# **Lizard Island National Park Management Statement 2013**

Park size:	991ha
Bioregion:	East Cape York Marine
QPWS region:	Great Barrier Reef Marine
Local government estate/area:	Cook Shire Council
State electorate:	Cook



Watson's Bay, Lizard Island National Park. Photo: NPRSR.

#### Legislative framework

~	Aboriginal Cultural Heritage Act 2003
~	Aboriginal Land Act 1991
~	Cape York Peninsula Heritage Act 2007
~	Environment Protection and Biodiversity Conservation Act 1999 (Cwlth)
~	Native Title Act 1993 (Cwlth)
~	Nature Conservation Act 1992

#### Plans and agreements

~	Bonn Convention
~	China–Australia Migratory Bird Agreement
~	Japan–Australia Migratory Bird Agreement
~	Republic of Korea–Australia Migratory Bird Agreement

#### **Thematic strategies**

	Level 2 Fire Management Strategy
<b>\</b>	Level 2 Pest Management Strategy



#### **Vision**

Lizard Island National Park is a collection of continental islands and coral cays that rise out of Great Barrier Reef waters between Cape Flattery and the Ribbon Reefs. Lizard Island National Park is part of Dingaal country.

Lizard Island National Park will be effectively managed to ensure the natural and cultural values and processes are protected and presented and the importance of the park to Traditional Owners recognised. The national park will be jointly managed by building strong collaborative relationships with Traditional Owners.

The islands feature a mix of sandy beaches, towering headlands and rocky escarpments. They are alive with a variety of mainland and marine wildlife including a mosaic of ecosystems and species of conservation concern. These qualities remain a prominent feature of cultural, natural and scenic value.

# **Conservation purpose**

Lizard Island National Park and surrounding marine park waters are part of the Great Barrier Reef World Heritage Area. Natural and cultural values are collaboratively managed with Traditional Owners.

Eighteen regional ecosystem types provide a sample of Cape York Peninsula's granite vegetation communities including palustrine wetlands, open coastal range forests, wind sheared heath, ephemeral herbs on rock, vine thickets, grasslands and mangroves.

Lizard Island National Park is important for a large variety of mainland and marine wildlife, including species of conservation concern and 17 species of migratory sea birds. The islands have a significant place in regional shared-history.

# Protecting and presenting the park's values

#### Landscape

The Lizard Islands are a living cultural landscape rich in traditional and contemporary significance for Dingaal Traditional Owners. There is strong connection with surrounding traditional land and sea estates.

Lizard Island is located approximately 30km north-east of Cape Flattery and 93km north-east of Cooktown. Lizard Island National Park consists of five islands and one group of islets.

Lizard Island is a 1,012ha continental island the majority of which is rock-strewn vegetated hill sides, fringed by several bays and headlands. Lease areas over the national park provide for the operation of a research station over an 8.5ha area in the south-west corner of Lizard Island near Research Point, and a resort and airstrip over a 41ha area in the west of Lizard Island adjacent to South Bay Point and Anchor Bay.

Palfrey Island is a 6ha continental island featuring tumbled granite boulders, located on the south-west of Lizard Island Reef, situated on the south-west side of the Lizard Island Lagoon, known as 'Blue Lagoon'. South Island (also known as Newt Island) is a 15ha high continental island rising 123m above sea level, located on the southern-most tip of Lizard Island Reef and Blue Lagoon. Eagle Island is a narrow triangular vegetated sand cay edged by exposed beach rock on all sides, located 7km west of Palfrey Island. Osprey Island (also known as Prince Charles Island) is a small rocky knob connected to the western side of Lizard Island at low tide by drying reef while the Seabird Islets are a group of four small rocky continental islands joined by drying reef, situated on the south-eastern side of Lizard Island Reef and Blue Lagoon. There are no easements or esplanades are present on these islands.

# **Regional ecosystems**

The park has 18 regional ecosystems, nine being of biodiversity concern (Table 1). Lizard Island is almost entirely vegetated with a combination of nine of biodiversity concern regional ecosystems—for example, the island's eastern side is dominated by a mix of evergreen notophyll vine forest, kangaroo grass *Themeda triandra* tussock grassland and Moreton Bay ash *Corymbia tessellaris* + *C. clarksoniana* coastal range open forest. Osprey Island is densely vegetated with of biodiversity concern Moreton Bay ash *Corymbia tessellaris* + *C. clarksoniana* and grass *Themeda triandra* tussock grassland while Palfrey Island's vegetation is entirely comprised of the of biodiversity concern kangaroo grass *Themeda triandra* tussock grassland, evergreen notophyll vine forest on coral atoll beach ridges and *Acacia humifusa* +/- *Lithomyrtus obtusa* dwarf open heath on windswept coastal dunes and headlands. South Island's vegetation is entirely comprised of the of biodiversity concern kangaroo grass *Themeda triandra* tussock grassland, *Acacia humifusa* +/- *Lithomyrtus obtusa* dwarf open heath on windswept coastal dunes and headlands and notaphyll vine forest. The Seabird Islets are scantly vegetated exposed ocean rock and Eagle

Island features of biodiversity concern *Premna serratifolia* closed scrub and sea shore stalky grass *Lepturus repens* closed herbland. Of note 43 plant species have been recorded on Eagle Island a very large number for one single Great Barrier Reef sand cay.

#### **Native plants and animals**

The islands retain a high level of natural integrity and support many species in common with the mainland. They offer a secure island environment not subject to the same level of pest impacts as the mainland. Queensland Parks and Wildlife Service (QPWS) records indicate that 408 species of plants have been identified one of which is listed as being of conservation significance under the Nature Conservation (Wildlife) Regulation 2006, the near threatened *Psychotria lorentzii*, a rainforest tree.

QPWS records indicate that 124 species of animals have been identified of which eight are listed as being of conservation significance under the Nature Conservation (Wildlife) Regulation 2006 (Table 2). In 2010 a fawn-footed melomy *Melomys cervinipes* was collected on the south-east side of South Island, a range extension for the species. No other rodents have been identified from the park other than water rats *Hydromys chrysogaster* which have been recorded near the research station and Resort on Lizard Island. Historical records and information suggest that water rats first appeared on Lizard Island in 2009 with increasing sightings since, indicating an introduced population. Rodent populations require more research to determine species type, origin, distribution and implications for fire management.

Twenty-seven bird species, a butterfly and the estuarine crocodile *Crocodylus porosus* are listed under international conventions (Table 3). Eagle Island supports 53 species of seabirds, a large number for a single Great Barrier Reef sand cay (Smith and Buckley 1986).

#### **Aboriginal culture**

The Aboriginal Cultural Heritage Act 2003 and the Torres Strait Islander Cultural Heritage Act 2003 provides the primary legislative framework across all tenures for the management and protection of Aboriginal cultural heritage through mechanisms such as cultural heritage management plans and culturally appropriate registration of cultural places and items.

Further research is required to determine what information can be shared.

# **Shared-history culture**

No places or items are registered under the *Queensland Heritage Act 1992* on Lizard Island National Park; however early contact history dates back to 1770 and the islands feature significantly in shared maritime history including:

- in August 1770 Lieutenant James Cook onboard the HM Bark *Endeavour* landed on and named Eagle Island and Lizard Island. Lizard Island's highest summit, now named 'Cook's Look', was used by Cook to reconnoitre a way out of the reef-strewn labyrinth he realised he was in
- a series of visits by the Royal British survey fleet ensued, including the HM Survey Cutter Mermaid in 1820, HM Survey Brig Bathurst in 1821, the HMS Beagle in 1839, the HMS Fly, HMS Rattlesnake in 1848. A number of these visits recorded encounters with Aboriginal people of the island. Botanists aboard these vessels made the first early European fauna and flora records for the islands
- in 1860 the Brig *Julia Percy* landed a group of men, women and children of European, Chinese and South Sea Islander descent to establish a processing base for the local bêche-de-mer harvesting from Lizard Island's Watson's Bay. By October 1861, 25 of the group had died due to diminished supplies and illness. Hostilities resulted with local Aboriginal people largely due to lack of communication and location of the processing base. Watson's Cottage and Watson's Bay are named after Mary 'Lizzie' Watson, who with her child and Chinese employee fled Lizard Island in a cut down iron tank only to perish nine days later on Watson's Island in the Howick group of islands. A monument erected in 1886 still stands in Cooktown in memory of the event
- in 1928 Lizard Island was used as a base for the ML Magneta Great Barrier Reef survey expedition
- in 1972 the Lizard Island Research station was established, now one of the longest running reef-based research facilities. In the same year the pioneering, and now internationally renowned, Lizard Island Resort tourism venture was constructed.

#### **Tourism and visitor opportunities**

Lizard Island has scenic appeal, a sense of remoteness and generally provides a somewhat natural, self-reliant visitor experience. The Lizard Island interpretative walk from Watson's Bay to 'Cook's Look' has been developed to provide visitor access to the steep terrain. A day use and camping area is located at Watson's Bay. Visitors can access numerous other bays and beaches throughout the national park without any infrastructure, providing a totally natural experience.

The Department of National Parks, Recreation, Sport and Racing (NPRSR) website has visitor information available. The islands have boundary signs displaying the national park name with pictograms to regulate activities where relevant, for example, no fires. Visitor use of the resort and research station is managed separately under provisions of the resort lease and research station lease.

Lizard Island Resort provides a unique visitor experience. The Lizard Island Lagoon is popular with cruising yachts and provides a sheltered anchorage. Marine park designated 'cruise ship' anchorages are located in Watson's Bay. The designated shipping channel runs between Eyrie Reef and Palfrey Island. Seasonal restricted access areas from 1 September to 31 March are recommended by QPWS for Eagle Island and the Sea Bird Islets based on their significance for roosting and nesting seabirds.

#### **Partnerships**

Lizard Island National Park is managed by QPWS to protect cultural values, species of conservation significance and regional ecosystems representative of the East Cape York Marine Bioregion. A joint management framework with QPWS and Traditional Owners is provided by the *Nature Conservation Act 1992*, *Cape York Peninsula Heritage Act 2007* and the *Aboriginal Land Act 1991*.

Through this framework partnerships may be developed and strengthened with stakeholders such as Lizard Island Resort, tourism operators, Lizard Island Research Station and researchers, with particular reference to pest management and tourism and visitor opportunities.

There is a cooperative focus between NPRSR and the Great Barrier Reef Marine Park Authority (GBRMPA) for complementary management of national park islands and surrounding State and Commonwealth marine parks.

# Other key issues and responses

## Pest management

Regular assessments and inspections of national park islands are undertaken. The islands retain a high level of natural integrity. No pest animals have established populations in the Lizard Island Group. The cane toad *Rhinella marina* has been sighted three times. Recent and increasing water rat sightings at the research station and resort requires further investigation to confirm the suspected introduction of this species.

Thirty-three species of pest plants are present on Lizard Island. Species of particular management concern include the non-declared Guinea grass *Megathyrsus maximus* and Mossman River grass *Cenchrus echinatus* and the declared Class 3 pest plant Singapore daisy *Sphagneticola trilobata*. These three species are all subject to control programs.

# Fire management

Fire management since the 1990s is well documented and no recent history of wildfire has been recorded on the national park. There is an overriding principle of protection of cultural values such as middens and rock art, shared history places such as Watson's cottage and grave sites, weed control, the resort and research station, seabird nesting and erosion prevention. Vegetation monitoring plots guide planned burn regimes for the different vegetation types. If QPWS or Traditional Owners feel there is a need to adjust planned burning a thorough assessment of the natural and cultural values and processes would be jointly undertaken to assist decision making.

## References

Byrnes N B Everist S L Reynolds S T Specht A and Specht R L 1977, *The vegetation of Lizard Island, North Queensland.* Proceedings of the Royal Society of Queensland **88**, 1–15.

Domm S 1977, Seabirds and Waders of Lizard Island. The Sunbird 8, 1-8.

GBRMPA 2002, Coastal Bird Monitoring Strategy for the Great Barrier Reef World Heritage Area. GBRMPA, Townsville.

Smith G C and Buckley R C 1986, Seabird Islands No. 161: Eagle Island, Great Barrier Reef, Queensland. Corella 10, 81–83.

# **Management directions**

Desired outcomes	Actions and guidelines
Landscape  Scenic amenity values of the park are protected consistent with the overall character of the park and landscape settings.	<ul><li>A1. Infrastructure is minimal and consistent with the character of the park and landscape setting.</li><li>A2. Continue to manage shared-history cultural values using current and available research to improve knowledge of its location and maintenance requirements.</li></ul>
Regional ecosystems  Conserve the diversity and distribution of natural plant and animal communities (particularly significant species) representative of the East Cape York Marine Bioregion.	<ul> <li>A3. Investigate the declaration of seasonal restricted access areas for Eagle Island and the Seabird Islets in accordance with their habitat values for breeding species of conservation significance.</li> <li>A4. Review monitoring objectives for species of conservation significance and of concern regional ecosystems in the park and support monitoring programs that achieve these objectives. Particular focus will be on monitoring objectives for species of conservation significance listed in Table 2 and of concern regional ecosystems listed in Table 1.</li> <li>A5. Investigate the identity, distribution and origin of rodent populations in the island group.</li> </ul>
Tourism and visitor opportunities  Provide a low-key self reliant visitor experience without damaging natural and cultural values.  Tourism activities occur sustainably.	<ul> <li>A6. Maintain commercial access to Lizard Island with group sizes managed to maintain the natural setting and cultural landscape.</li> <li>A7. Inform tourism and visitor opportunities, where practicable, with culturally appropriate cross-cultural information from the Traditional Owners.</li> </ul>
Pest and fire management  Natural and cultural values are maintained through strategic cross-cultural fire and pest management regimes.  Partnerships  NPRSR develops significant relationships with key partners including the resort and research station.	<ul> <li>A8. Utilise QPWS pest and fire management strategies for the monitoring and control (containment/eradication) of pests and for the management of fire for protection of natural and cultural values.</li> <li>A9. Fires are not permitted in the park, except for authorised management and/or where practicable Traditional Owner purposes.</li> <li>A10. Undertake regular liaison with the Lizard Island Resort and Lizard Island Research Station, particularly with regard to pest management and tourism and visitor opportunities.</li> </ul>

Desired outcomes	Actions and guidelines
Joint management  Lizard Island National Park is jointly managed between the Traditional Owners and QPWS by building strong collaborative working relationships and future agreements.	<ul> <li>A11. Work closely with Traditional Owners and consult regularly over management direction and issues.</li> <li>A12. Use best endeavours to facilitate site visits to discuss management of islands</li> <li>A13. Fulfil actions identified in Indigenous Land Use Agreements and Indigenous Management Agreements once they are developed.</li> </ul>
The importance of the park to Traditional Owners will be recognised.	

# **Tables – Conservation values management**

Table 1: Endangered and of concern regional ecosystems

Regional ecosystem number	Description	Biodiversity status
3.2.4	Melaleuca leucadendra +/- M. dealbata open forest. In dune swales, and swampy areas.	Of concern
3.2.22	Acacia humifusa +/- Lithomyrtus obtusa dwarf open heath on dunes and headland.	Of concern
3.2.24	Closed herbland of mixed graminoids and forbs. Occurs on exposed foredunes.	Of concern
3.2.28	Evergreen notophyll vine forest on beach ridges on coral atolls, shingle cays and sand cays.	Of concern
3.2.31	Premna serratifolia closed scrub. Restricted to coral atolls, shingle cays and sand cays.	Of concern
3.2.32	Lepturus repens closed herbland. Restricted to sand cays.	Of concern
3.3.62	Grassland/sedgeland with <i>Pandanus</i> spp. Characteristic of Torres Strait Islands.	Of concern
3.12.23	Acacia brassii low open forest on acid volcanics on northern ranges and islands.	Of concern
3.12.31	Themeda triandra tussock grassland on headlands and islands on acid volcanic rocks.	Of concern

Table 2: Species of conservation significance

Scientific name	Common name	Nature Conservation Act 1992 status	Environment Protection and Biodiversity Conservation Act 1999 status	Back on Track status	
Plants					
Psychotria lorentzii	-	Near threatened	-	Data deficient	
Animals					
Caretta caretta	loggerhead turtle	Endangered	Endangered	High	

Scientific name	Common name	Nature Conservation Act 1992 status	Environment Protection and Biodiversity Conservation Act 1999 status	Back on Track status
Chelonia mydas	green turtle	Vulnerable	Vulnerable	Critical
Crocodylus porosus	estuarine crocodile	Vulnerable	-	Low
Eretmochelys imbricata	hawksbill turtle	Vulnerable	Vulnerable	Critical
Esacus magnirostris	beach stone-curlew	Vulnerable	-	High
Numenius madagascariensis	eastern curlew	Near threatened	-	Low
Haematopus fuliginosus	sooty oystercatcher	Near threatened	-	Low
Sternula albifrons	little tern	Endangered	-	High

Table 3: Species listed in international agreements

Scientific name	Common name	Bonn	САМВА	JAMBA	ROKAMBA
Anous stolidus	common noddy	✓	<b>✓</b>	-	-
Arenaria interpres	ruddy turnstone	✓	<b>✓</b>	-	-
Calidris ruficolis	red-necked stint	✓	<b>√</b>	✓	<b>✓</b>
Caretta caretta	loggerhead turtle	✓	-	-	-
Charadrius mongolus	lesser sand plover	✓	<b>√</b>	✓	<b>✓</b>
Chelonia mydas	green turtle	✓	-	-	-
Crocodylus porosus	estuarine crocodile	✓	-	-	-
Cuculus optatus	oriental cuckoo	-	<b>√</b>	<b>✓</b>	<b>✓</b>
Danaus plexippus plexippus	monarch	✓	-	-	-
Eretmochelys imbricate	hawksbill turtle	✓	-	-	-
Fregata ariel	lesser frigate bird	✓	-	<b>✓</b>	<b>✓</b>
Fregata minor	great frigatebird	✓	✓	✓	-
Haliaeetus leucogaster	white-bellied sea-eagle	✓	✓	-	-
Hydroprogne caspia	Caspian Tern	✓	<b>√</b>	-	-
Limosa lapponica	bar-tailed godwit	✓	<b>√</b>	✓	✓
Merops ornatus	rainbow bee-eater	✓	-	✓	-
Numenius madagascariensis	eastern curlew	✓	<b>✓</b>	✓	✓
Numenius minutus	little curlew	✓	✓	✓	✓

Scientific name	Common name	Bonn	САМВА	JAMBA	ROKAMBA
Numenius phaeopus	whimbrel	✓	✓	✓	✓
Onychoprion anaethetus	bridled tern	✓	✓	✓	-
Pandion cristatus	eastern osprey	✓	-	-	-
Pluvialis fulva	Pacific golden plover	✓	-	-	✓
Rhipidura fuliginosa	grey fantail	✓	✓	✓	✓
Sternula albifrons	little tern	✓	✓	✓	✓
Sterna dougallii	roseate tern	✓	✓	✓	-
Sterna sumatrana	black-naped tern	✓	✓	✓	-
Sula leucogaster	brown booby	✓	✓	✓	✓
Tringa brevipes	grey-tailed tattler	✓	✓	✓	✓
Tringa hypoleucos	common sandpiper	✓	✓	✓	<b>√</b>

Bonn - Bonn Convention

CAMBA - China-Australia Migratory Bird Agreement

JAMBA – Japan–Australia Migratory Bird Agreement

ROKAMBA – Republic of Korea–Australia Migratory Bird Agreement