# MARYLAND NATIONAL PARK PLAN OF MANAGEMENT

NSW National Parks and Wildlife Service

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Maryland National Park: Plan of Management

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#### MANAGEMENT CONTEXT

### **National Parks in New South Wales**

The National Parks and Wildlife Act 1974 (NPW Act) requires a plan of management to be prepared for each national park. A plan of management is a legal document which outlines how a national park will be managed in the years ahead.

Once the Minister has adopted the plan, no operations may be undertaken within the Park except in accordance with the plan.

For the purpose of preparing this plan of management, the Service has adopted the International Union for the Conservation of Nature and Natural Resources (IUCN) - the World Conservation Union - definition of a national park, ie. a national park is:

"A natural area of land and/or sea, designated to (a) protect the ecological integrity of one or more ecosystems for present and future generations, (b) exclude exploitation or occupation inimical to the purpose of designation of the area, and (c) provide a foundation for spiritual, educational, recreational and visitor opportunities, all of which must be environmentally and culturally compatible."

The NPW Act requires that in the preparation of plans of management, consideration will be given to the following objectives:

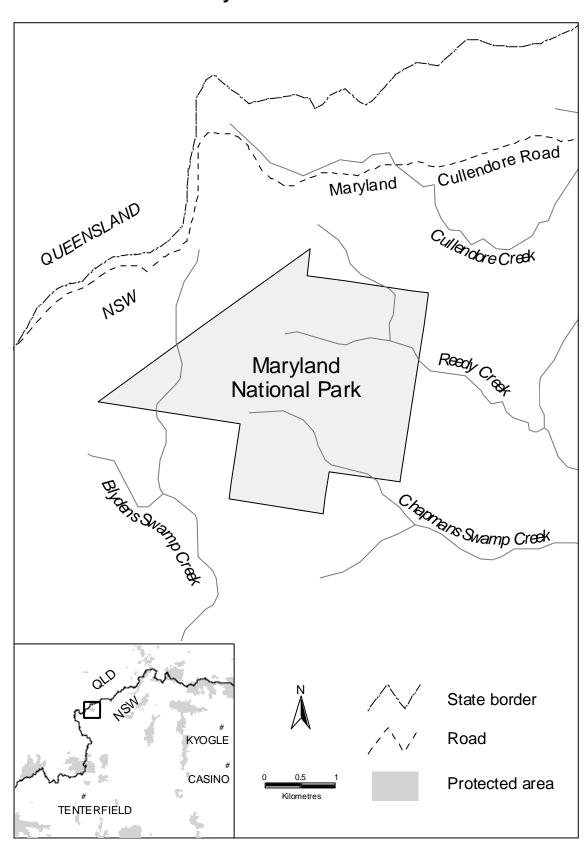
- protection and preservation of the scenic and natural features;
- conservation of wildlife (including the conservation of critical habitat and threatened species, populations and ecological communities and their habitat) and the maintenance of natural processes;
- preservation of Aboriginal sites and historic features;
- provision of appropriate recreational opportunities; and
- encouragement of scientific and educational inquiry into environmental features and processes, and prehistoric and historic features.

# **Specific Management Objectives for Maryland National Park**

In addition to the above, the management objectives for Maryland National Park (the Park) are:

- To manage the Park as a remnant of the Stanthorpe granite country;
- To allow the forest regrowth to continue by minimising threatening processes to regrowth such as fire and cattle grazing; and
- To develop a cooperative working relationship with Park neighbours to reduce cattle
  incursions into the Park; encourage the conservation of adjoining natural areas (thus
  enhancing the ecological viability of this small park); and encourage a coordinated fire
  management strategy for the Park and adjoining properties.

# **Maryland National Park**



#### **BASIS FOR MANAGEMENT**

## **Regional Context and Dedication**

Maryland National Park is located on the granitic northern tablelands close to the Queensland border, in the Shire of Tenterfield. The Park was formerly Maryland State Forest and was gazetted as a national park on 1st March 1999.

The area of the Park is 891ha and it is situated approximately 20km north-east of Stanthorpe, 50km west of Urbenville and 60km north of Tenterfield in far northern New South Wales. Maryland National Park is surrounded entirely by private property, much of which retains a natural vegetation cover.

The Park is close to a number of other protected areas, including Bald Rock, Boonoo Boonoo, Koreelah, and Tooloom National Parks, Captains Creek Nature Reserve, Girraween and Sundown National Parks (both in Qld). Except for Maryland National Park and Captains Creek Nature Reserve, all the parks provide recreation facilities.

## Natural and Cultural Heritage Values – A Summary

## Geology, Topography, Soils and Climate

The Park is at the northern extremity of the New England Tableland's granite belt that covers an area of 2,500 square km, extending from Tamworth to southern Queensland. The granite belt was created by a large intrusion of molten rock more than 225 million years ago into the older sedimentary and volcanic rocks. This huge granitic formation is known as the New England Batholith.

The park contains hilly granite terrain between 770 and 920m elevation and receives an annual rainfall of 800-1000mm. Runoff drains east and south through Reedy Creek and Chapmans Swamp Creek (see the map), which are tributaries to the Maryland River, which in turn is a tributary of the Clarence River.

The soils derived from the weathered granite are poor in nutrients, well drained and susceptible to accelerated erosion if disturbed.

#### **Native Flora and Fauna**

The granitic soils of Maryland National Park support mainly dry open eucalypt forest typical of the Stanthorpe granite country and New England Batholith. These forest communities support a diverse flora including potential habitat for rare and threatened plants, however no extensive botanical surveys have been carried out to date.

The major forest types in the Park have been identified as:

(i) New England blackbutt (*Eucalyptus andrewsii*);

- (ii) Forest red gum (*E. tereticornis*) grey gum (*E. punctata*) / grey ironbark (*E. paniculata*) rough barked apple (*Angophora floribunda*); and
- (iii) A combination of round-leaved gum (*E. deanei*) and forest type (ii).

Almost 400 hectares of the Park is classified as old growth forest. Large old growth brush box (*Lophostemon confertus*) and significant stands of mature forest oaks (*Allocasuarina* sp.) are distinctive features in the Park.

Considering its dry sclerophyll vegetation, the park is likely to have been subjected to and shaped by the Aboriginal use of fire for thousands of years. The fire regime employed by European landholders, however, tends to differ in intensity and frequency. As a result of the wildfire in 1997, the Park now contains extensive areas of prolific regrowth, especially of *Acacia* and *Eucalyptus* species.

With its large stands of old-growth forest, Maryland National Park provides refuge for many threatened animal species. A number of these have been recorded in the park including the glossy black-cockatoo (*Calyptorhynchus lathami*), powerful owl (*Ninox strenua*), tiger quoll (*Dasyurus maculatus*), koala (*Phascolarctos cinereus*) and the little bent-wing bat (*Miniopterus australis*). As part of the habitat modelling undertaken during the Comprehensive Regional Assessment (CRA) process, it was predicted that the Park is likely to support another 31 threatened or otherwise significant fauna species.

## **Cultural Heritage**

Although there is no documented chronology of Aboriginal occupation in the district, it is believed that the Park is where a number of Aboriginal tribal boundaries converged. No Aboriginal sites have yet been recorded in the Park, although it has not been surveyed in detail. The entire Park falls within the area of the Muli Muli Aboriginal Land Council, based in Woodenbong.

European settlement of the Northern Tablelands commenced in the 1840s. Previously, as Maryland State Forest, the Park was used for selective timber harvesting and grazing under license. While the history of the Park is of interest, no historic sites have been recorded.

#### Threats to Park Values

The Park is relatively undisturbed given its history of selective logging and grazing, although some disturbance has occurred through frequent wildfire and there are some minor weed infestations.

#### Fire

The NPWS recognises that fire is a natural phenomenon, however, the frequency of fire, its intensity, and the season in which it occurs are some of the major factors influencing the distribution of flora and fauna species and vegetation communities. Inappropriate fire

management practices have the potential to cause localised extinction of some flora and fauna species.

The Park has been subject to frequent wildfires, as well as fuel reduction burning. A high proportion of fires occurring in the Park have been caused by fuel reduction burns escaping from neighbouring properties. The last fire, which burnt virtually the whole Park, occurred in 1997. Initial assessment suggests that a reduction in fire frequency may be necessary to maintain floristic diversity and allow time for the forest regrowth to establish after the 1997 fire.

Further unplanned burning of the Park could be particularly damaging to the prolific forest regrowth following the 1997 wildfires. This natural regeneration is helping to ameliorate the impact of recent logging operations undertaken prior to the declaration of the Park, but repeated burning will destroy the regrowth if allowed to occur before it is fire tolerant.

The NPWS is committed to preparing a fire management plan for the Park. Fire management planning and operations will include the protection of the Park's threatened species.

## **Introduced Species**

Introduced plants are generally the result of disturbance to natural ecosystems from past land uses and have the potential to adversely affect the viability and biodiversity of native vegetation communities.

No detailed assessment has been undertaken of the introduced species present in the Park, however, the Park is generally free of any significant weed infestations. Initial assessment shows the presence of isolated occurrences of lantana (*Lantana camara*) and Parramatta grass (*Sporobolus africanus*) that is capable of eradication.

Foxes, pigs and feral cats have been recorded in the Park. Park neighbours have also sighted deer. Further research into the presence of vertebrate pest species is required.

The Park had a history of cattle grazing under an Occupational Permit which expired on 30th June 2000. No further grazing will be permitted. To prevent the occasional incursion of neighbouring cattle into the Park, some boundary fences require maintenance and fences need checking after fire.

# **MANAGEMENT STRATEGIES**

Current Situation	Desired Outcomes	Strategies and Actions	Priority
Native Flora and Fauna The Park contains a large proportion of old growth forest. No detailed flora surveys have yet been undertaken, however, the park is believed to support a diverse range of fauna including a number of threatened species. Neighbouring properties have been offered for sale to NPWS, which would significantly increase the size and ecological viability of the Park.	There is no reduction in the diversity of native fauna and	<ul> <li>Monitor regrowth of vegetation following fires and the cessation of grazing.</li> </ul>	Medium
	flora in the Park.  • Vulnerable and endangered	Encourage research into the ecological requirements of the Park's native flora and fauna.	Medium
	<ul> <li>species are not further threatened.</li> <li>A better knowledge is gained of</li> </ul>	Undertake flora and fauna surveys to improve data for the area and ascertain the presence and abundance of threatened species in the Park.	High
	the Park's flora and fauna communities and their ecological requirements.  • Protection of adjoining native vegetation to maintain wildlife corridors and enhance ecological viability of the Park.	Encourage neighbouring property owners to protect native vegetation on their property where properties have high natural values or add ecological integrity to the Park.	Medium
		<ul> <li>Investigate the natural and cultural values of any adjoining property offered for sale and recommend acquisition where it would significantly benefit the Park.</li> </ul>	High
Cultural Heritage No cultural heritage sites (Aboriginal or historic) have been recorded in the Park.	<ul> <li>Any cultural heritage sites in the Park are recorded.</li> <li>Any cultural heritage sites</li> </ul>	Undertake an archaeological survey of the Park on an opportunistic basis (for instance, undertake a survey for stone artefacts after the next fire).	Medium
	recorded are adequately protected, and where appropriate, with the involvement of the local	Encourage the involvement of the local Indigenous and non-Indigenous community in the identification and protection of any cultural heritage sites that may be identified.	Medium
	Indigenous and non-Indigenous community.	<ul> <li>Undertake an oral history of the cultural values (Aboriginal and historic) of the Park with the local community.</li> </ul>	Low

<b>Current Situation</b>	Desired Outcomes	Strategies and Actions	Priority
Introduced Species Parramatta grass, lantana, foxes, feral cats, pigs and deer have	<ul> <li>Parramatta grass and lantana are eradicated from the Park.</li> <li>Foxes, pigs and other</li> </ul>	<ul> <li>A pest species plan, which includes identification, control and monitoring of pest species, will be prepared and implemented.</li> </ul>	Medium
been found in the Park. Further research is needed to determine the presence of other introduced species.  Cattle sometimes enter the park	significant vertebrate pest species are controlled.  • Other pest species are identified and appropriate strategies undertaken for their	<ul> <li>An eradication program will be undertaken for Parramatta grass and lantana in the Park.</li> <li>The spread of Parramatta grass will be prevented through denying public vehicle access, excluding stock and ensuring equipment hygiene.</li> </ul>	High
through poorly maintained and fire damaged sections of the boundary	<ul><li>control and monitoring.</li><li>Cattle grazing in the Park</li></ul>	<ul> <li>Fox baiting, and the control of any other significant pest species, will be undertaken in the Park.</li> </ul>	Medium
fence.	<ul><li>ceases.</li><li>Fencing is adequate to exclude stock.</li></ul>	<ul> <li>Grazing under the Occupational Permit that expired on 30 June 2000 will not be renewed.</li> <li>The NPWS will seek to enter into a fencing</li> </ul>	High
		agreements with neighbours in accordance with the Service's fencing policy.	High

Current Situation	Desired Outcomes	Strategies and Actions	Priority
Fire Management  Maryland National Park has been subject to frequent wildfire, with the	<ul> <li>There is no loss of life or property due to fire on the Park.</li> <li>A system of fire trails and</li> </ul>	<ul> <li>Suppress all wildfires on the Park as quickly as possible.</li> <li>Prepare a fire management plan for the Park.</li> </ul>	High High
last occurring in 1997. Further fire during the period of this plan could damage the regrowth established since the 1997 fire.  Burning prescriptions and other	firebreaks adequately protect the Park.  • Fire is excluded from the Park for five to ten years to allow regrowth to establish.	Pending preparation of the fire management plan, fire management activities in the park shall be in accordance with the Bushfire Risk Management Plan prepared by the Tenterfield Bushfire Management Committee.	High
management strategies must take into account the effects of proposed actions on plant and animal species.  A fire management plan is yet to	Information regarding appropriate fire regimes and local vegetation response to fire is obtained.	Monitor the re-establishment of native vegetation (following the impacts of the 1997 fires and past logging operations) by excluding fire from the Park (subject to the proposed fire management plan) while ensuring the protection of life and property.	High
be prepared for the Park, although NPWS is represented on the Tenterfield Bushfire Management Committee which is developing a		<ul> <li>Liaise with neighbours to ensure their fuel reduction burning does not adversely impact upon the Park.</li> <li>Negotiate with park neighbours to establish fire breaks on private property around the park in</li> </ul>	Medium High
Bushfire Risk Management Plan.		<ul> <li>accordance with the fire management plan and having consideration to possible future additions to the Park.</li> <li>Only existing fire trails will be used, with no new fire trails being constructed in the Park.</li> </ul>	i iigii

<b>Current Situation</b>	Desired Outcomes	Strategies and Actions	Priority
Vehicular Access The only practical access to the	Adequate access to and within the Park is maintained for	Public vehicular access will not be provided or permitted in the Park.	Low
Park is across private property. There is no constructed public access road to the Park. The	<ul><li>emergency and management purposes only.</li><li>Soil erosion from management</li></ul>	Access for management and emergency vehicles will be sought through agreement with park neighbours.	High
surveyed road reserve to the Park is impractical for construction.	tracks in the Park is minimal.	The internal north-south track will be maintained as a fire trail.	High
One internal track within the Park was previously used for forestry operations. It is trafficable to 4wd vehicles although a log bridge over		The collapsed bridge over Reedy Creek (on the north-south track) will be replaced by a suitable crossing, while ensuring minimum disturbance to the creek.	High
Reedy Creek has collapsed. This track is important for fire protection purposes. The granitic soils in the Park are especially prone to soil erosion.		To minimise soil erosion, slashing of management tracks will be undertaken in preference to grading.	Medium
Recreation	No visitor infrastructure is	No visitor facilities will be provided in the Park.	Low
There is currently a negligible level	provided.	Horse riding will be prohibited in the Park.	Medium
of public use. No visitor facilities occur in the Park, but other parks	No horse riding or public motorised vehicle use occurs in	<ul> <li>Public use of any motorised vehicle is prohibited in the Park.</li> </ul>	Medium
nearby provide an extensive range	the Park.	The lighting of fires (eg. campfires) will be prohibited	High
of visitor facilities and recreation	Environmental impact from	in the Park.	
opportunities. The only practical access to the Park is through private property.	<ul><li>visitors is negligible.</li><li>Self-reliant bushwalking and bush camping may occur.</li></ul>	<ul> <li>Bushwalking and bush camping (no wood fires) are permitted in the Park (subject to access approval from neighbours to cross their property).</li> </ul>	Low

#### Legend for priorities

**High** priority actions are those imperative to the achievement of management objectives identified in this Plan. They need to be implemented in the near future to prevent degradation of the natural and cultural values or physical resources of the Reserve, may incur significant costs associated with rehabilitation at a later date, and/or present an unacceptable risk to the public.

**Medium** priority actions are those that are necessary to achieve management objectives but will be implemented as resources become available because the time frame for their implementation is not urgent.

**Low** priority actions are desirable to achieve management objectives but can wait until resources become available.

#### **Environmental Impact Assessment**

An assessment under Part 5 of the *Environmental Planning and Assessment Act 1979* is to be undertaken prior to the carrying out of any works within Maryland National Park.

#### **FURTHER INQUIRIES**

Inquiries should be directed to the Ranger, Kyogle Area Office, 136 Summerland Way, Kyogle, on (02) 6632 0000.