



Port Selection Criteria



1. Facility Criteria

- Draft
- Size of Terminal
- Type of Facility
- Cranes Available: Adequate Capacity
- Specialty Services: OOG, Reefer, Hazardous
- Expansion Capabilities
- Infrastructure Support: Rail /Truck Access (on dock with storage)
- Chassis: Availability, Storage and Pool Options
- Security/Environmental Policy



2. Operating Criteria (Cost/Productivity)

- Berth Guarantee
- Total Terminal Throughput
- Crane Speed and Capacity
- Productivity Guarantee
- Gate Turn Times and Gate Operations Flexibility
- Hours of Operation (PIERPASS)
- Reduced Equipment Dwell Times
- Demurrage
- State-of-the-art Yard Equipment
- Labor Environment, Work Rules (Flexible Shift Starts)
- U.S. Customs and Agriculture Holds
- EDI/Use of Technology (OCR/RFID/EDI)
- Supply and cost of pilots and tug assistance



3. Access to Regional Metropolitan Markets

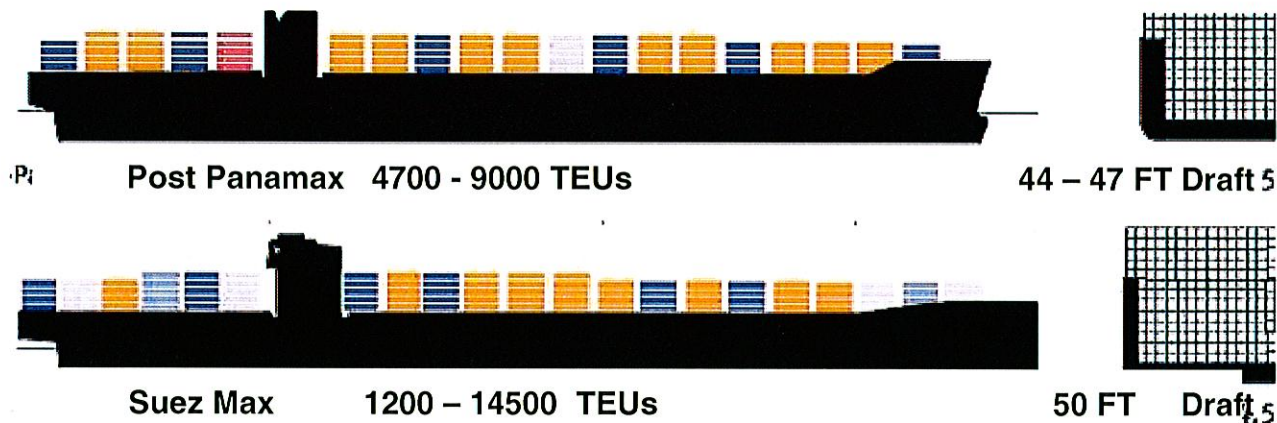
- Population Growth
- Port Capacity
- Infrastructure Capacity
- Seamless Handoffs



- Port Authorities
- Terminals
- Customers

➤ **Need better coordination and communication to form effective partnership**

- Deep Water Draft is necessary to support new all-water services
 - Requires public and private funding
- **Deeper channel is required to accommodate the larger super post-Panamax vessels**



- Negatively impacted during recent growth spurt
 - Problems at the gate
 - Labor Shortage
 - Not enough equipment:
 - gantry cranes,
 - top handles, etc.



- **Is there sufficient investment to support the emerging growth while expansion plans are implemented?**

CMA CGM CONCERNS: Infrastructure Support

- On-Dock Rail Capabilities
 - Ideally need two Class 1 Railroads
- Good Interstate Highway Connection



- **The right infrastructure is the ideal cost and service solution to manage growth and constrained terminal capacity while meeting customer needs.**

CMA CGM CONCERNS: EDI/Use of Technology

- Technology can be applied to increase capacity:
 - In the vessel operation:
 - Crane speed and capacity – dual/tandem hoist
 - In the yard and on-dock rail operations:
 - Rail mounted gantry's (faster, safer, denser, electric, non-polluting)
 - In-motion scales/ portal systems
 - GPS on handling equipment



CMA CGM CONCERNS: EDI/Use of Technology

- In the Gate process:
 - Implement OCR and RFID
 - Appointment systems (integrated with yard planning)
 - PIERPASS Creativity
- By the fast and accurate exchange of data between all key stakeholders:
 - Ports, Carriers, Rail, Truck, US Customs, FDA, and Customers
- **Technology is an essential solution to effectively and efficiently manage growth and infrastructure constraints.**



- Establish response and recovery plans
- Mandate and conduct annual exercises that test the quality of each port's response and recovery plans.
- Adopt federal legislation requiring Coast Guard Captain of the Port to implement a comprehensive risk-management plan
- Legislate for presidential appointment: National Port & Cargo Security Director
- Push for improved technology on cargo screening

- Establish an environmental management system
- Conserve energy
- Recycle office and other wastes
- Participate in a ballast water initiative
- Form a voluntary green practices task force
- Conduct environmental training for on-port businesses
- Utilize alternatively-fueled vehicles for cleaner air



➤ Ports must be proactive in protecting water, land, air, and natural resources for generations to enjoy and utilize.



Challenges



CMA CGM
ADVANCED SHIPPING

- World's trade with North America continues to grow.
 - Ports have limited physical capacity to expand.
 - Vessel size continues to increase. Must manage the growth of increased all-water service to East Coast
 - Rail and road infrastructures reaching limits.
 - Local communities concern over environmental issues.
 - 2010: Existing capacity could be exceeded
Projected capacity shortfall of 4.1 M TEU
- Equals **1,000 additional acres** of required new container terminals at today's average productivity levels

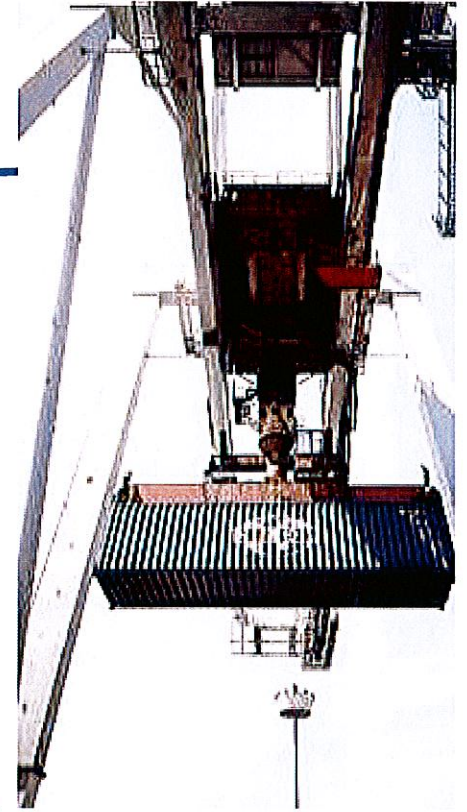


Solutions



- Build more terminals
- Increase throughput through existing terminals:
 - Introduce new technology in vessel / yards / gate operations.
 - Reduce equipment dwell times.
 - Store / dispatch empties off-dock.
 - Rail “shuttles” to inland CY yards.
 - Move chassis out of terminals (global model).
 - Increase storage density.
 - Expand gate operations (PierPass model).
 - Reduce environmental impacts – electrify.

➤ **Communicate with all key stakeholders to apply creative solutions, reduce costs, and deliver customer satisfaction.**





Thank you





MEETING FUTURE
INFRASTRUCTURE NEEDS

WATERSIDE AND TERMINAL

IAN CAIRNS