

# Shipper Perspectives



## **AAPA/NAWE/MARAD Marine Terminal Management Training Program** **Role of Marine Terminal Operations in the Global Supply Chain** **October 25, 2010**

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**Moffatt & Nichol**

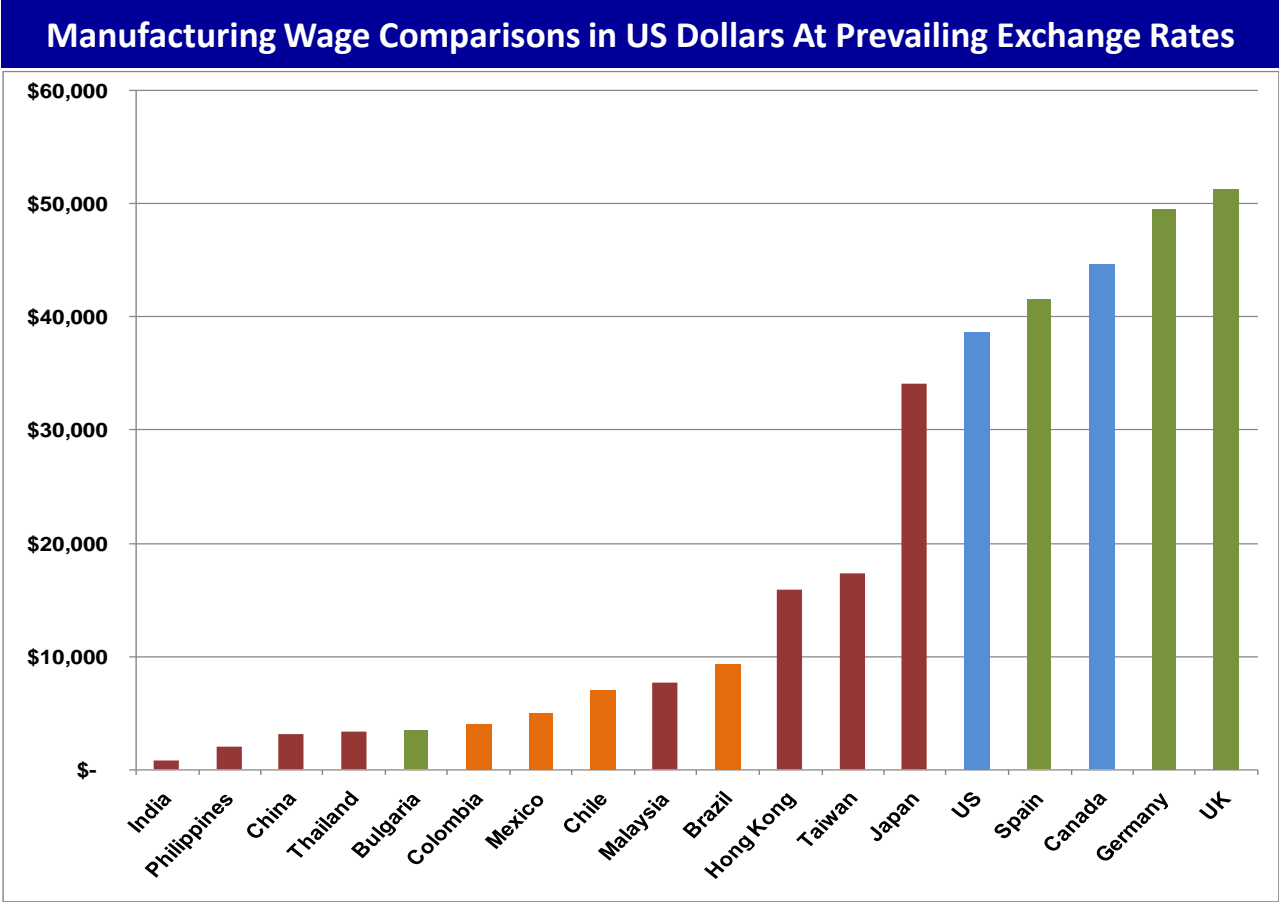
# Key Themes

- **Gateway-centric, not port-centric**
  - Supply chain is only as strong as its weakest link
  - Supply chain partners have alternatives
  
- **Shipping costs limit the size of addressable import and export markets**
  - Productivity – impacts shipping costs
  - Reliability – impacts inventory carrying costs
  - Compatibility – different shippers have different business models and strategies
  
- **Worry about what worries the supply chain partners**
  - Where will their markets be tomorrow?
  - Environmental accountability matters

# Issues For Importers

- **Fallout from ocean carriers' financial troubles**
  - Equipment shortages
  - Some carriers no longer providing chassis
  - Higher rates and fewer slots
  
- **Fallout from higher fuel costs**
  - Fuel surcharges
  - Slow steaming
  - Re-think warehouse/distribution center locations
  
- **Uncertainty about consumer markets**
  - Costs are difficult to pass on to consumers
  - What will happen to those markets?

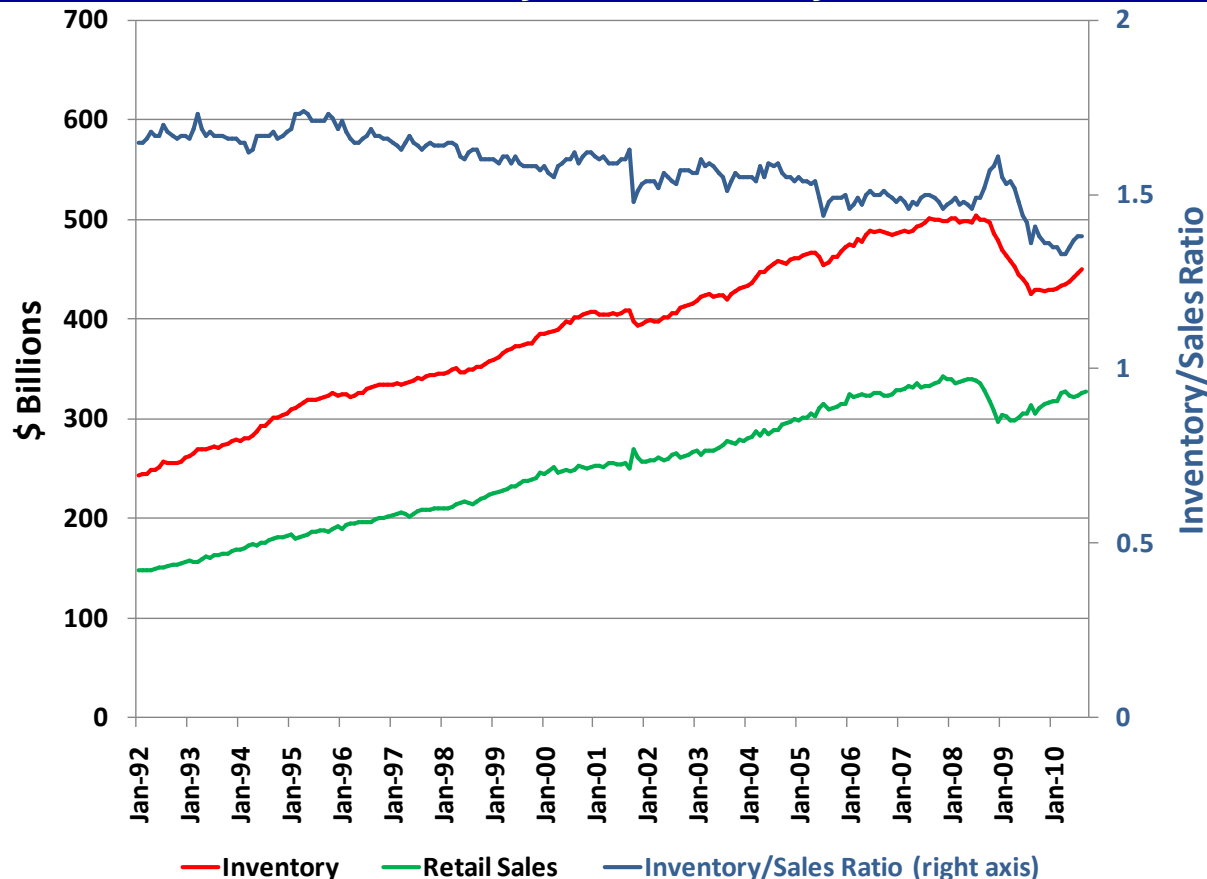
# Manufacturing Industry Wage Comparisons



- **Low wages in emerging markets are partly due to their younger populations**
- **Outsourcing services maturing markets more cheaply and accesses growing markets**
- **Low wages in Latin America indicate they are prime locations for manufacturing “near-sourcing”**

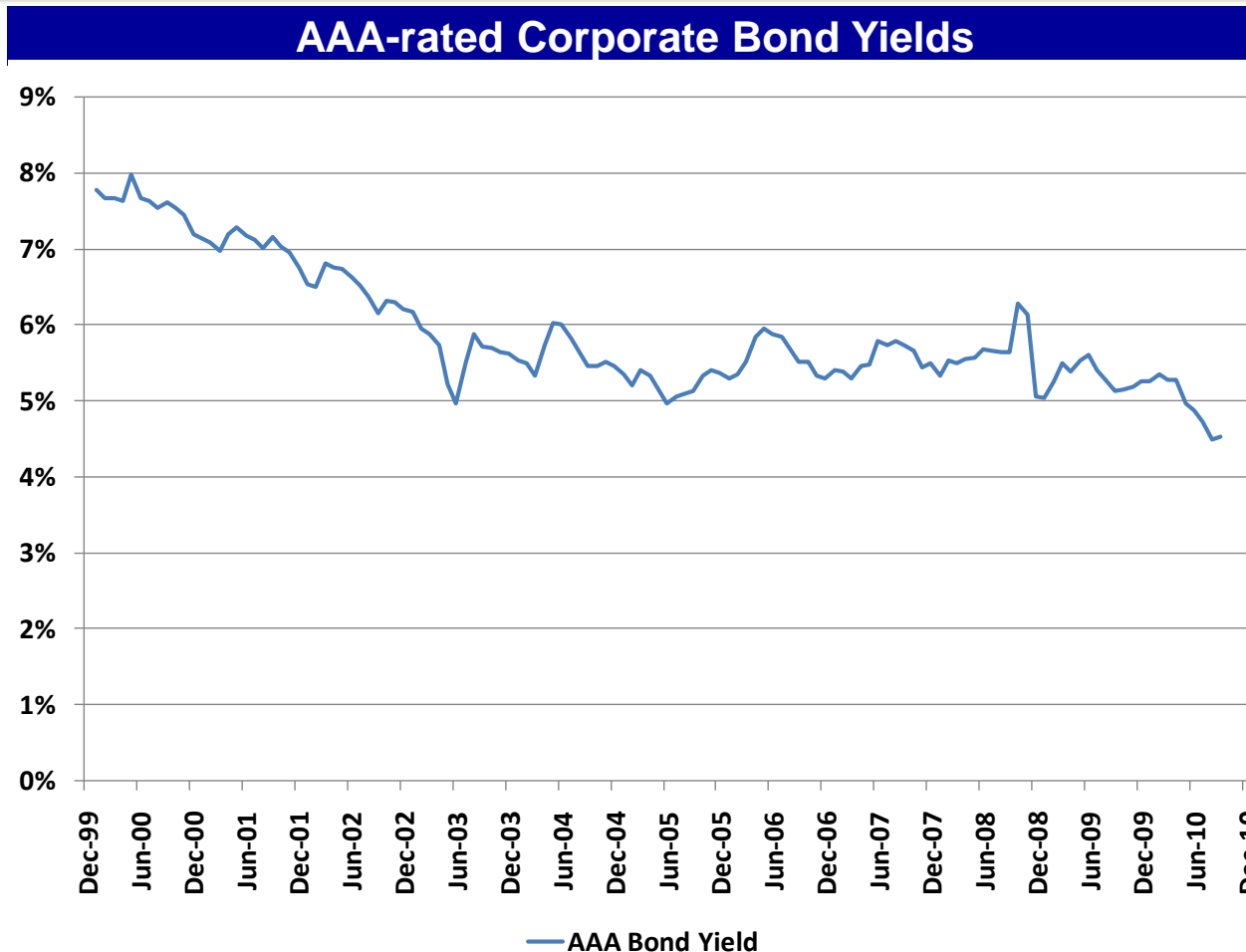
# Declining Inventory/Sales Ratio

**Retail Sales, Inventory and Inventory-to-Sales Ratio**



- Supply chains are longer due to outsourcing but less responsive to changing market conditions
- Less inventory = lower financial cost and less risk of over-stocking
- Higher productivity = higher origin to market speed
- Greater reliability = less safety stock

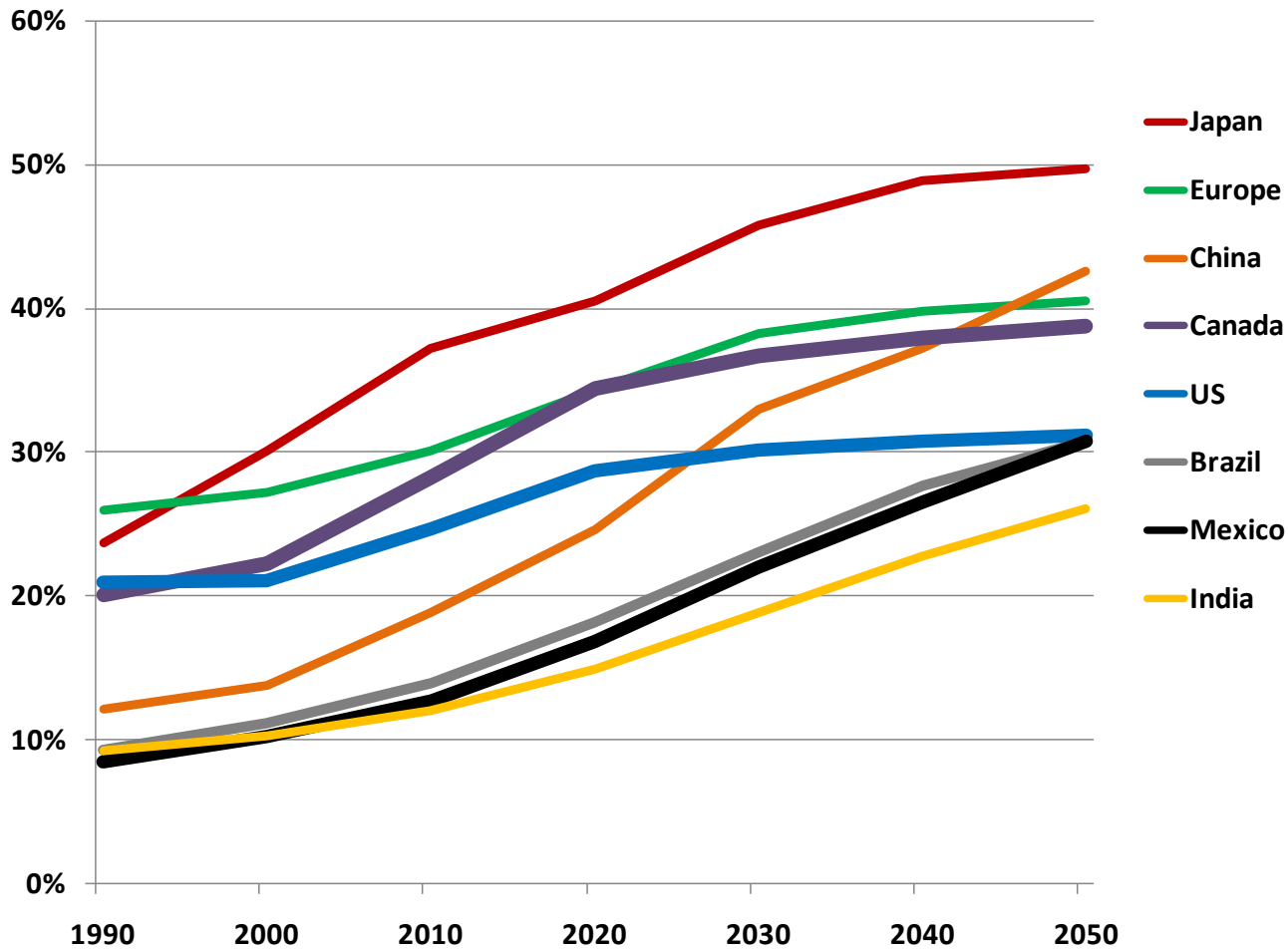
# Inventory Has To Be Financed



- **At 5%, \$450 billion of inventory costs companies \$22.5 billion per year**
- **A 1% reduction in inventory would save companies \$225 million in financing costs**

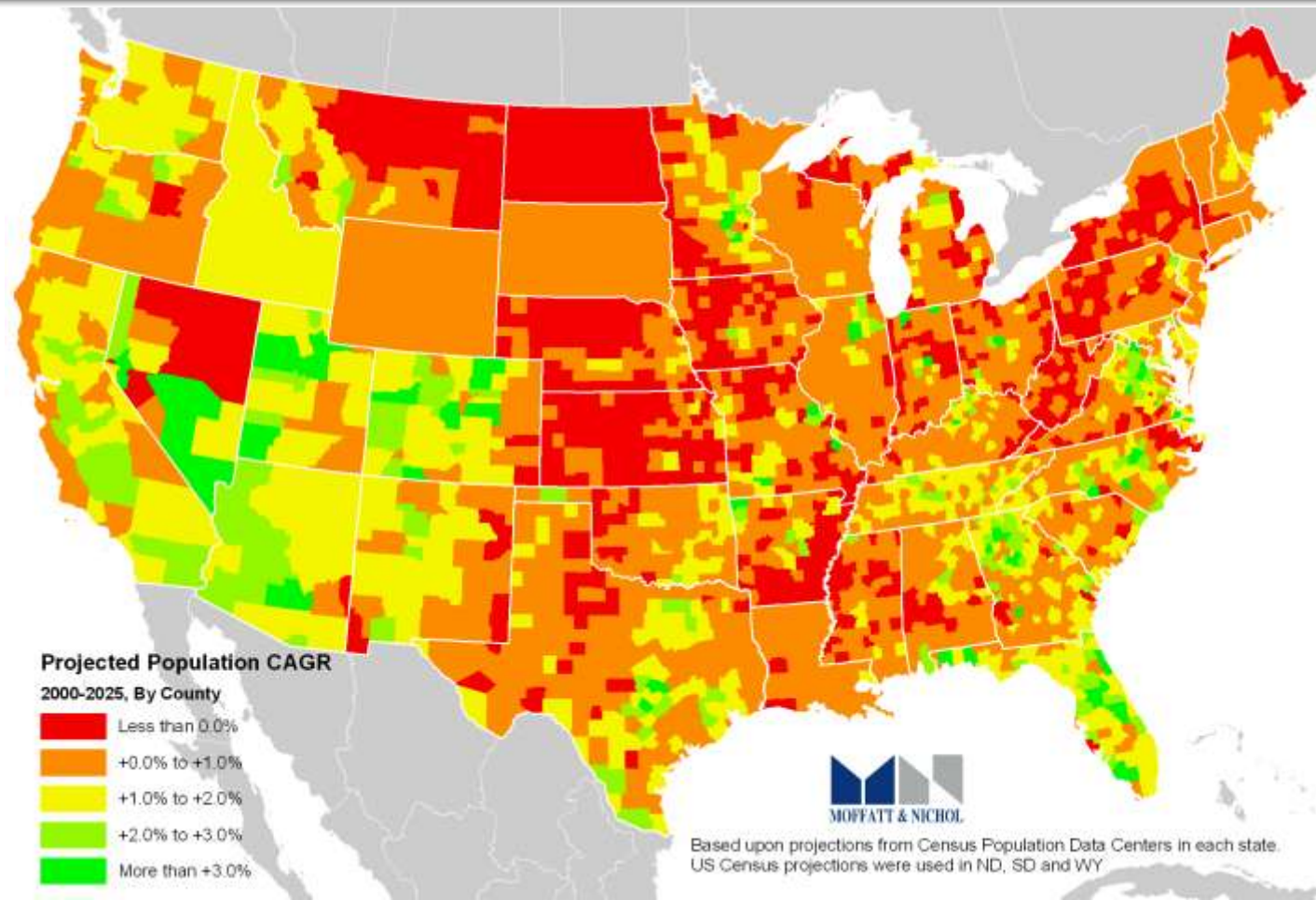
# Major Shippers' Markets Are Changing

## Percentage of Population Over 55 Years of Age



➤ **World consumer markets are changing due to the significant rise in developed economies' elderly populations and rising income in emerging markets**

# Markets Locations Are Changing

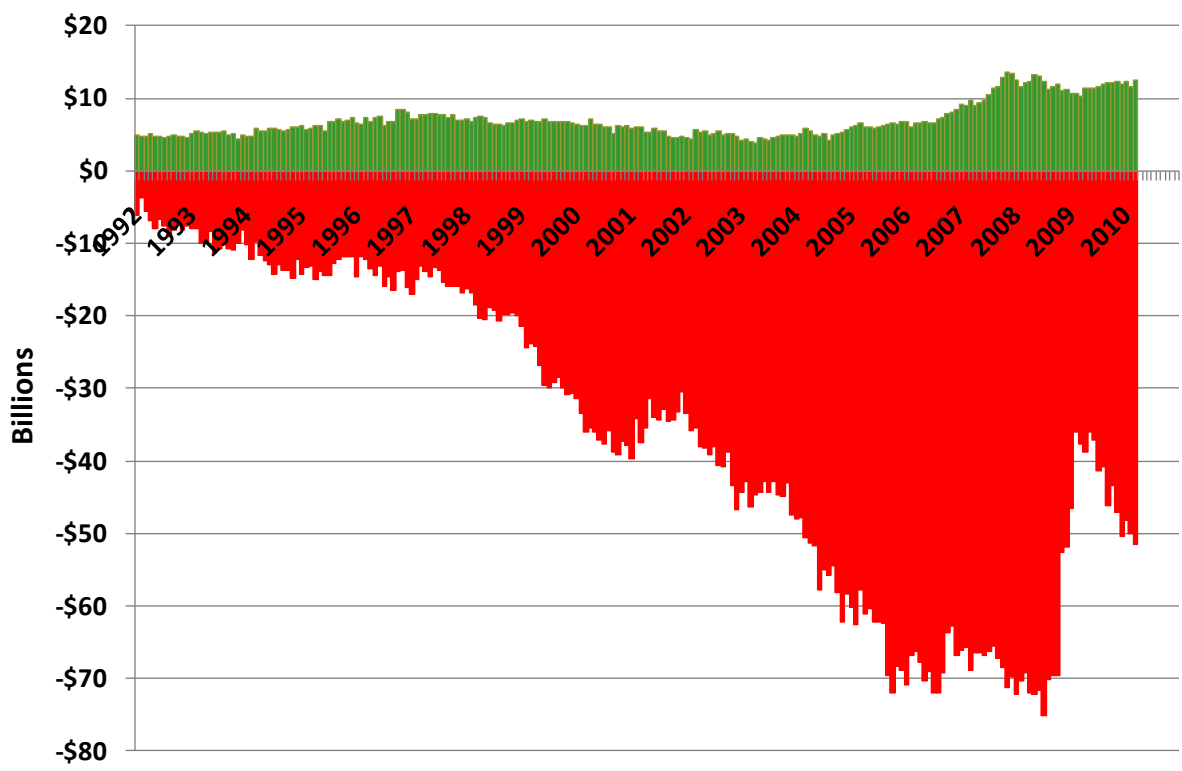


- **US population is moving to urban, coastal and Southern locations**
- **Shippers are constantly re-thinking their logistics and the supply chain is reacting too**
- **Similar trends are evident in other parts of the Americas – e.g., Canada and Brazil**



# Weak Outlook For The US Dollar

**US Goods and Services Trade Balance**



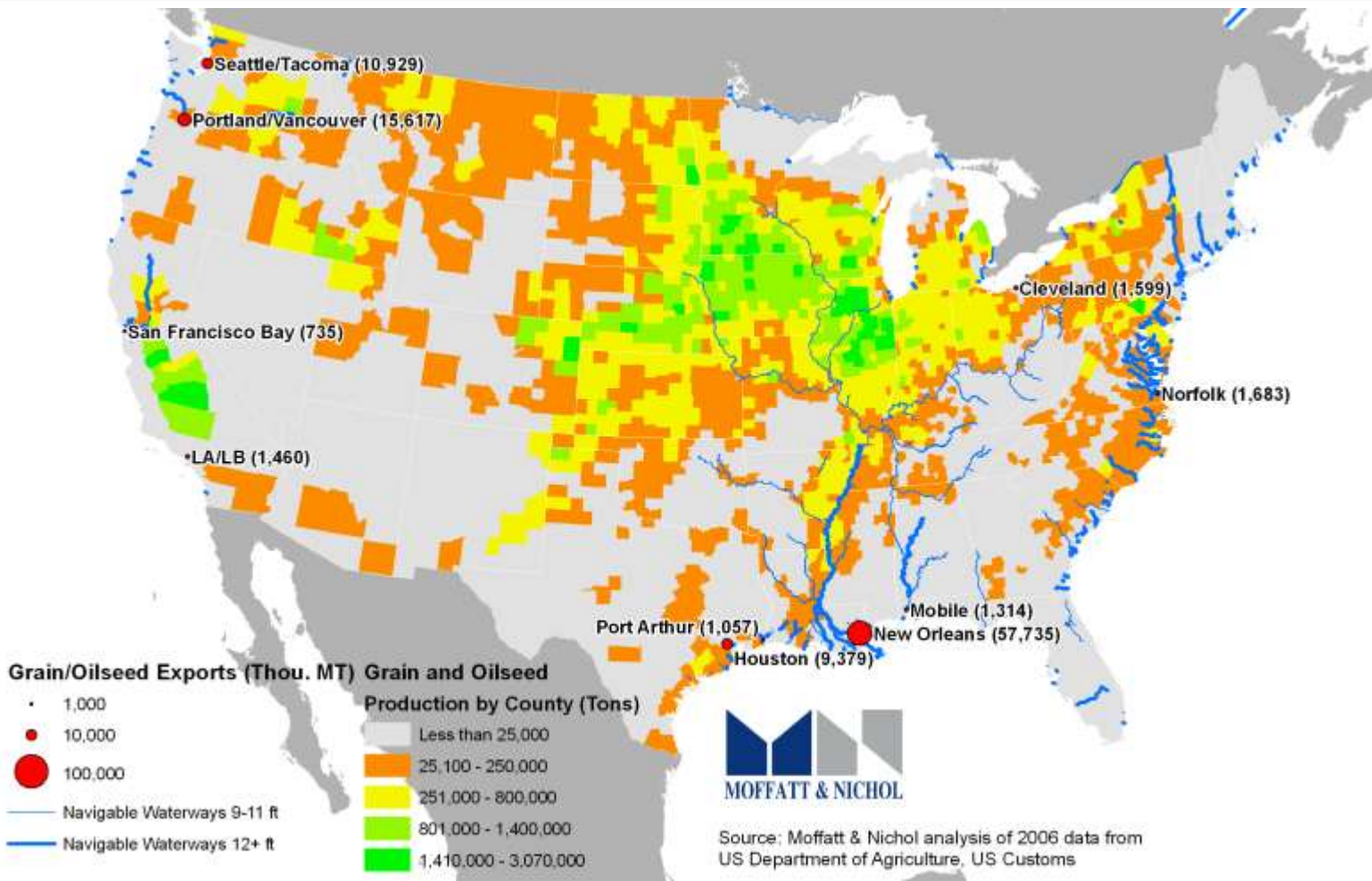
~ 50% of the goods deficit is due to oil imports

- It is unlikely that the US service sector surplus will ever offset the goods trade deficit
- Until the US trade deficit begins to reverse, the dollar will weaken further, which will help exports and eventually hinder imports
- Latin American exporters may be negatively impacted by this

# Competitive US Export Candidates

- ◆ **Relative to faster growing Emerging Markets, the US has**
  - ◆ **Lower cost of capital, higher cost of labor**
  - ◆ **More advanced biotechnology**
  - ◆ **More reliable quality control and surveillance of compliance**
  - ◆ **Relative abundance of scarce resources such as water**
  
- ◆ **A partial list of high potential exports fitting these advantages:**
  - ◆ **Low labor-content capital goods**
  - ◆ **Grain and oilseed**
  - ◆ **Meat**
  - ◆ **Wood pellets**

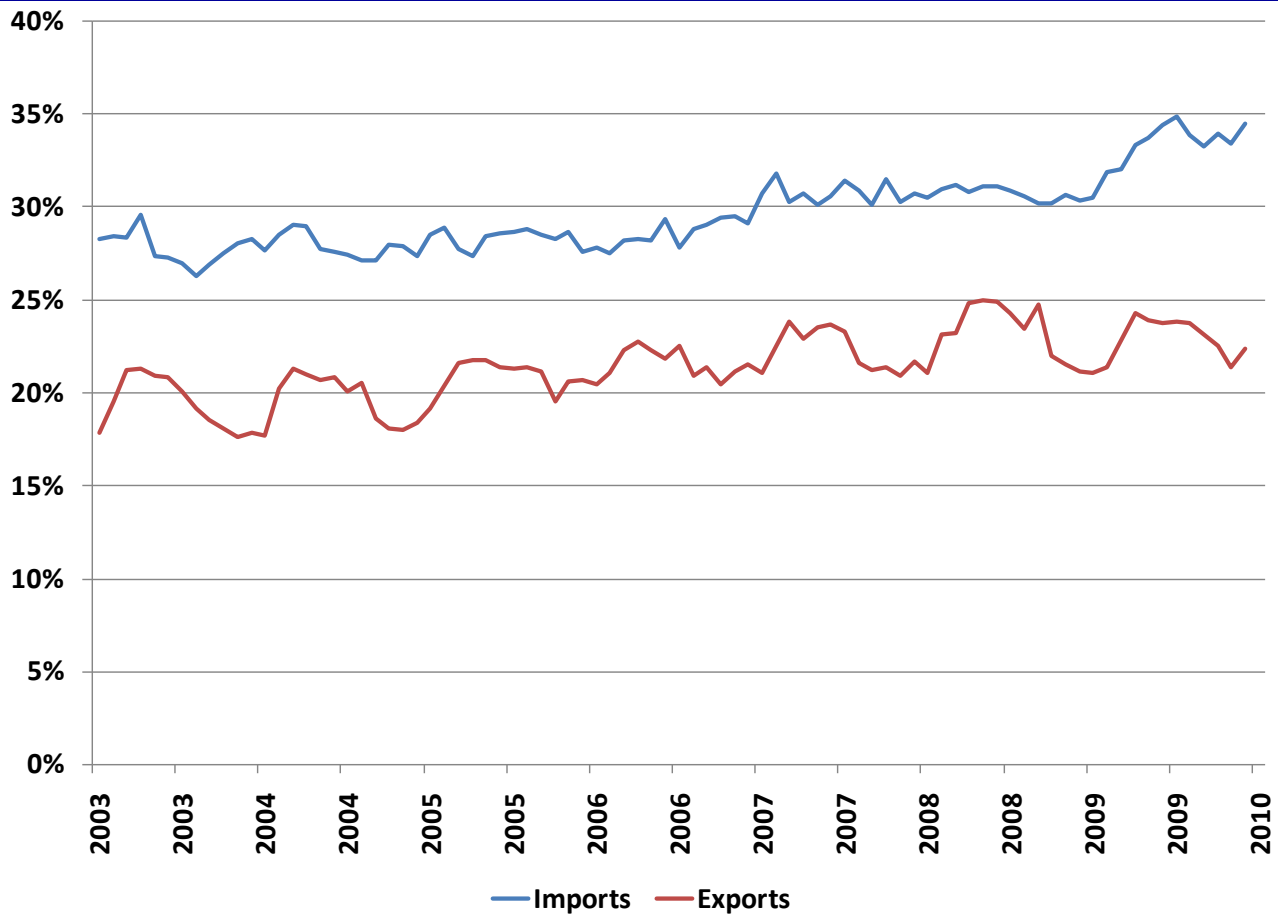
# America Is The World's Bread Basket



- Growing income in emerging markets increases demand for meat and grain feedstock
- Lack of investment in inland waterway infrastructure is a significant bottleneck for US exports

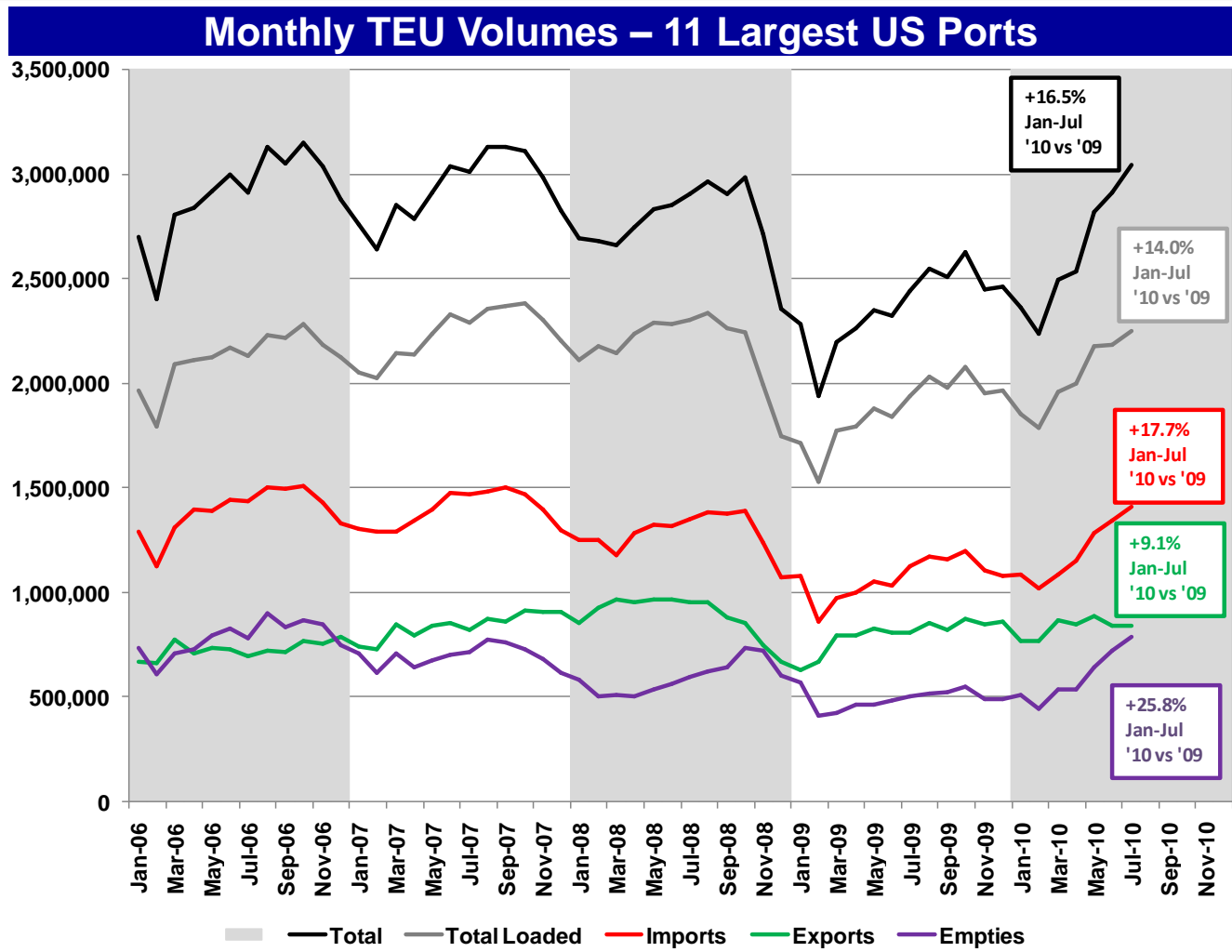
# Containerization Is Still Increasing

**Percentage of US Trade Imported/Exported In Containerized Vessels**



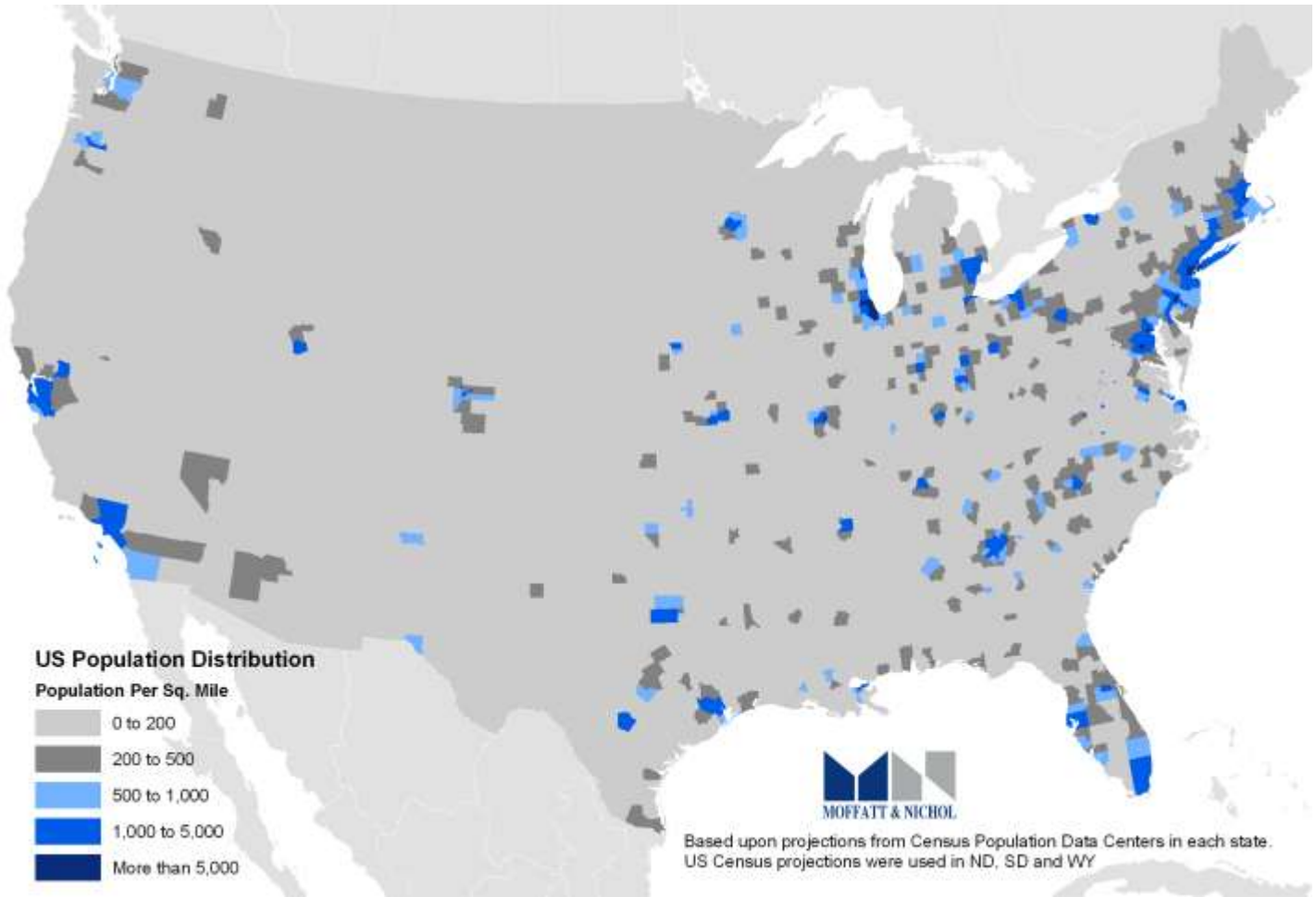
- ◆ **Both imports and exports are increasingly containerized:**
  - ◆ **Partly due to technical requirements for handling genetically modified grain/oilseeds**
  - ◆ **Partly due to shippers' desires to be flexible in order to keep shipping costs down**

# Port Container Volumes Reflect Macro Data



- Imported and empty containers are leading port volume growth
- Exports have been flat since March despite growth of the global economy

# Containers Concentrate In Population Centers



- **These are the locations where the bulk of consumption takes place**
- **Containers are increasingly retained near ports – exporters need transflow facilities at or near ports**

- **Shippers are making great strides to improve truck fleet efficiency**
  - **Nitrogen-filled low rolling resistance tires**
  - **Trailer side-skirts**
  - **Idling time management**
  - **Driver training**
  - **Nitrogen refrigeration**
  
- **Shippers are using trains to reduce emissions**
  
- **Ports are expected to contribute too**
  - **Cold ironing**
  - **Equipment electrification**
  - **Efficient gate management**

- **Shippers need high productivity and reliability**
  - **Larger ships are good for shippers**
  - **Gate management**
  - **Equipment availability**
  
- **Shippers want supply chain partners/stakeholder managers**
  - **Understand their business model**
  
- **Anticipate their future needs**
  - **How will they supply their markets?**
  - **Environmental accountability will become increasingly important**