



Port Development and the Environment





The Port of Belfast

- Dates back to 1613
- Trust Port - Constituted by the Belfast Harbour Act 1847 and subsequent various Harbour Acts and Orders 1847-2002
- Purpose to operate, maintain and improve the Port of Belfast on behalf of its stakeholders



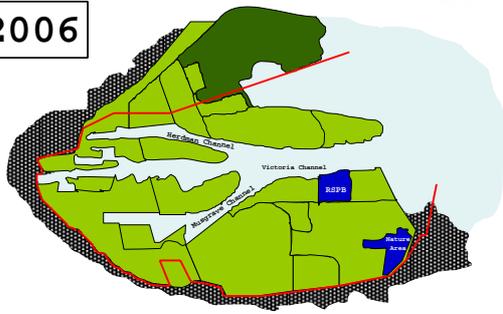
Physical Parameters

Total Land area	1950 acres
Port	980 acres
Estate	795 acres
Conservation	195 acres
Total "Harbour" area	1000 acres
Victoria Channel	6.2nm @ 9.1m
Quays	6.5 km
Berths	Max 10.2m Avg 8.5m



Creation of the Port

2006




Physical Parameters (Cont'd)

Vessel Movements	12,200
Pilotage Acts	4,400
Roads	30 km
Covered storage	1.2m ft ²



Safety and Environmental Management

- Achieved certification to OHSAS 18001: **2007**
- CarbonNeutral® certified: **1 January 2008**
- Targeting ISO 14001 (Environmental Management System) accreditation: **2008**



Unit Load

LoLo

- Largest Container Port in Northern Ireland.
- 161K units – 86% of NI market share.

RoRo

- Second largest Ro-Ro Port in Northern Ireland
- 339Kt Freight Vehicles – 40% of NI market share.
- Largest Passenger Port in Northern Ireland. 1.27m passengers – Stena Line / Norfolkline / Isle of Man.



Financial Review (2006)

- TURNOVER: £28.9m
- PRE TAX PROFIT: £18.7m
- TANGIBLE NET WORTH: £213.0m
- CAPITAL EXPENDITURE 2006: £13.6m
- CAPITAL EXPENDITURE 1995-2005: £109.2m
- CAPITAL EXPENDITURE 2008-2012: £160.0m



Economic Contribution

Port of Belfast supports:

- 187,000 jobs – 26.8% of NI workforce
- 30.7% of the region's total economic value (£7.4bn)
- 17,000 jobs, 2.4% of NI total, located within the Harbour Estate
- £11.2m or 8.1% of total Belfast City Council's rates revenue

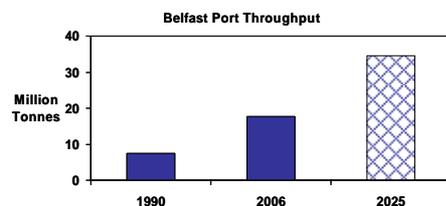


Market Share

- Port handled 17m tonnes of cargo in 2007
- 60% of Northern Ireland's Seaborne trade and 20% of the entire island's.
- Total value of traffic passing through the Port of Belfast in 2007 = £20bn.



Projected Growth



- Assumption: NI economy catches up on UK economy by 2025
- Economists project 109% increase in Port tonnage



Port Development

- Economists project a doubling of Belfast Port throughput by 2025
- Technology is driving towards bigger ships requiring new quays with deep water
- 120 acres of additional port land required

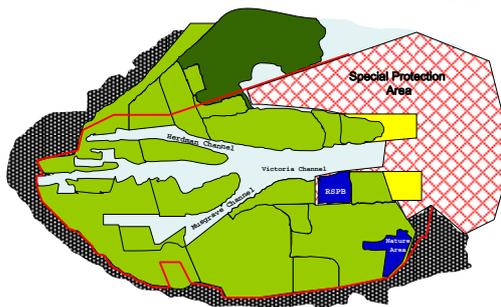


The Port and the Environment

- Ongoing compliance with current and future environmental requirements
- More Recently:
 - Biodiversity targets
 - Carbon Footprint
 - Climate Change Action Plan
- Sustainable Port Development
- Partnership approach



Port Development



Challenges

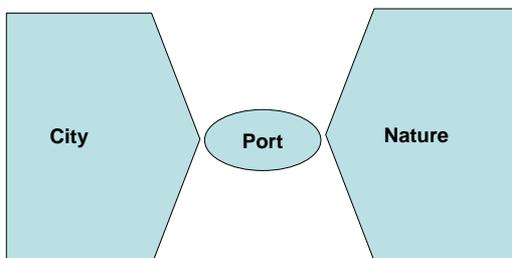
Delivering the necessary additional Port capacity while meeting Environmental needs:

- Reducing carbon emissions
- Adapting to climate change
- Birds & habitats
- Inter-tidal zone
- Biodiversity
- Water, air & ground quality

and simultaneously satisfying commercial requirements



The Squeeze!



Sustainable Development Approaches

- Optimise utilization of existing facilities
- Innovative design of new facilities to best meet environmental needs
- Carbon budgeting
- Replacement of habitats
- Other approaches as applicable



Top 10 Environmental Issues

- Climate Change
- Dredging & dredging disposal
- Port development
- Oil spill prevention & response
- Hazardous Cargoes
- Air Quality
- Waste reception & recycling
- Noise & nuisance
- Biodiversity & habitat management
- Contaminated land



Tools – Environmental Management System (EMS)

- Drives compliance by integrating environmental management into the overall business model
- Adopts ecosystem approach
- Proactive versus reactive on environmental issues



Pro-active environmental strategy

- Comply with regulations
- Incorporate sustainable design into development
- Achieve & exceed all mitigation requirements associated with development
- Undertake voluntary "green" initiatives to address environmental impacts of port operations
- Environmental aspect to everything we do
- Environmental & business goals are not mutually exclusive



Process

- ✓ Identify port environmental priorities & risks
- ✓ Develop & implement solutions
- ✓ Monitor improvements
- ✓ Demonstrate environmental competence
- ✓ Achieve continuous improvement
- Environmental "self diagnosis"
- Research, benchmarking & co-operation
- Environmental performance indicators
- Certification
- Move beyond compliance

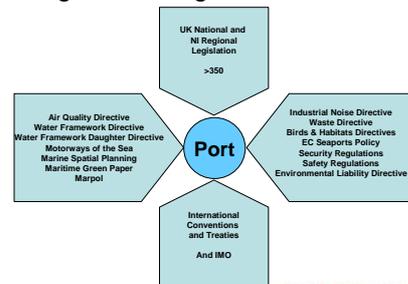


Tools – Environmental Management System (EMS)

- Systematic process to align organizational & environmental objectives – based on ISO14001 Standard
- Structured approach for managing environmental responsibilities
- Consistent measure of environmental performance
 - Identify & resolve root causes of problems
 - Prevent pollution, conserve energy & natural resources



The Legal Challenge



Many rules – Many side effects

- Different rules for same environmental issues
- Different definitions for same issues
- Vague rules = different interpretations



The sustainability challenge for ports

- To balance the basic needs of society, the economy and our environment – without our ports we have no future!
- To ensure that a strategic view of our coastal resources and requirements is taken
- To protect and develop port infrastructure and capacity
- To develop the maritime economy
- Information and data is not consistent or readily accessible for planning purposes
- Guidance can be confusing and late



Towards a solution

- Anticipate, influence & prepare for new legislation
- Develop self regulation based on best practice
- Better understand our own environmental performance
- Exploit best opportunities for minimising the impact of port development on the environment during the planning & design phases
- Management of climate change is critical



Ports need...

- Clear marine and coastal zone planning guidance
- Consistent standards to be applied
- Decision making to be speeded up whilst ensuring adequate consultation
- Simplified processes for planning and consents
- Improved transparency, integration and accountability for delivery
- A strategic view based on clear Government leadership



Towards a solution

- Need for co-operation
 - Shared understanding
 - Informed decision making
 - Mutual respect
 - Sustainable solutions for society & the environment



A "Marine Bill"?

- The draft "Marine Bill" is expected to deliver a constitutional framework, but...
- How do we ensure the delivery of local mechanisms to achieve sustainable development and management of our coastal and marine resources?



Thank you!

