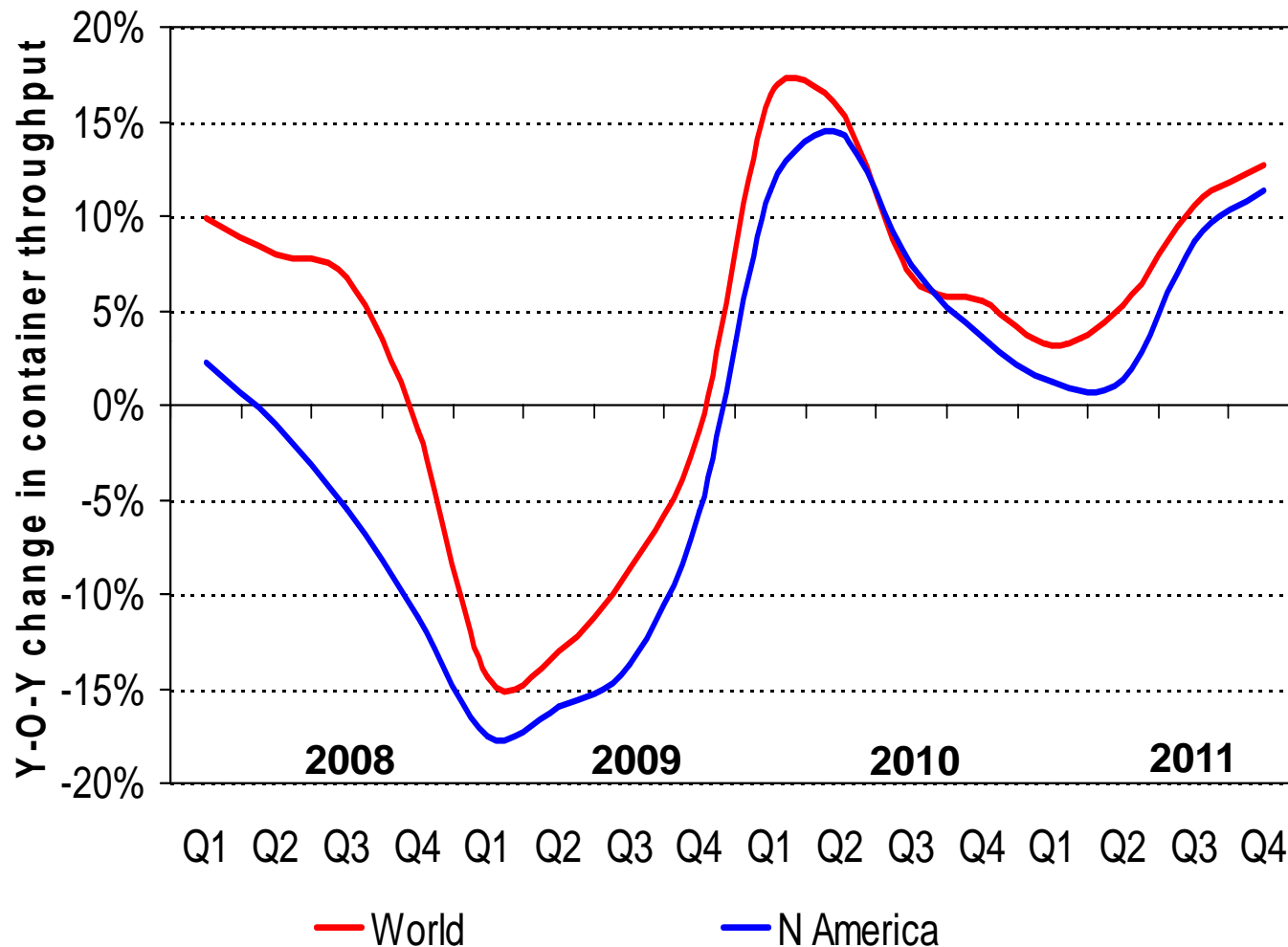


AAPA Conference

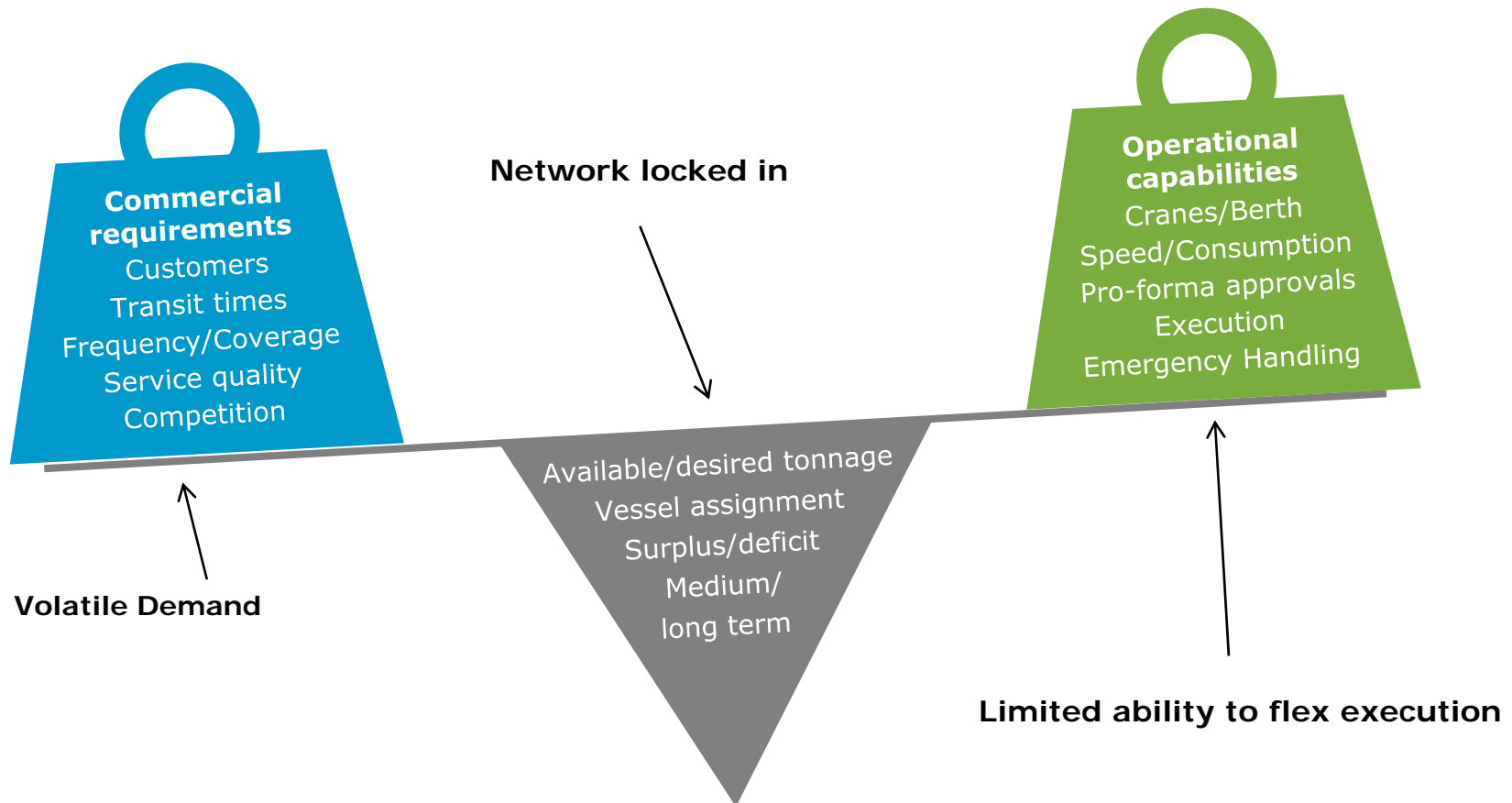
**Handling variable import/export volumes in the
U.S. and impact to marine infrastructure**

February 2011

World container trade – volatility!



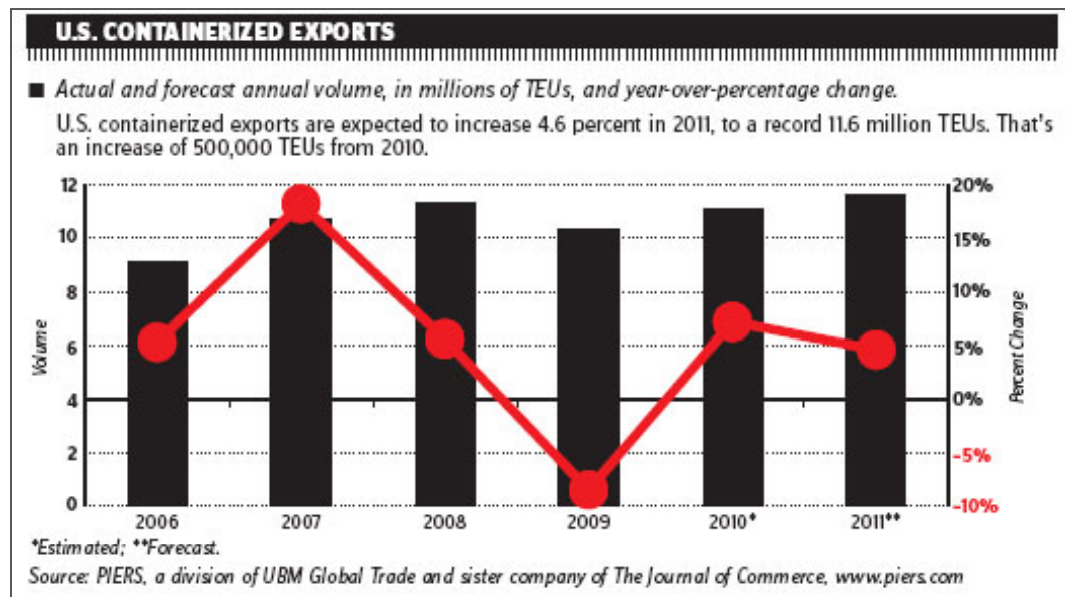
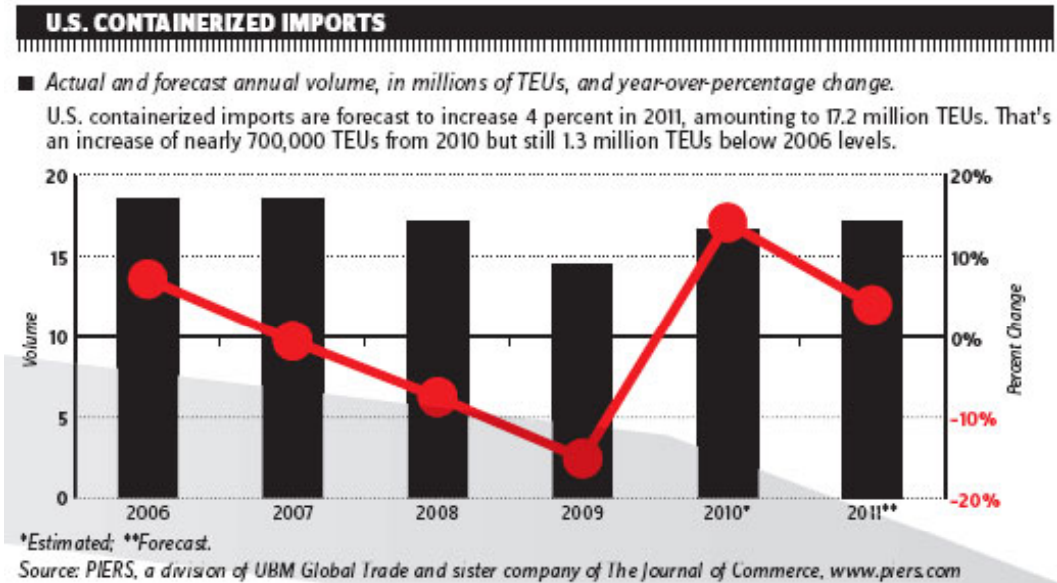
The network is sensitive to many types of change – demand, bottlenecks, prices, operational execution



Industry Forecast

Trade Growth

- 2011 imports expected at 17.2 mio teu up 4% - still down 1.3 mio teu vs 2006! 25,000 teu/week
- 2011 exports expected at 11.6 mio teu up 4.6% - should exceed 2008 volumes.
- Number of services/ capacity has not changed to any extent in 5 years



Flexibility of assets if crucial – close collaboration between Lines, Rail and Terminals

Product focus on:

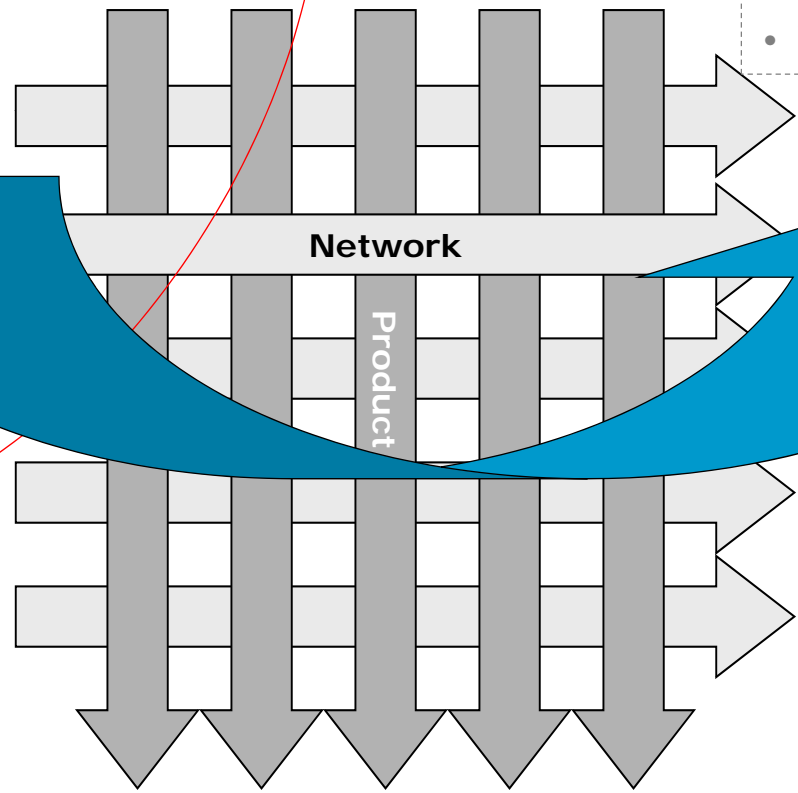
- Markets and customers
- Medium-term (1-3 year horizon)

Operations focus on:

- Short term constraints
- Key bottle necks/contingencies
- Moving the boxes
- Vendor alignment

Network focus on:

- Overall network
- Long-term (2-15 year horizon)
- Conceptual design
- Across markets
- Strings (loops)



Lay up ships – close space on Terminals?

Requires vast improvement in communications

- > Significant interaction between stakeholder (capture joint knowledge)
- > Some reactivity, some proactivity
- > Scale benefits – can they be realized?
- > Risks to the forecast
- > Finding the opportunities – Customer value drivers
- > Do we design to
 - 1) sell what we have
 - 2) design what we can sell
- > And then...
 - During Execution – Things Change
 - Collaborate with Customers/Vendors and Adapt

Future Considerations...

Value Drivers – Lowest Cost and Reliability

- > **The upward trajectory of port and rail costs from the U.S. West Coast ports to the Mid-West makes this transportation unsustainable at today's ocean shipping rates.**
 - > This is of most immediate concern for cargo entering the U.S. from Southern California ports.

- > **If nothing changes, this international intermodal cargo will continue to shift to the East Coast and Western Canada.**
 - > In today's economy, you can expect cargo to eventually follow the most economic route.
 - > The market will reward the "path of lowest cost" in the end for larger and larger amounts of cargo.

- > **The cost gap between moving a container from a vessel moored alongside and East Coast terminal to Chicago, Memphis or Atlanta and making the same move off the West Coast is large already**
 - > The cost trends on both coasts will only increase that gap unless something changes.
 - > New ocean services through the Suez and Panama Canals take advantage of this gap
 - > Widening of the Panama Canal will accelerate the trend

- > **- A "quantum drop" in rail and port costs in the West is the only way to keep growth volumes flowing through that window.**

Thank you.....

