



# JITI Global Logistics Seminar: Infrastructure for Future Competiveness

**March 27, 2014**

## **Building for the Future**

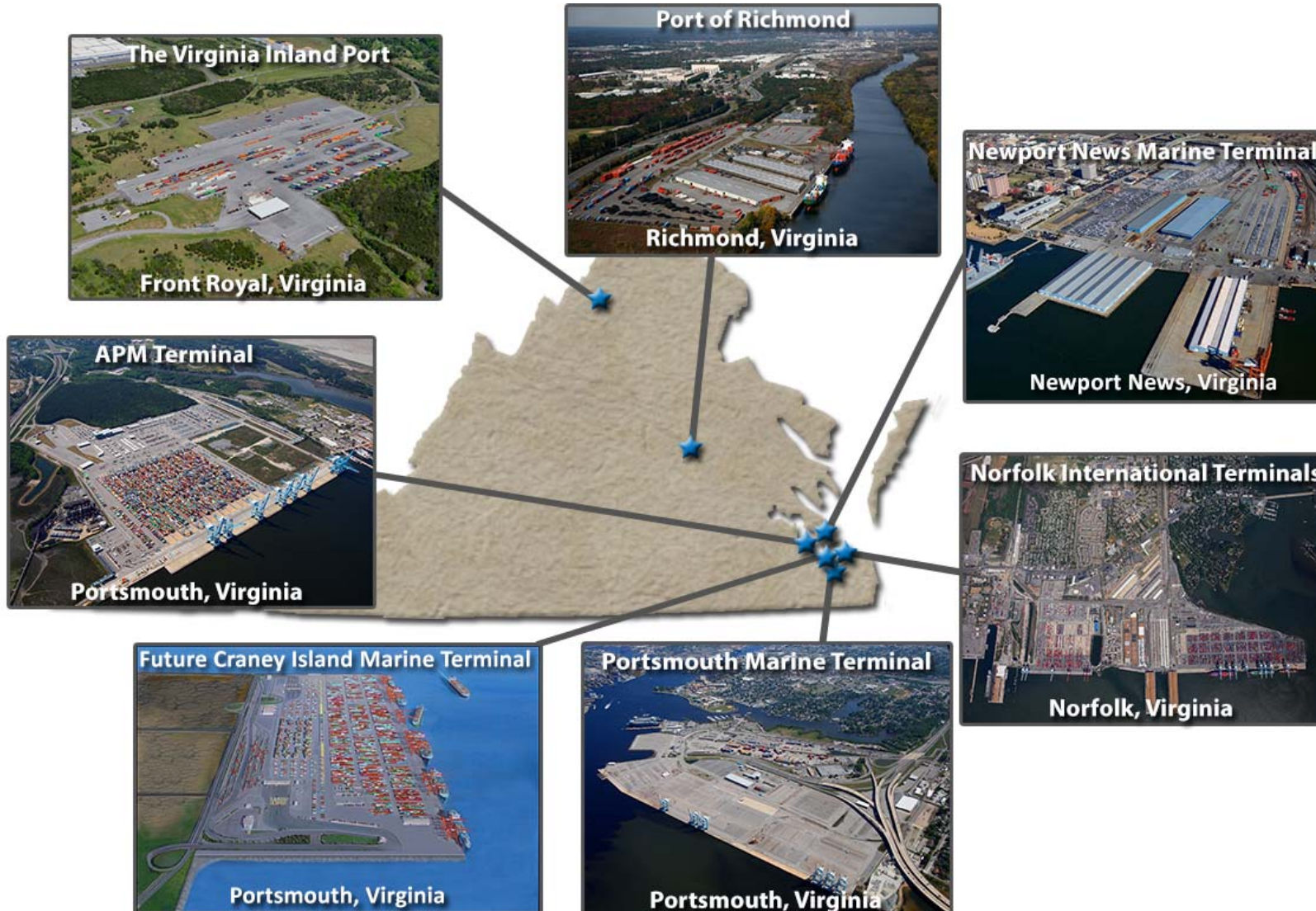
**Jeff Florin**

**Vice President of Port Development**

**Virginia Port Authority**



# VPA Terminal Locations





# An Economic Engine for Virginia

- Mission is to foster and stimulate commerce in the Commonwealth through state-owned cargo terminals
- Port growth results in jobs and revenue for Virginia, currently accruing
  - 343,000 port and port-related jobs statewide
  - \$41 billion in business revenues
  - \$1.2 billion in state and local taxes



# Recent Port Growth

- Fastest growing East Coast container port in 2012 (handled over 2.1 million TEU)
- 2012 was the second best year in history of the Port of Virginia
- Increased port growth results in more jobs and revenues for Virginia

Rank	Port
1	LA/Long Beach
2	NY/NJ
3	Savannah
4	Oakland
<b>5</b>	<b>The Port of Virginia</b>
6	Houston
7	Seattle
8	Tacoma
9	Charleston
10	Jacksonville

Source: AAPA 2013

# Intermodal Transportation



*Trucks 62%*



*Rail 34%*



*Barge 4%*

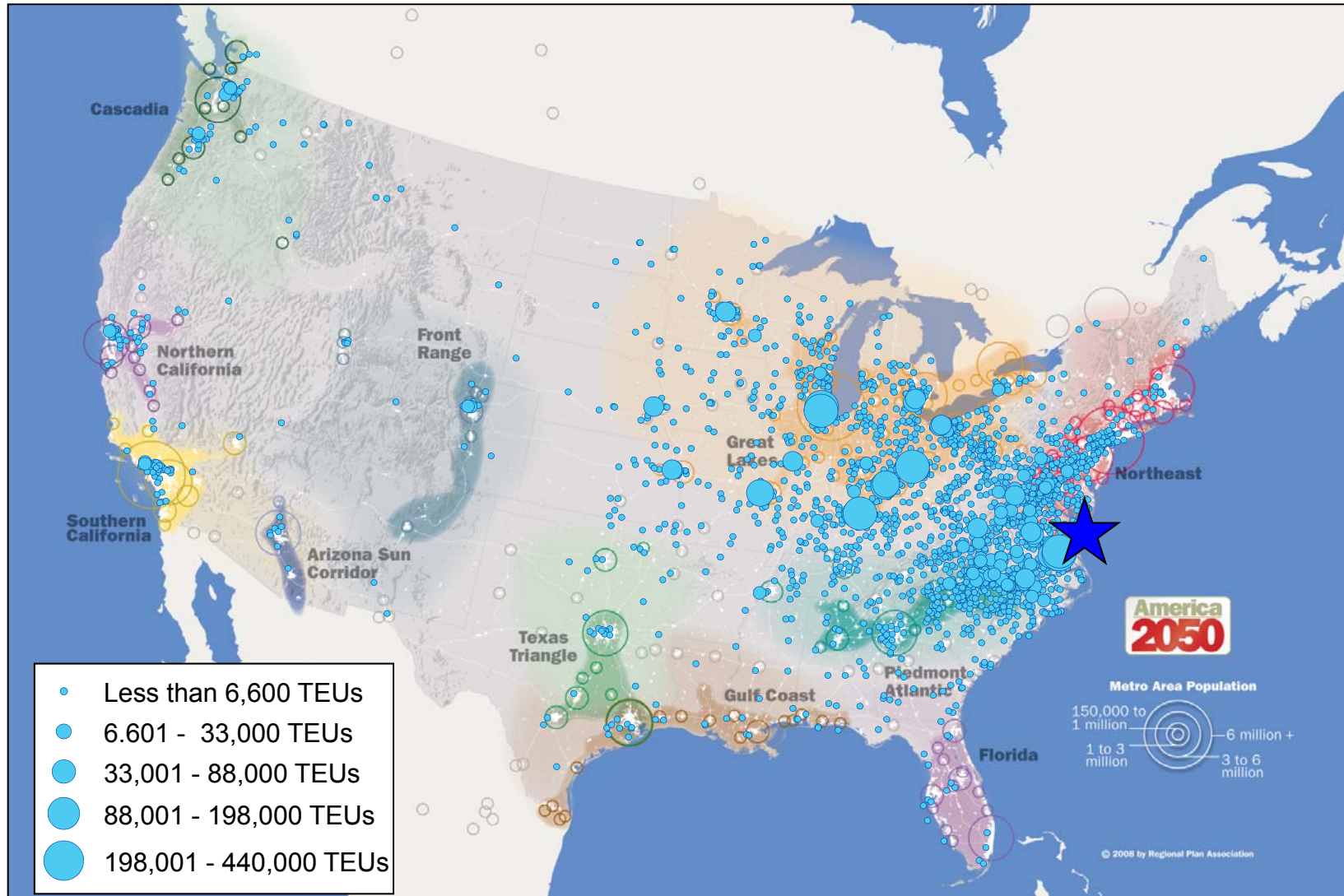
# Virginia's Competitive Advantages

# Virginia's Advantages for Growth

- 50 foot channels
- Inexpensive dredging
- No air draft restrictions
- Short transit time to ocean channel
- Suez-class cranes
- Automated terminals
- Dual-rail access
- Inland transportation
- Expansion plans underway



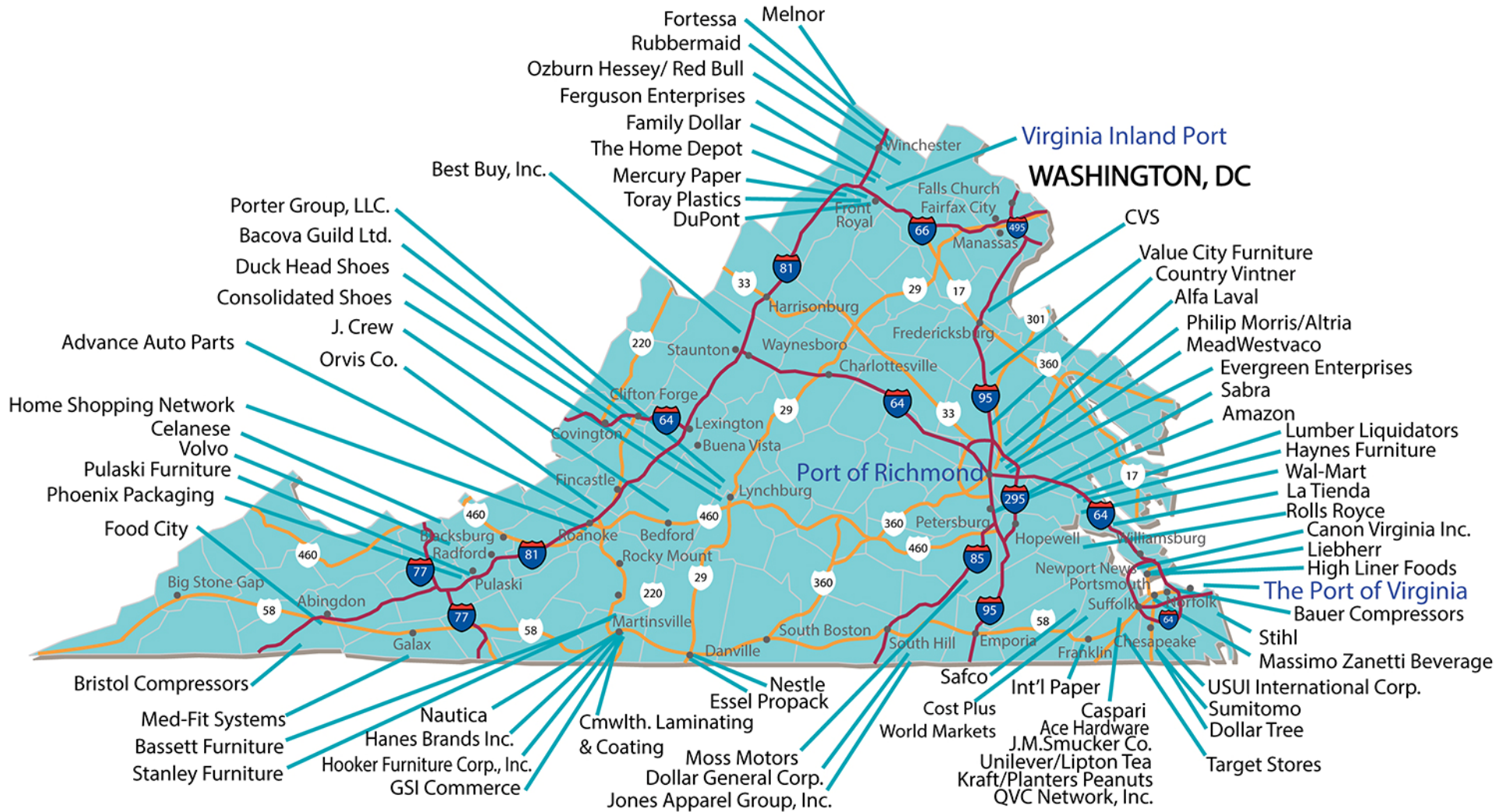
# Mid Atlantic U.S. Location



*The Port of Virginia is within a day's drive of two-thirds of the U.S. population*



# Distribution Center Network



# APM Terminals Dual Rail Access

- Two Class 1 Railroads - Norfolk Southern and CSX
- On-dock rail, Rt. 164 Median Rail, National Gateway and Heartland Corridor connections

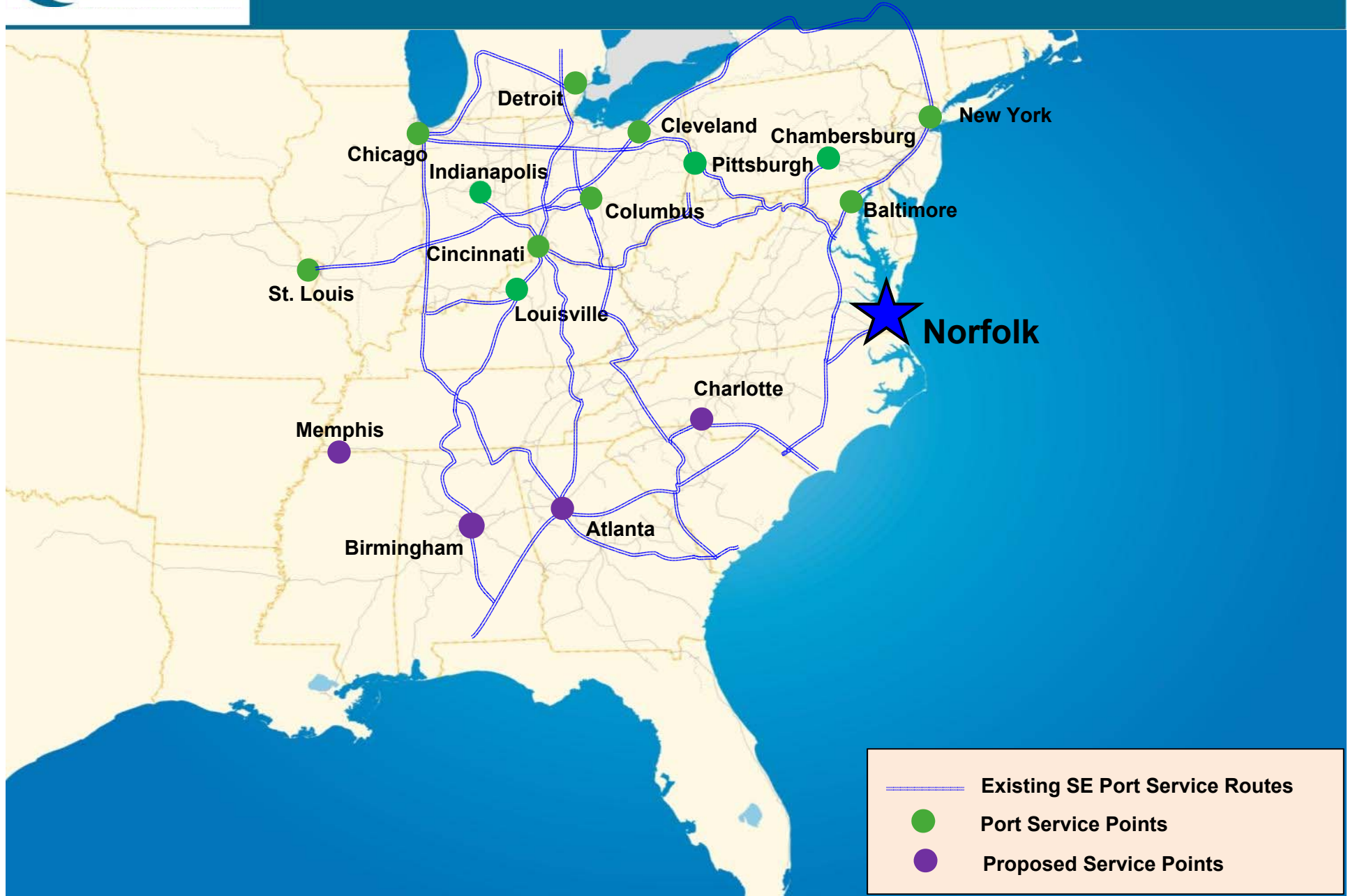


# NS Norfolk Services





# CSX Norfolk Services



# Managing the Changing Global Logistics Climate

*The stronger South Asian economies grow and keep exporting to the U.S., the more the East Coast will see continued growth*

The Examiner

*BNSF says Panama Canal Won't Hurt West Coast*

Journal of Commerce

*Canal Toll Prices, Western Rail rates and East Coast Channel Depth will Greatly Determine Outcome of Canal Expansion*

John Vickerman Journal of Commerce

*Illinois grain exporters, seeking empty containers, fret about decline in imports from China*

Northwest University Study

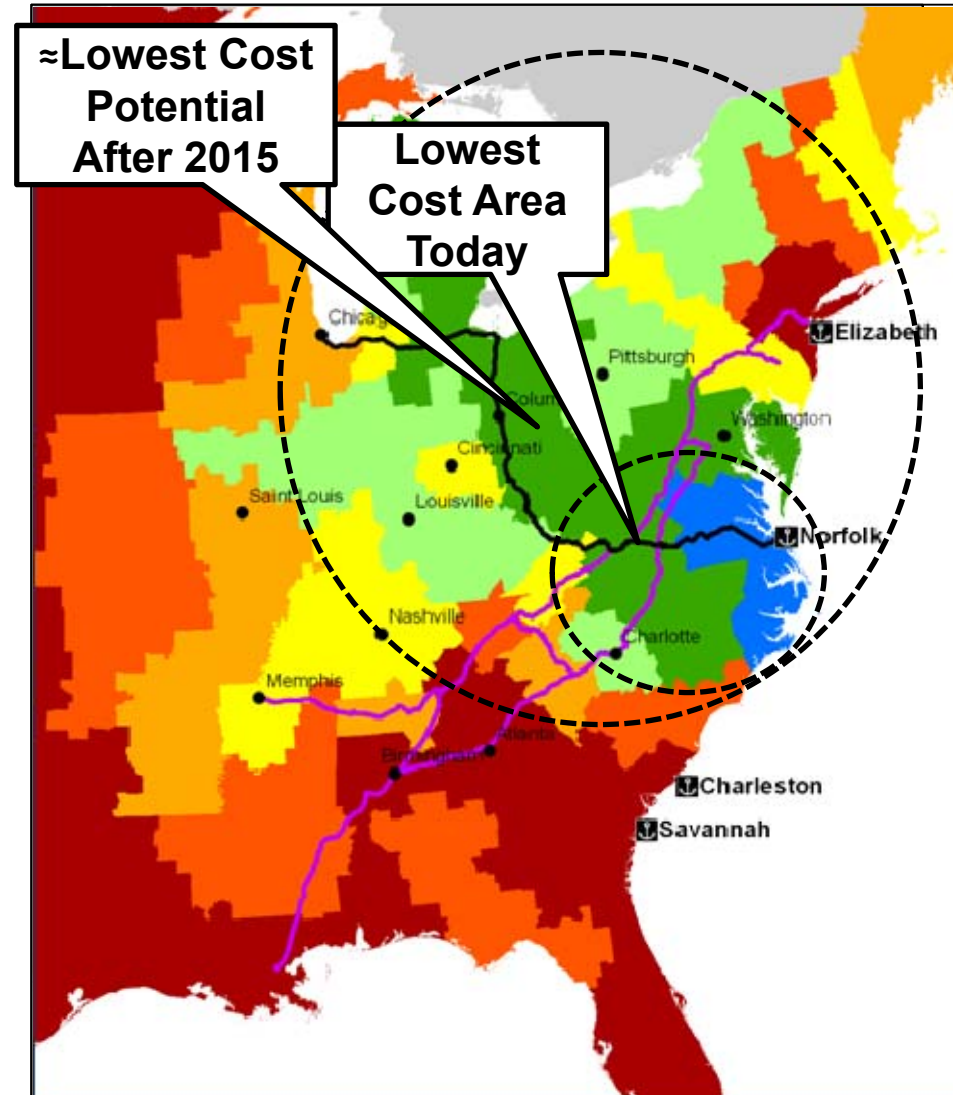
# Panama Canal Expansion

- Virginia is the only East Coast port with deep enough channels for the newest, largest container ships



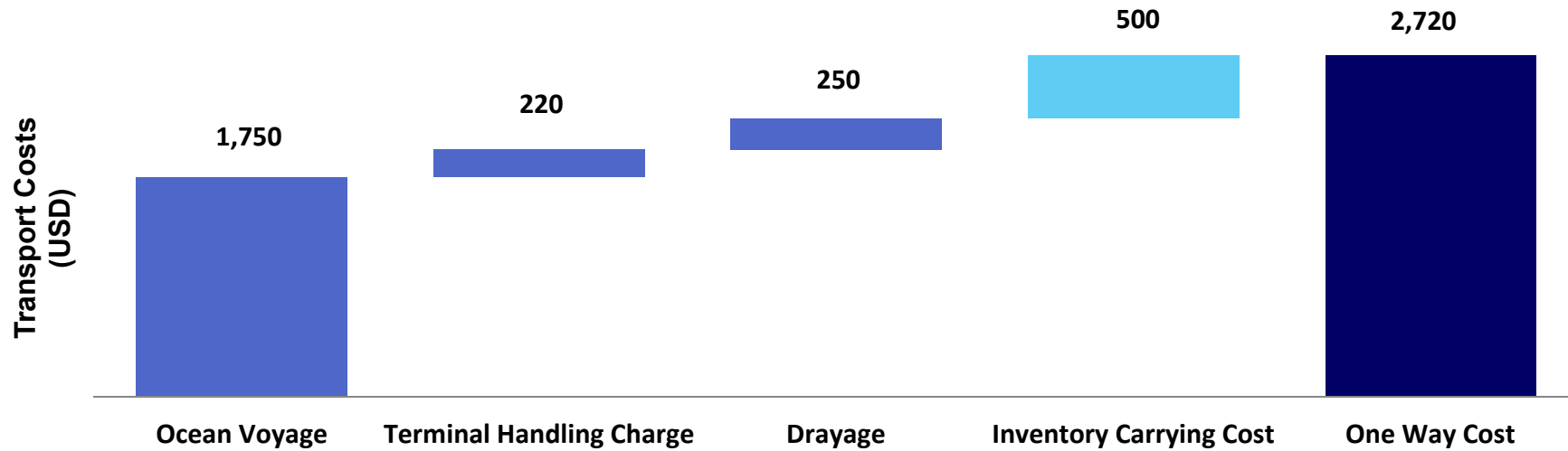
*MSC Chicago set a record at APM Terminals last year for a fully-loaded ship requiring a 49-ft berth*

- Complete in 2015
  - East Coast demand should increase
- If larger container ships go through Canal to Virginia
  - Economies of scale could lower costs
  - Increases market reach measured by total cost to serve



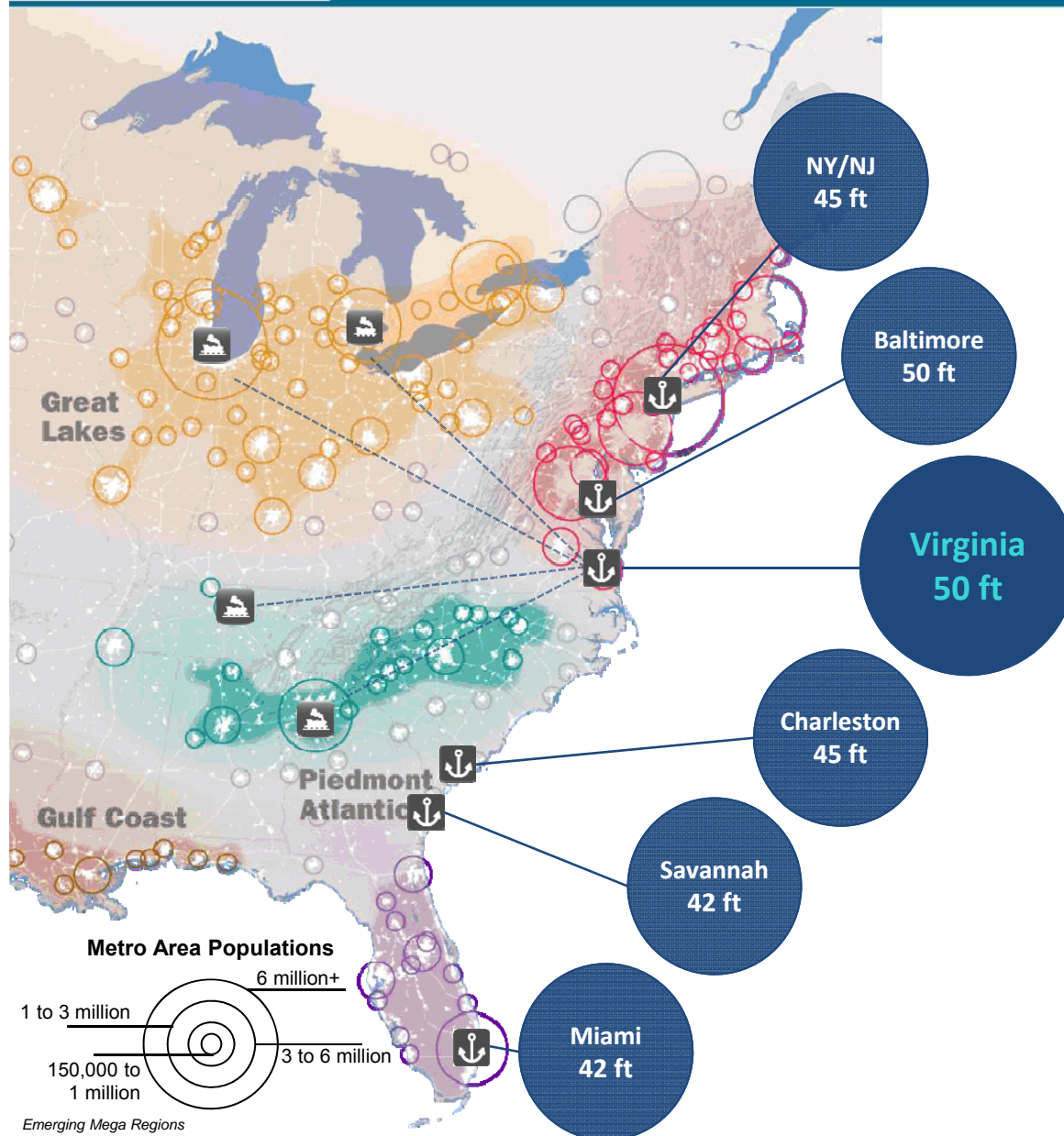


# Example of Logistics Costs



*Illustrative cost breakdown of an international container move by truck (North Asia to Memphis )*

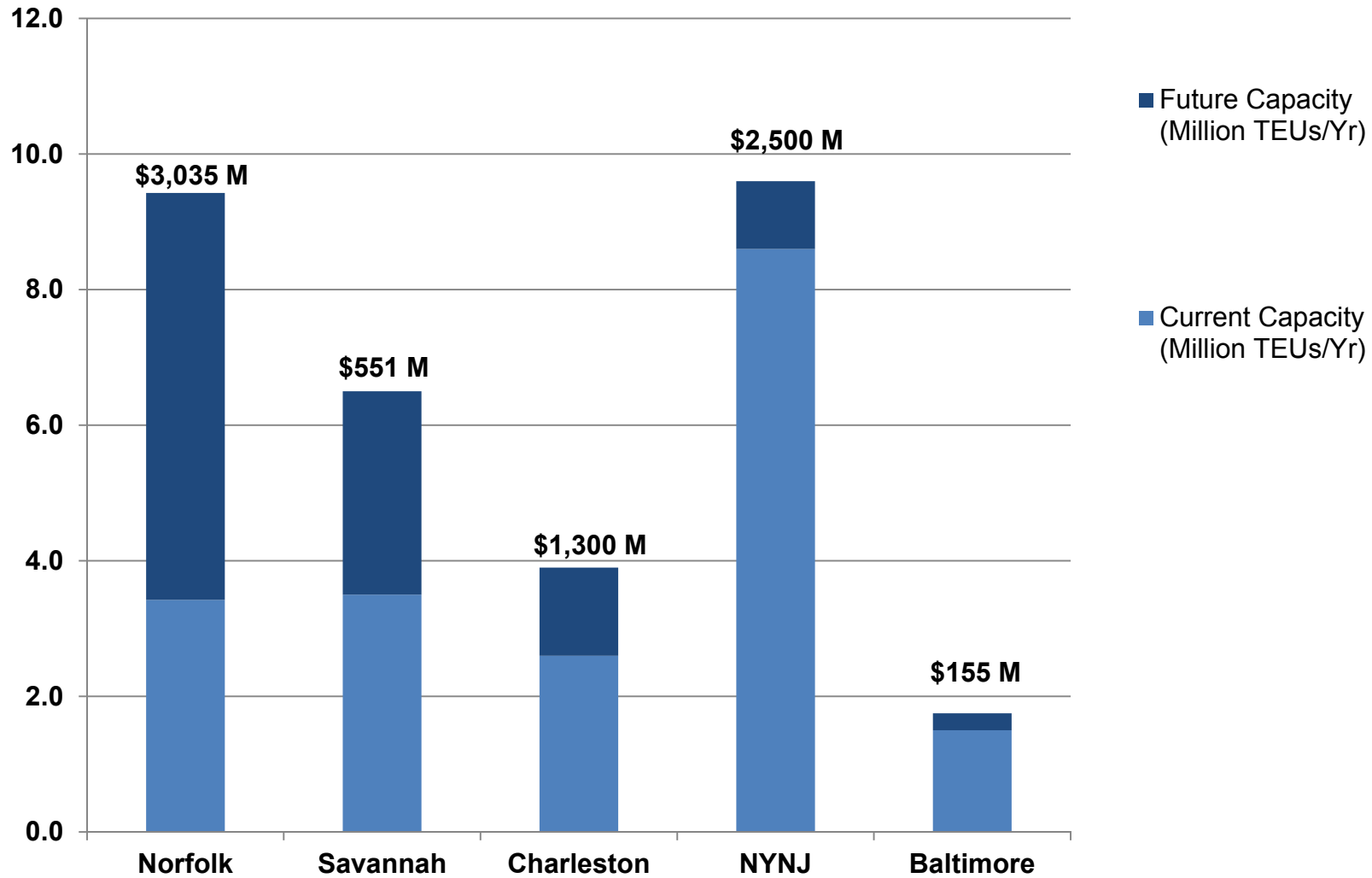
# Preparing for Cargo Growth



- Deep channels
- Intermodal connections to population centers
- Unobstructed water access
- Expansion capability
- Permits



# Port Capacity Expansion Project Investments



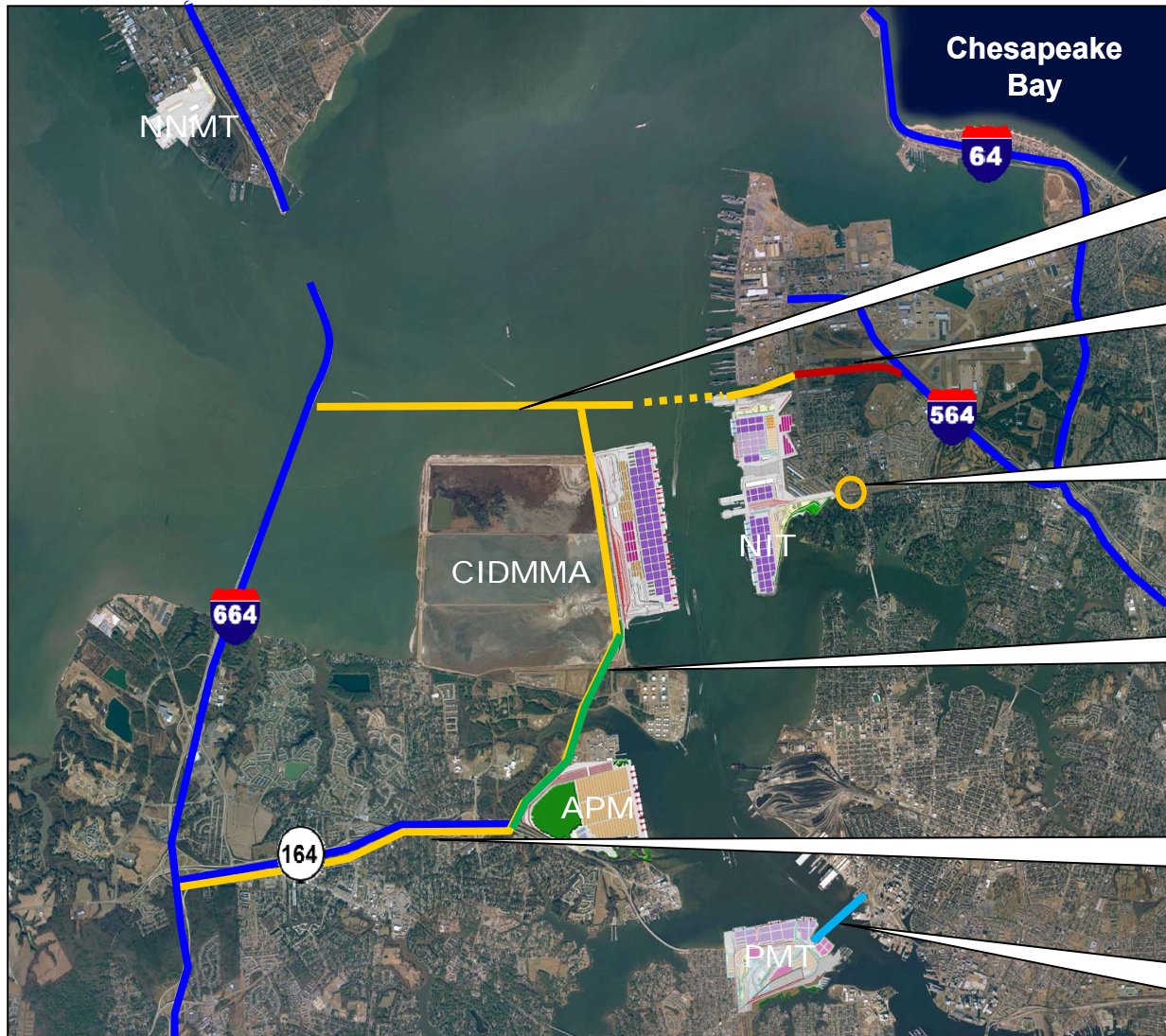
# Planning for Modernized Ports and Infrastructure



# Our Challenge is to Avoid This



# Regional Transportation Projects



*Patriot's Crossing*

*I-564 Intermodal Connector*

*Terminal Blvd Interchange*

*Craney Island  
Road & Rail Connector*

*I-164 Median Rail Line*

*2<sup>nd</sup> Midtown Tunnel*

# National Infrastructure Costs\*

- \$46 billion investment gap by 2040 threatens ports
  - U.S. GDP projected to lose **\$4 trillion** by 2040 for failing to invest in crumbling transportation infrastructure
- Improvements must be made to national intermodal infrastructure to keep pace with global demand
  - Port authorities will spend **\$46 billion** on infrastructure modernization in next 5 years
  - Freight railroads currently spend **\$20 billion** annually on infrastructure and equipment modernization

# APMT Expansion Plans





# Craney Island Eastward Expansion and Marine Terminal





## Questions?

