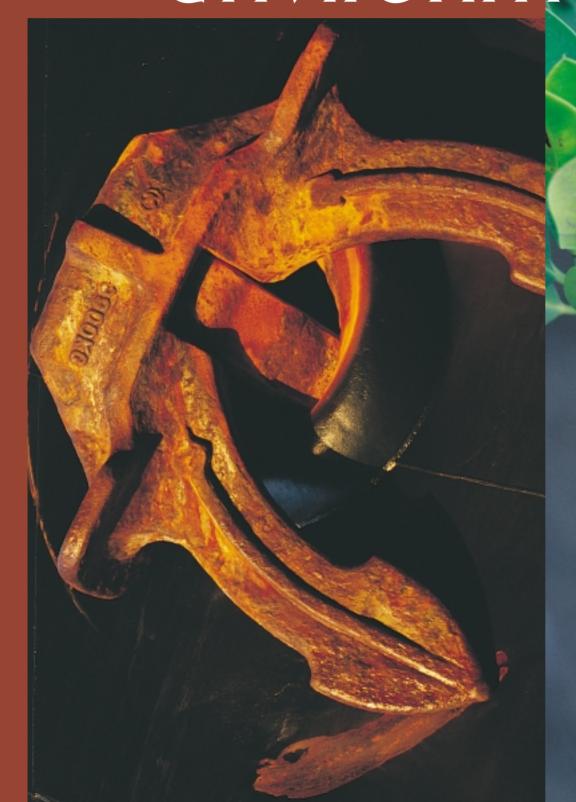


environment



The Port of Townsville is unique in comparison to many of the World's ports in that it is located within the Great Barrier Reef World Heritage Area, adjacent to the Great Barrier Reef Marine Park. Situated in the heart of a growing city, a range of social factors are apparent, from residential encroachment to a range of sensitive natural habitats including:

- Dugong protected area
- Seagrass beds
- Fringing coral reefs
- Mangrove forests

By setting high standards for port operations and environmental performance, Townsville Port **Authority** demonstrates our commitment to the management and protection of our marine environment. To achieve these high standards and results, environmental management is incorporated into the overall management of port operations.

ENVIRONMENTAL MANAGEMENT STRUCTURE AT THE PORT OF TOWNSVILLE

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ENVIRONMENTAL MONITORING PROGRAMS

The management structure for environmental issues at the Port of Townsville has been established such that port customers and the Authority maintain individual responsibility for the activities they undertake. Overlying this responsibility, the Authority must also maintain a degree of responsibility for activities carried out on port lands over which we maintain some degree of control. Through a firm scientific framework we are working towards a port-wide integration of environmental management initiatives.

The benefits of this method of environmental management are:

- Maintenance of the port environment;
- No hidden costs to environmental protection for new developments;
- The port community has ownership over the environmental management

Improved relations between ourselves and port customers.

Our Environmental Management Strategy (EMS) is now in its' second year of operation and the effectiveness of the system is continuously being assessed against key performance criteria. This Strategy was developed and endorsed by the wider port community and identifies key objectives to be achieved with regard to environmental performance throughout the port. In addition, Townsville Port Authority has implemented a comprehensive Environmental Management System for all port operations. The Environmental Management System ensures the incorporation of environmental management initiatives throughout all facets of the Authority's activities.



being implemented;

- Assistance is available to the wider port community to achieve their environmental management objectives;
- All environmental management initiatives are practical and cost efficient because they are developed in cooperation with the port community;
- Demonstration of due diligence; and,

We must be extremely sensitive to the vulnerability of the receiving environment, ensuring that the port continues to develop in an environmentally sustainable manner. Additionally, we need to remain aware of the plethora of regulatory provisions relating to the management and operation of a commercial port facility within an area of World Heritage status.

monitoring 9

Environmental management at the Port of Townsville is the culmination of planning, operations and monitoring activities for the long-term sustainable development of the port. Scientifically rigorous monitoring programs ensuring minimal detrimental impact on the local and regional environments for the benefit of present and future generations support these management initiatives.

Townsville Port Authority and port customers undertake a wide range of environmental monitoring programs throughout the Port of Townsville. These programs include:

- Dust monitoring to assess the level of fugitive dust emissions associated with port operations.
- Sediment Quality Monitoring to ensure dredged material disposal methodologies are determined within a firm scientific framework whilst also allowing a polluter pays principle of dredge material disposal.
- Water Quality Monitoring to monitor the effect of port activities on receiving water quality.
- Noise Monitoring to establish baseline data against which to assess noise related complaints and to develop noise contours around the port to assist in planning and development which is sensitive to adjacent land uses.
- Biological Monitoring such as invertebrate surveys of port breakwaters, investigations into fouling organisms and introduced marine pests, and research on benthic fauna communities at the dredge material disposal site.
- Stormwater Quality Monitoring allows us to monitor discharges to the port environment and also allows us to assess the effectiveness of improvements in environmental management at individual sites.

Annual environmental reports are produced for each of the environmental monitoring programs undertaken at the port. These reports are used to assess the environmental performance of overall port operations and subsequent management requirements.

Taspoeses procedures

As the lead response agency for marine pollution within port limits we are committed to emergency response within the port. A comprehensive review has recently been undertaken of the Port of Townsville Oil Spill Contingency Plan. This

Plan outlines the response measures to be adopted in the event of an oil spill or other marine pollution incidents within the port. In addition, as part of our Environmental Management System, a comprehensive incident database has been established.

This database allows us to assess the effectiveness of environmental awareness programs whilst also allowing future management initiatives to be focused on areas requiring attention.

achieving

Through the development and implementation of a wide range of environmental management initiatives we have been able to improve the total environmental performance of the port.

- Measured reduction in dust emissions.
- Reduction in the recorded number of environmental incidents.
- Improvements in product handling techniques and the development of innovative product handling initiatives.
- Improvements in the overall

- environmental awareness of the wider port community.
- Distribution of a community awareness newsletter highlighting the environmental programs of the port and our customers.

port and the community

The wider port community consists of port customers and neighbouring local residents who take an active interest in the development of the port and the impacts on the surrounding environment. Through extensive consultation with the wider port community an integrated environmental management program has been established.

environmental working group (EWG)

The EWG is made up of voluntary participation from our commercial clients. The Port of Townsville EWG continues to develop and implement a wide range of environmental management proposals including raising the profile of environmental issues and management at the port. This has been achieved through the production and distribution of the port's first community awareness newsletter, "Ship to Shore".

programs

We are currently working with relevant government agencies and the wider port community to establish a continuous vegetated buffer zone from Ross River to Ross Creek. This will not only provide benefits to the port community through minimising restrictions to port operations and developments resulting from the close proximity of residential communities, but it will also provide a valuable recreational resource to the local community.

We are keen to promote an understanding of the environmental issues associated with the management and development of a commercial port. As such, the Authority regularly participates in a wide range of community programs including:

- Sponsorship of local postgraduate research;
- Provision of vacation placement work for local undergraduate students;
- Participation in community research and monitoring programs;
- Technical and financial contributions to the Strand Redevelopment;
- Participation in both State and National ballast water management and research initiatives; and,
- Participation in local natural resource and community advisory groups.



TOWNSVILLE PORT AUTHORITY