SeaRead

Marine Park news from catchment to coral



Australian Government

Great Barrier Reef Marine Park Authority



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Councils sign up to protect the Reef



Councils have pledged their support to protecting our Great Barrier Reef

Councils along the Queensland coast have signed up for an innovative environmental programme that will help protect the Great Barrier Reef.

The Reef Guardian Council initiative was officially announced by the Minister for the Environment and Water Resources Hon Malcolm Turnbull in Cairns recently.

Great Barrier Reef Marine Park Authority (GBRMPA) Water Quality and Coastal Development Director Hugh Yorkston said the programme was a fantastic opportunity for councils to get involved in Reef protection.

"The Reef Guardian Council initiative recognises and promotes the important role of local government in protecting the Reef," he said.

"The programme is about recognising existing and proposed council activities that can improve the quality of water entering the Reef from the surrounding lands.

"By implementing practices such as protecting wetlands and improving urban stormwater quality, councils will be helping to reverse the decline in the quality of water entering the Reef."

The first councils to make the commitment to become Reef Guardians were Townsville City Council, Burdekin Shire Council, Hinchinbrook Shire Council and the Livingstone Shire Council.

"We are pleased to be working with these councils to help ensure the Reef is protected for the future," Hugh said.

"It is fantastic to showcase the good environmental work councils are already doing and work with them to expand their environmental projects.

"Highlighting this positive behaviour is part of our commitment to educating people about water quality and promoting activities that contribute to a healthy Reef."

The first Reef Guardian Councils have completed comprehensive action plans, outlining the

Message Chairman



The Great Barrier Reef Marine Park Authority (GBRMPA) recently played host to the Minister for the Environment and Water Resources Malcolm Turnbull.

The Minister was in north Queensland to launch a range of Marine Park initiatives, including the new Reef Guardian Councils programme.

The programme is a fantastic partnership between the GBRMPA and local government, building on the highly successful Reef Guardian Schools concept.

It has been developed with councils for councils and aims to recognise and foster an environmental stewardship for the Great Barrier Reef among local councils.

It is also a great way to raise awareness of and encourage best environmental practices, with flow-on effects for the community and environment.

Many councils are already doing great environmental work and this is a good opportunity to showcase that work and inspire others to follow their lead.

Most people lucky enough to live or work near the Great Barrier Reef have an affinity with this great Australian icon and a genuine interest in helping look after it.

We welcome the first four councils recognised as Reef Guardians -

Townsville City Council, Burdekin Shire Council, Hinchinbrook Shire Council and the Livingstone Shire Council.

We look forward to working with these councils to ensure the Great Barrier Reef is protected for the future.

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Andrew Skeat Acting Chairman Great Barrier Reef Marine Park Authority

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projects and on-ground actions they will undertake to address water quality in their region.

Reef Guardian Councils centres on addressing the declining quality of water flowing from creeks and rivers that link land-based activities to the ocean.

The decline in river water quality is largely attributed to urban development, agricultural production, tourism developments and mining within the catchment.

Maintaining good water quality in the Marine Park is essential to ensuring it remains one of the most beautiful, diverse and complex ecosystems in the world.

Reef Guardian Councils follows the highly successful action-based school participation programme Reef Guardian Schools.

Now in its fifth year, Reef Guardian Schools involves more than 100 schools and 52 000 students working towards protecting the Reef.

For more information on Reef Guardian Councils visit www.gbrmpa.gov.au.

Legislative changes now in place

Some of the recommendations made as part of the review of the Great Barrier Reef Marine Park Act 1975 are in effect as of 1 July 2007.

The review considered the functions of the Great Barrier Reef Marine Park Authority, the role of its office holders, accountability frameworks and consultation mechanisms. The initial changes to the legislation include:

- Transition from the Commonwealth Authorities and Companies Act 1997 to the Financial Management and Accountability Act 1997 as a 'prescribed agency.'
- The Great Barrier Reef
 Consultative Committee has now
 been reconstituted as an Advisory
 Board to the Minister for the
 Environment and Water
 Resources. The Advisory Board
 will be non-statutory with terms
 of reference issued by the
 Minister.
- The Authority Board will now consist of a full-time Chairman and a minimum of two and maximum of four other part-time members. Although a dedicated Indigenous representative no longer exists on the Authority Board this does not prevent an Indigenous person with the appropriate expertise from being

- on either the Authority Board or the Advisory Board.
- One of the key recommendations of the Review was the preparation of 'regular and reliable means of assessing performance in the long-term protection of the Marine Park in an accountable and transparent manner,' to be known as the Great Barrier Reef Outlook Report
- No alterations are to be made to the current Zoning Plan for the Great Barrier Reef Marine Park for a minimum of seven years.

A second round of Act amendments considering the interaction between the *Great Barrier Reef Marine Act 1975* and the *Environment Protection and Biodiversity Conservation Act 1999* is currently being developed.

For a copy of the review report see www.environment.gov.au.

New boat named in honour of Steve Irwin

A new fast response enforcement vessel for patrols in the Great Barrier Reef Marine Park was officially named in honour of the late environmentalist Steve Irwin.

Minister for the Environment and Water Resources Hon Malcolm Turnbull unveiled the new nine-metre \$359 000 rigid inflatable vessel *Crikey!* in Townsville.

"Steve Irwin was one of Australia's top environmental ambassadors who inspired everyone to take care of our environment so it is fitting to name the new vessel in his honour," he said.

"The new vessel is part of the Australian Government's commitment to ensuring the World-Heritage listed Great Barrier Reef is protected for future generations.

"Crikey! will play a key role in monitoring and intercepting illegal foreign fishing vessels in the unsurveyed waters of the northern Great Barrier Reef. "The new vessel follows \$388.9 million allocated by the Australian Government over four years for the enhancement of Australia's maritime security."

The *Crikey!* will patrol the waters between Cairns and Thursday Island.

It is part of regular and coordinated patrols by a range of Australian marine management agencies to monitor the Marine Park.

These patrols go a long way to ensuring foreign fishing vessels do not harm Australia's precious marine environment.

Powered by twin 250 horsepower inboard diesel motors, the vessel has a cruising speed of 20-26 knots and a pursuit speed of 40 knots.

Its 500 nautical mile range, high response speed and shallow draught makes it ideally suited for work in the north of the Marine Park.



The Minister for the Environment and Water Resources launched the new boat in Townsville

Additional funding to combat a marine menace

Key tourism sites on the Great Barrier Reef will be better protected thanks to \$300 000 funding from the Australian Government to combat crown-of-thorns starfish.

Minister for the Environment and Water Resources Malcolm Turnbull said the funding would allow the Association of Marine Park Tourism Operators to continue running the crown-of-thorns starfish control programme.

"Our Great Barrier Reef is a great Australian icon and this funding helps ensure key tourism sites receive ongoing protection from the potentially devastating crown-of-thorns starfish," he said.

"The programme's targeted approach assists Marine Park tourism operators to focus on specific areas, as required, to ensure high quality presentation of the Great Barrier Reef."

Tourism based around the Great Barrier Reef generates 54 000 fulltime jobs and contributes \$5.1 billion to the Australian economy each year.

The programme is managed through the Great Barrier Reef Marine Park Authority, and has been implemented on-ground by the Association of Marine Park Tourism Operators since its inception.

Climate change funding an investment in Reef's future

The Great Barrier Reef will be in better shape to manage the impacts of climate change thanks to almost \$9 million funding over the next five years.

The funding will be used by the Great Barrier Reef Marine Park Authority (GBRMPA) to employ a seven-person team to develop strategies that boost the Reef's resilience.

GBRMPA Acting Director of the new Climate Change Group Dr Paul Marshall said this would involve a combination of important research and on-ground management.

"We recognise climate change is a critical issue for the management of the Great Barrier Reef," he said.

"We are continuing to invest substantial resources into addressing the impacts of climate change.

"The new climate change group will coordinate a whole-of-agency approach to the issue and will be responsible for integrating the efforts of the agency.

"This will include a strong focus on community engagement and will emphasise the importance of education and community awareness of management issues."



Paul said the group would look at the ability of reef organisms to adapt to climate change and how climate change affects the Reef and the catchment.

"The key to managing tropical marine ecosystems in the face of climate change will be to ensure that they are as healthy as possible and thus as resilient as possible," he said.

"Reef resilience is very important and we are working to ensure the Reef is well positioned to cope with climate change impacts like coral bleaching."

The GBRMPA is working to build the Reef's resilience by protecting plants and animals through no-take zones and improving the quality of water that enters the Reef from the catchment.

International reef managers discussed ways to cope with climate change

Coral reefs around the world stand to benefit from a workshop held recently on the Great Barrier Reef.

More than 20 international experts in coral reef management met on beautiful Lady Elliot Island to share strategies for mitigating and managing the future impacts of coral bleaching due to climate change on coral reefs.

Dr Paul Marshall, one of the workshop coordinators and Acting Director of the Climate Change Group at the Great Barrier Reef Marine Park Authority (GBRMPA), said the workshop was an excellent opportunity to exchange information and ideas.

"We brought together information from the world's experts and worked with managers both locally and throughout south-east Asia to help ensure that our reefs are ready for climate change," he said.

"The workshop provided participants with skills and tools to adapt their management programmes to address the growing threat coral bleaching poses to coral reefs.

"Coral reefs are some of the most sensitive ecosystems on the planet. This group of experts brought hope of local action."

The workshop included presentations, interactive discussions and exercises, as well as in-water field activities. It was based on the publication *A Reef Manager's Guide to Coral Bleaching*, which included contributions from more than 50 experts in coral reef science and management.

The workshop was hosted by the GBRMPA, the US National Oceanic and Atmospheric Administration, and the World Band/Global Environment Fund Coral Reef Targeted Research Project with additional support from the Australian Department of the Environment and Water Resources.

Help the Reef by starting at home

Householders are encouraged to take some simple steps at home to reduce greenhouse gas emissions, thereby helping reduce the impact of climate change on the Great Barrier Reef.

Lighting accounts for five per cent of household greenhouse gas emissions:

Energy efficient compact fluorescent light bulbs use around 20 per cent of the electricity used by standard incandescent light bulbs. When considering the savings, long-life bulbs will reduce the cost of lighting by over a half.

Source: Australian Greenhouse Office and the Cooperative Research Centre for Greenhouse Accounting.



Report sheds light on the quality of water

The Great Barrier Reef Marine Park Authority (GBRMPA) has emphasised the need for a continued focus on improving water quality in the Great Barrier Reef.

In releasing the GBRMPA's 2006 Marine Monitoring Annual Report, Executive Director Andrew Skeat said the report provided a sound baseline by which to judge future improvements in Great Barrier Reef water quality and ecosystem health.

"We now have a comprehensive water quality monitoring programme in place for the Reef," he said.

"Data collected over the first 18 months of the monitoring programme has improved our understanding of Great Barrier Reef rivers, inshore waters, inshore reefs and seagrass ecosystems.

"We all know the quality of water entering the Reef must be improved and that there will be no quick fix. This report confirms we have a big job ahead of us.

"We are committed to continuing to work with the Queensland

Government, Regional Natural Resource Management Bodies and industry to see real results on the ground.

"Industry are taking an active role in adopting best environmental practice and this support is positive."

Andrew said the Australian Government committed \$6 million since July 2004 to develop and implement the Marine Monitoring Programme and had provided a further \$14.2 million to extend it to 2011.

"The monitoring programme provides a critical component of the assessment of any long-term improvement in regional water quality that will occur as best land management practices are widely adopted across Great Barrier Reef catchments," he said.

"The programme is a key action in the Australian and Queensland Government's Reef Water Quality Protection Plan funded through the Natural Heritage Trust.

"The Reef Water Quality Protection Plan provides the framework for improving land management practices that effect water quality in the Reef catchment."



The report examines the quality of water entering the Marine Park

Managing environmental impacts

Careful management helped ensure minimal impact on the marine environment in Shoalwater Bay during recent activities by the Department of Defence.

Defence and their United States military counterparts conducted their annual large-scale training exercise Tailsman Sabre in the area off Rockhampton.

GBRMPA Environmental Impact Management Manager Dr Adam Smith said the groups worked together to ensure activities were environmentally sustainable.

"We work closely with the Department of Defence to ensure the activities are carried out in an ecologically sustainable way," he said.

"Our ultimate aim is to ensure training, which is essential to a modern military force, complies with government legislation and environmental guidelines.

"The Marine Park is a multiple-use area so this approach is consistent with how we work with others who use the area for recreational or commercial purposes.

"This involves a combination of consultation at local, state and national levels, using research and conducting an environmental impact assessment."



A US Marine Corps armoured amphibious vehicle during the training (image courtesy of Department of Defence)

Community engagement boost

Regional communities will be better connected with the Great Barrier Reef Marine Park Authority (GBRMPA) following an expansion of its regional offices.

Additional staff will join the offices based offices in Cairns, Mackay, Rockhampton and the Authority's Townsville headquarters to enhance community engagement.

GBRMPA Community Partnerships Director David Osborn said the extended team had a big and exciting job ahead.

"We are really looking forward to helping expand the two-way exchange of information and ideas between the community and the GBRMPA," he said.

"Community involvement in Marine Park management is vitally important to build a shared sense of ownership and encourage people to help protect the Reef. "The new team brings a wealth of experience to the agency, with varied backgrounds ranging from law and journalism to natural resource management.

"This is a very interesting combination of people with unique backgrounds.

"It is because of these varied strengths that I believe we will be well-placed to liaise with and engage a range of community groups."

The Community Partnerships Group was established in 2005 to build better and new information flows between regional communities and the GBRMPA.

This is achieved through working with stakeholders on marine management, engaging the community at regional and boating shows, and increasing community input through the Local Marine Advisory Committees.

Protected Species

Barramundi cod

Barramundi cod (Cromileptes altivelis) is an iconic marine finfish species and is among several species of fish that are protected in the Marine Park. It displays distinctive colouration when startled – brownish blotches over the body. The adults are typically found in low numbers in lagoons and seaward reefs, while the juveniles occur on shallow protected reefs and differ in appearance from the adults.

Threats

Due to their unique appearance, juvenile barramundi cod are prized in the aquarium trade. The adults are highly valued in the live fish trade, with many tonnes entering the south-east Asian market every year. Prior to protection, this species was exploited on the Great Barrier Reef and fetched a high export price. Climate change may also have unpredictable effects on this species and its reef habitats.

What's being done?

The barramundi cod is listed as a protected species and cannot be taken without a Marine Parks permit. Currently aquaculture using broodstock is being developed in Queensland to provide a sustainable way to supply the species for ornamental or live fish trade in Australia and overseas, which will reduce pressure on wild populations.

What can I do?

It is an offence to take a protected fish species without a Marine Parks permit. Visit Reef HQ to see the live barramundi cod on display or familiarise yourself with species identification guides before heading out on the water so you can identify protected species of fish. If you inadvertently catch a barramundi cod, release it carefully.

Useful information

www2.dpi.qld.gov.au/fishweb/ www.info-fish.net/releasefish/ www.gbrmpa.gov.au/corp_site/ key_issues/conservation/natural_ values/protected_species.html



SEA COUNTRY



Working together to manage sea country

A shared approach to managing sea country in the Great Barrier Reef region is proving a recipe for success.

The Great Barrier Reef Marine Park Authority (GBRMPA) has developed a close partnership with many Traditional Owners along the coast.

This is reaping rewards for government, communities and the environment. Outcomes include:

- Accrediting two Traditional Use of Marine Resources Agreements for the Girringun and Woppaburra Traditional Owner groups, respectively - these agreements recognise sea country and aim to ensure traditional use of marine resources is ecologically sustainable and cultural practices continue to coexist with the conservation and management of the Great Barrier Reef.
- Developing sea country partnerships arrangements between the GBRMPA, Queensland Environmental Protection Agency and Traditional Owner groups.
- Assisting and encouraging Indigenous tourism permit opportunities.
- Supporting a successful application by the Woppaburra Traditional Owners to have traditional island names formally recognised – map makers now have the option of including the traditional name and primary name on all new maps.
- Ensuring Indigenous representation on the Reef Advisory Committees, Local Marine Advisory Committees and in the Reef Guardian Schools Programme (in Palm Island and Bamaga).
- Erecting welcome to sea country boat ramp signs to recognise the strong cultural links Traditional Owners have to the Marine Park.
- Holding cultural awareness education camps and Traditional Owner sea country tours for GBRMPA staff.

Staff celebrate special NAIDOC Week

NAIDOC Week was an extra cause for celebration this year as the event celebrated its 50th anniversary.

The Great Barrier Reef Marine Park Authority (GBRMPA) marked the occasion with a range of special events.

GBRMPA Indigenous Partnerships Liaison Unit Manager Chicka Turner said staff strongly supported NAIDOC activities.

"It was a fantastic opportunity for staff to learn more about Aboriginal and Torres Strait Islander cultures," he said. "Staff took part in a celebratory breakfast, presentations by Traditional Owners and an information stall at NAIDOC celebrations in Townsville, Mackay, Cairns and Rockhampton.

"This year's event was especially significant – the 50th anniversary of NAIDOC with the theme 50 years: Looking Forward, Looking Blak."

During NAIDOC Week the GBRMPA also launched Story Place -Australia's first online database solely on Aboriginal and Torres Strait Islander connections to the Great Barrier Reef.

Sea Country Snippets

Introducing Traditional Owner groups along the Great Barrier Reef coast



Thiithaar (Pronounced: Th-ee-th-arr)

- Thiithaar is a coastal clan of the larger Guugu-Yimithirr Nation.
- Guugu-Yimithirr traditional names exist for areas of land and sea in the whole Thiithaar Estate (including the Cape Bedford and Elim Beach region). The southern boundary is a place called Baayjin Bigu (where you find sharp pointed shellfish Mugubina) and Giya (fresh water creek Burrai Binthu) is the most northern point.
- Thiithaar elders continue to pass on their traditional knowledge of activities such as spear making so that families can continue the practice of traditional use of marine resources.



David Deemal making a spear at Elim Beach, near Hopevale



Looking out for our Great Barrier Reef

Community input is being sought into the Outlook Report, designed to assess the future of the Great Barrier Reef.

The Great Barrier Reef Marine Park Authority's (GBRMPA) new five member Outlook Report Taskforce is gearing up to coordinate the mammoth task of producing the report.

Scheduled for completion in 2009, the five-yearly report will be an important stock take of the Great Barrier Reef, its management and its future.

GBRMPA Taskforce Director Jon Day said the report would rely on information collected from a number of sources.

"We are currently working with our eleven Local Marine Advisory Committees and four Reef Advisory Committees to compile a preliminary list of pressures facing the Great Barrier Reef and the communities and industries that rely on it," he said.

"In compiling the Outlook Report, we also hope to uncover historical perspectives which will help us to understand how the Reef has changed over time."

Already some common concerns have emerged such as the potential impacts that climate change, declining water quality, population growth and coastal development will have on the marine ecosystem.

The Outlook Report follows a review of the *Great Barrier Reef Marine Park Authority Act 1975*, which called for a regular report on the Marine Park's long-term outlook.

Learn more about the Outlook Report at www.gbrmpa.gov.au.



Boaties encouraged to make the switch

The Great Barrier Reef Marine Park Authority (GBRMPA) is calling on boaties to consider switching to more environmentally friendly small boat engines.

It comes after a report into the emissions of marine outboards and personal watercraft, commissioned by the Department of the Environment and Water Resources.

GBRMPA Acting Chairman Andrew Skeat encouraged people to opt for environmentally friendly outboards by using the star rating system that's been established.

"Recreational users of the Marine Park are encouraged to be mindful of how they operate – including everything from the disposal of litter to the engines they use," he said.

"A new star rating system, similar to that used for household appliances, has been applied to outboard motors.

"The new system is helping customers make informed decisions about the products they are



purchasing and we encourage people to take up the environmentally-friendly option."

The report revealed old technology like conventional two stroke engines used in marine outboard and personal watercraft were high polluters relative to their engine size and usage.

These small engines emit volatile organic compounds and oxides that contribute to ozone (photochemical smog) formation in summer.

They also emit particles, carbon monoxide and a range of water and air toxics such as benzene.

Andrew said marine retailers were getting behind the environmentally-friendly outboards even though there were currently no laws regulating outboard motors in Australia.

A full copy of the report is available online at www.environment.gov.au.

Tiger sharks in the spotlight at community forums

One of the Great Barrier Reef's most frightening predators was the focus of community forums in Mission Beach and Port Douglas.

Marine biologist, leading underwater cinematographer and shark researcher Richard Fitzpatrick shed light on tiger sharks that inhabit the Reef.

The events were hosted by the Great Barrier Reef Marine Park Authority, Mission Beach Local Marine Advisory Committee and Douglas Marine Advisory Committee.

Both were part of a programme to bring scientists to the community.

As part of the presentations, Richard showed graphic footage describing how he ropes and tags tiger sharks on the Reef.

"Hanging onto the dorsal fin of a tiger shark as it swims is an awesome experience," he said.

"The immense power and strength of these animals is incredible.

"I've been working with tiger sharks for over eight years now and people think I must have a death wish because tiger sharks are known to be pretty aggressive.

"But they are also fascinating and mysterious animals - there's still a lot we don't know about them."

Richard has shot more than 50 films with clients ranging from the BBC to National Geographic.



Tiger sharks were the stars of the community forum

reef grandian achieve

Cannonvale school adopts local beach

Cannonvale State School adopted Cannonvale Beach recently as part of their ongoing Reef Guardian School activities.

Students from Cannonvale State School have been visiting the beach to keep the area clean, conduct mangrove research and monitor water quality.

Great Barrier Reef Marine Park Authority (GBRMPA) Reef Guardian Schools Programme Manager Megan Sperring said they were proud to now be seen as the official caretakers of the beach.

"The beach adoption has been made possible through a collaborative partnership between the GBRMPA, Whitsunday Shire Council and Cannonvale State School," she said.

"This is the first official Reef Guardian Schools beach adoption in conjunction with their local council.



Students celebrate the beach adoption

"We are encouraging other schools involved in the programme to follow suit

"It doesn't just have to be a beach, either – students could choose to adopt a creek or wetland."

Whitsunday Shire Council Sustainability Officer Hadley Goodin is looking forward to working with the school at their adopted beach and supporting their ongoing hard work.

"The research we get from the school, in particular the water testing and waste data, will be used by the council to consider how we can improve the health of our local coastline," he said.

Townsville students discuss climate challenge on major US television network

Townsville students will share their views on climate change with the rest of the world after major US children's television network Nickelodeon attended the Townsville Future Leaders Eco Challenge.

The Eco Challenge was facilitated by the Great Barrier Reef Marine Park Authority (GBRMPA) as part of the Reef Guardian Schools Programme and involved more than 50 students from nine local schools.

GBRMPA Education Manager Fred Nucifora said the theme of the Eco Challenge was: in an ever-changing world, what does climate change mean to you?

"The students had the opportunity to hear from climate change experts and share stories and experiences with other students about what their school was doing to better understand climate change," he said.

"They were also encouraged to network and problem solve with one another on current climate change issues, and plan for the future about what they can all do to be a part of the solution."

The Future Leaders Eco Challenge will air on the longest running kids news programme in television history Nick News with Linda Ellerbee, which airs on popular US cable network Nickelodeon.

"Nickelodeon contacted us to see if we would be a part of a special about climate change and how it affects kids from across the globe," Fred said.

"Nick News will be speaking with kids from all over the world who care about global warming and have seen the effects of climate change in their communities.

"They were particularly interested in how global warming is affecting the health of corals in the Great Barrier Reef."

The event was run in conjunction with Townsville City Council, a Reef Guardian Council, and the Burdekin Dry Tropics Natural Resource Management Board.

Fishing makes for fun learning

Cranbrook State School learnt more about sustainable practices when they hosted their annual Fishing Classic at Pallarenda Beach recently.

And this year's event was made even more special when the students caught their very first legal-size fish.

The Fishing Classic was instigated four years ago by Cranbrook State School Principal Norm Hart and has become a school institution.

"I wanted to share my love of fishing and of the marine environment with my students," he said.

"It's a good example of sustainable environment use, which has become the focus of an entire unit of study based on environmental best practices."

Sharing ideas around the world



Reef HQ Interpretation and Volunteer Manager Julie Spencer will embark on the trip of a lifetime to Ireland.

Julie has been selected as one of only five people to represent the north Queensland region on a Rotary International Group Study Exchange.

Julie will speak at a range of Rotary meetings and conventions across Ireland about her position at Reef HQ and Australian culture in general.

"Reef HQ's mission statement - to inspire all to care for the Great Barrier Reef - is something I am really keen to share with the Rotarians," she said.

"Most importantly, I hope to share my enthusiasm and passion for the Reef.

"I will also be highlighting what a great place Reef HQ is and encouraging them to visit if they ever come to Australia."

Julie will be joined by two other Townsville representatives as well as one from Cairns and another from Fast Timor

Each will be billeted with local families throughout their trip, enabling them to experience the local culture first-hand.

There is also a vocational element to the trip, with Julie hoping to take advantage of this in visiting some other tourist attractions in Ireland.

"I am keen to visit aquariums, zoos, museums and other environmental organisations wherever possible," she said.

"On a personal note, I am also looking forward to experiencing the scenery and historical aspects of Ireland."

Townsville researcher scoops top accolade

A leading Great Barrier Reef researcher has scooped one of the prestigious Australian Museum Eureka Prizes.

James Cook University's Professor Terry Hughes won the Sherman Eureka Prize for Environmental Research.

The prize is awarded for research in any field of the biological, physical, mathematical or biomedical sciences leading to the resolution of an environmental problem or the improvement of our natural environment.

As the Director of the ARC Centre of Excellence for Coral Reef Studies based at the University, Terry is regarded as one of the world's leading coral reef scientists.

His work has led directly to a re-zoning of the Great Barrier Reef and has been described as an "outstanding example of how science should be used for the benefit of the public."

One of Terry's most important studies found that local management of fish stocks is key in preventing degradation and managing reef resilience.



Photo courtesy of James Cook University

One stop shop for boaties and fishers

The Townsville Local Marine Advisory Committee (LMAC) recently announced the release of their new guide to boating and fishing in the Townsville region.

LMAC Chair Steve McGuire said the guide was a useful resource for anyone planning to go boating or fishing in waters from Balgal Beach to Cape Upstart.

"This guide provides up-to-date information on local Marine Park Zoning as well as the locations and specifications of public boat ramps along the coast," he said.

"The contents of the guide will be of use to locals and tourists visiting the region."

"Keeping current on the many rules and regulations that protect our Marine Park can be difficult and it is important for people to know what activities can be undertaken in the zones they are visiting."

The guide provides links to current fishing regulations as well as information on topics ranging from best practice fishing and boating guidelines to safety and marine conservation.

It complements Marine Park Zoning Maps, which provide comprehensive information and is essential for anyone heading out on the water.

The boating and fishing guide is available at local fishing and tackle shops throughout the Townsville region.

Spawning closures

Three nine-day periods have been implemented as closed seasons to the taking of all coral reef fish on the Great Barrier Reef.

These fall in October (5–13 incl), November (3–11 incl) and December (3–11 incl) this year, around the new moon phases.

The closures are designed to protect spawning aggregations of most coral reef fish species.

Further information is available from the Queensland Department of Primary Industries and Fisheries on 13 25 23 or at www.dpi.qld.gov.au/fishweb.

Turtle research and rehabilitation

A far north Queensland researcher is helping shed light on the role of infectious diseases in the ecology of wild and captive marine turtles.

James Cook University's Jennie Gilbert is examining both sick and healthy turtles in the Cairns region to look at floater syndrome and other factors affecting turtles.

Floater syndrome is caused when gas accumulates in the gut and body cavity of a turtle rendering it unable to dive and therefore unable to eat.

"I am examining healthy turtles around areas such as Green Island and looking at sick turtles that are taken into a turtle rehabilitation centre in Cairns," she said.

"There's a range of factors affecting marine turtles but the effect of environmental contaminants on marine turtle health is probably the least understood.

"I am hoping to find out how environmental conditions like pollution, degradation and water temperature affect turtles and what can be done to manage these impacts."

While the full research is yet to be complete, preliminary results indicate there are changes in blood examined between healthy and sick turtles.

Jennie said there was little information on blood levels in turtles in far north Queensland and it was useful to establish baseline values.

"What is known is that blood levels change with age, sex, season, location, maturity, nutritional and health status of turtles," she said.

"What is unknown is to what extent the changes in blood levels indicate diseases that may be present in the animal."

Monitoring blood levels in both sick and healthy turtles will help to set a baseline for the health status of local wild populations in the Great Barrier Reef.

It may also be a valuable indicator of the environmental status of the habitat.



Research is unlocking the key to turtle health trends

This knowledge may assist management agencies in determining the appropriate standards for environmental factors such as water quality in order to conserve healthy local turtle populations in the future.

The research is expected to be complete in 2011.

Please report any sick, injured, stranded or dead marine turtles to the EPA Hotline on 1300 130 372.

Cycling for a cause

In a Tour de Townsville, two groups of cyclists from the Great Barrier Reef Marine Park Authority (GBRMPA) took to the streets and biked through the bush in the name of charity.

Street-wise cyclists Adam Smith and Madeleine Ward participated in the Children's Cancer Institute of Australia's (CCIA) Townsville to Cairns bike ride held in late July.

Now in its ninth year, the three-day cycling extravaganza saw more than 200 riders peddle up to 150 kilometres a day along the highway from Townsville to Cairns.

"The GBRMPA staff were so generous in sponsoring us," Madeleine said. "It might have been a result of the Lycra cycling outfit Adam wore during our collection rounds at the office, but everyone was very kind indeed!"

GBRMPA staff donated over \$700 for children's cancer research, with the event raising a record \$350 000 for the CCIA.

Not to be outdone, an eight-person team of GBRMPA staff also braved bumps and stumps in the Paluma Push.

Colleagues helped the bike riders raise \$300 for the Rural Fire Brigades of Paluma and Waterfall Creek.

Competition takes environmental snapshot The connection between the land and the sea was the focus of an annual photographic competition for

and the sea was the focus of an annual photographic competition for school students in the Mackay region.

Run by the Padaminka Nature Refuge, the event encouraged students to appreciate and capture on film the environment around them.

Competition organiser Maureen Cooper said taking photographs encouraged students to look closely at the environment.

"Our objective was to get kids to turn off their television sets and video games and start engaging with the world around them," she said.

Prizes were given in the categories of landscape, bio-diversity and human activities with winning entries from both primary and secondary schools.

The Mackay Local Marine Advisory Committee donated \$100 toward prizes.

The Padaminka Nature Refuge is a revegetated ex agricultural and grazing farm located outside Walkerston, Queensland.



GBRMPA staff cycle for a good cause during the Paluma Push

Marine Park Partnerships

Profile of Director Community Partnerships Group



David Osborn

David Osborn is the new Director for the Community Partnerships Group at the Great Barrier Reef Marine Park Authority (GBRMPA).

He joins the team from cold Canberra and says this is a wonderful time of year to have joined not only the agency but also the Townsville community.

Other than having fun thawing out in the Townsville winter, David has been busy settling into his new role and says he is looking forward to the exciting job ahead.

In his new role David will head up a team of 16 staff members who are spread across Cairns, Mackay, Rockhampton and Townsville.

He sees the group's role as engaging the community on issues

timely to GBRMPA as well as listening to community concerns and feedback.

"I see our role as representing the Authority where people live and work. The secret to successfully engaging the different communities on Marine Park issues is two-way communication," he said.

David joins GBRMPA with a wealth of knowledge covering marine and biodiversity issues.

He also has extensive experience in engaging communities and managing stakeholder issues in these areas.

Before working with GBRMPA David was the Director of the Coastal Policy Section in the Marine and Biodiversity Division at the Department of the Environment and Water Resources.

In this role he also gained experience working as an adviser to the Minister.

David also spent four years based in the Netherlands with the United Nations Environment Programme working on the Global Programme of Action for the Protection of Marine Environment from Land-based Activities.

On top of this, he also served as an Officer in the Royal Australian Navy.

His wealth of knowledge gained from his previous positions will no doubt assist with the smooth running of the Community Partnerships Group.

Creature Feature

Blue ringed octopus

- Several species occur in Australian waters
- Most do not exceed 20 cm in length
- Are normally drab in appearance; blue rings show only when the animal feels threatened or senses the approach of a larger animal
- Their mouth has parrot-like beak when it pierces the skin, venom is injected
- The venom is the same venom found in the puffer fish, known as tetrodotoxin or TTX
- It causes paralysis and, as yet, there is no antidote.



Doing your bit to look after it!

Whales are majestic creatures that make their annual migration north during winter. While they can be social animals and may approach boats or people, it is important not to approach them for both the safety of the whales and people watcing them.

- Keep a lookout and avoid disturbance to mother whales and their calves, especially from May to September
- Reduce your vessel speed to minimise the risk of collision in areas where whales have been sighted
- Abide by approach restrictions vessels must stay at least
 - 100 metres away from the animal and 300 metres away in the Whitsunday Whale Protection Area, and jet skis must stay at least 300 metres away from the animal throughout the Marine Park
- Do not get in the water if you see a whale if you are already in the water do not disturb, chase or block the path of a whale and if possible, return to your vessel
- if there is a sudden change in whale behaviour, move away immediately
- Report sick, injured, stranded or dead whales to the **EPA Hotline** 1300 130 372.

Community Links

A profile of Jos Hill Managing Director of Reef Check Australia



For a girl from landlocked England, Jos Hill has made much more than the quintessential sea change.

As the Managing Director of Reef Check Australia, she divides her time between scoping out life on the Great Barrier Reef and managing her army of volunteer SCUBA divers.

"When I first started with Reef Check I thought I would learn a lot about marine science, but I have really learnt a lot about business and about working with people," she said.

"It has been a very interesting journey!"

When Jos opened up Australia's first chapter of Reef Check International six years ago, she was a one-woman band.

"The early days were difficult because I had to set up a standardised training programme for Reef Check which would incorporate the quality controls needed to make the data we collect useful to local reef managers and scientists.

"I had no time or resources and had to build Reef Check Australia from the bottom up."

Six years later, Jos had found a number of like-minded people to help her collect valuable information about the health of corals on the Great Barrier Reef.

"There are a lot of people out there who really care and Reef Check gives them a meaningful opportunity to have input into the management of coral reefs.

"I find it personally very rewarding to meet people who share similar ideals, values and passion for conserving the marine environment."

For Jos, building people's awareness and understanding is a different kind of challenge.

"Although people care about the environment, they don't necessarily take action," she said.

"I think it is important for all of us to think about how we live our lives, how much water we use and all the choices we make that can impact the environment."

So where to next for this motivated young woman? Jos says her ultimate aim is to utilise the support network of local marine experts to create links with other countries.

On the rare occasions when she has some free time, Jos teaches aerobics and is enjoying learning to rock climb.

She says her biggest buzz, however, comes from working with people who have commitment and vision.



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