

NSW FOREST AGREEMENTS AND INTEGRATED FORESTRY
OPERATIONS APPROVALS

NSW Forest Agreements

Implementation Report

Upper North East

Lower North East

Eden

Southern regions

2005/2006



NEW SOUTH WALES GOVERNMENT

Minister for Climate Change and the Environment

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A report prepared as part of the implementation of the
NSW forest agreements and integrated forestry
operations approvals

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INFORMATION



This project has been coordinated by Resource and Conservation Unit of Department of Environment and Climate Change [formerly the Resource and Conservation Division of the Department of Planning; or Forestry and Rural Industry Policy within Department of Natural Resources].

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Foreword

The Hon Peter Primrose MLC
President of the Legislative Council
Parliament House
Macquarie Street
Sydney NSW 2000

The Hon Richard Torbay MP
Speaker of the Legislative Assembly
Parliament House
Macquarie Street
Sydney NSW 2000

Dear Mr Primrose and Mr Torbay

I have pleasure in presenting to Parliament the seventh annual implementation report on the NSW forest agreements and integrated forestry operations approvals. There are four NSW forest agreement and four integrated forestry operations approvals in place, which cover the Upper North East, Lower North East, Eden and Southern regions of New South Wales.

In accordance with section 21(1) and 21(2) of the *Forestry and National Park Estate Act 1998*, this report provides progress on the implementation of the NSW forest agreements and integrated forestry operations approvals for the period 1 July 2005 to 30 June 2006.

Progress is reported by:

- the achievement of milestones defined in each of the four NSW forest agreements;
- results of monitoring the ecologically sustainable forest management criteria and indicators; and
- compliance with the integrated forestry operations approvals for each region.

The report demonstrates continuous improvement in the management of the New South Wales public forest estate and progress towards ecologically sustainable forest management.



Carmel Tebbutt MP

Deputy Premier

Minister for Climate Change and the Environment

Executive summary

This is the seventh annual report on the implementation of the NSW forest agreements and integrated forestry operations approvals (IFOAs), prepared under section 21 of the *Forestry and National Park Estate Act 1998*.

There are four NSW forest agreements and IFOAs in place, covering the Upper North East (UNE), Lower North East (LNE), Eden and Southern regions. The agreements and approvals for the UNE, LNE and Eden regions were put in place in 1999, followed by those for the Southern region in 2002.

These agreements and approvals provide a strategic and operational framework to manage public forests in New South Wales, with the overall objective of achieving ecologically sustainable forest management (ESFM).

Progress towards meeting this objective is partially achieved by regular reporting of the:

- achievement of a range of undertakings or 'milestones', defined in each of the NSW forest agreements
- results of monitoring of the ESFM criteria and indicators
- compliance with the IFOAs of harvesting activities in State forests and other Crown timber lands.

The implementation of the agreements and approvals is a cooperative undertaking between the Parks and Wildlife Division (PWD) and Environment Protection and Regulation Division (EPRD) of the Department of Environment and Conservation (DEC); Forests NSW and Fisheries of the Department of Primary Industries; and Forestry and Rural Industry Policy (FRIP) of the Department of National Resources (DNR). This report details activities related to implementation of the NSW forest agreements and IFOAs for the UNE, LNE, Eden and Southern regions during 2005/2006.

Milestone achievements and highlights

The continual achievement of milestones will assist progress towards ESFM of NSW forests. In 2005/2006, agencies continued to achieve or work towards the completion of milestones contained within the NSW forest agreements. There were also a number of significant achievements this year. Some of this year's highlights are:

Finalisation of Forests NSW's Regional ESFM Plans

Forests NSW finalised Regional ESFM plans for the UNE, LNE, Eden and Southern (Tumut and South Coast) regions this year that set out broad strategies, performance indicators and measurable outcomes for forest management. The plans also include the strategies that Forests NSW will put into practice to achieve its objectives in: natural heritage, Aboriginal cultural heritage, non-Aboriginal cultural heritage, protected areas, forest health, sustainable timber supply, economic development, social development, forestry operations, consultation, monitoring and reporting.

National Park Estate (Reservations) Act 2005

The *National Park Estate (Reservations) Act 2005* was assented to on the 17 November 2005. The Act has provided for the transfer of around about 6 100 hectares of State forest, in the Southern region, to national parks and state conservation areas.

Monitoring ESFM criteria and indicators

The criteria and indicators outlined in the forest agreements are one of the main ways of monitoring progress towards the achievement of ESFM. The ESFM criteria and indicators have now been monitored and reported for seven years for the UNE, LNE and Eden regions, and four years for the Southern region.

A number of other State, national and corporate monitoring and reporting processes have significantly evolved since the inception of the ESFM criteria and indicators, these include *State of the Parks* reporting and Forests NSW *SEEing* reporting. In 2005/2006, where possible, there has been a concerted effort to streamline ESFM criteria and indicator reporting with other monitoring processes. For example, PWD (DEC) will continue to provide *State of the Parks* survey data when they are available (every 2-3 years) and they meet ESFM indicator requirements. In addition, if other processes meet the requirements for indicators, links to other reports and media have been provided. This approach means that duplication of data provision and reporting is minimised and allows for improved integration and alignment of reporting processes.

Compliance of harvesting operations with integrated forestry operations approvals

The operational framework for carrying out forestry activities in State forests and other Crown timber lands is contained in the IFOAs for each region. Forests NSW is required to comply with the terms and licence conditions of the approvals when engaging in forestry activities in native forests. DEC (EPRD), DPI–Fisheries and DNR (FRIP) monitor Forests NSW's compliance with the terms and licence conditions of the IFOAs.

In 2005/2006, EPRD (DEC) did eight operational and planning audits of the Environment Protection Licences and Threatened Species Licences across the four regions that identified a total of 384 non-compliances. Forests NSW were then issued with three penalty notices, seven warning letters, two clean-up notices and were required to do remedial work at 56 sites, seek soil conservationist advice at 13 sites and provide an engineering assessment for one site. DPI–Fisheries did not report any breach of the Fisheries Licence.

Amendment number 4 for the Eden IFOA commenced in 2005/2006. This amendment defines 'exclusion zones' (where logging is prohibited) for giant burrowing frog (*Heleioporus australiacus*), southern brown bandicoot (*Isoodon obesusulus*) and the smoky mouse (*Pseudomys fumeus*) by a data layer/map, which is intended to protect the core habitat of the species in the Eden Region and turns off the need to search for the species in a pre-harvest survey. The amendment operates until the end of February 2008, during which time the original conditions for the species concerned are suspended and DEC and Forests NSW will develop new permanent prescriptions for each animal.

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Acronyms and abbreviations

API	Aerial photograph interpretation
BMAD	Bell miner associated dieback
CRA	Comprehensive Regional Assessment
CRAFTI	Comprehensive Regional Assessment aerial photo interpretation
CSIRO	Commonwealth Scientific and Industrial Research Organisation
DAFF	Australian Government Department of Agriculture, Fisheries and Forestry
DEC	Department of Environment and Conservation
DNR	Department of Natural Resources
DPI	Department of Primary Industries
EFT	equivalent full-time
EMS	Environmental management system
EPRD	Environment Protection and Regulation Division (part of the Department of Environment and Conservation)
EPA	Environment Protection Authority
ESFM	ecologically sustainable forest management
FNSW	Forests NSW
FRAMES	Forest Resource and Management Evaluation System
FRIP	Forestry and Rural Industry Policy
GIS	geographic information system
HCVOG	high conservation value old growth
IFOA	Integrated Forestry Operations Approval
ISO	International Organisation for Standardisation
LNE	Lower North East
MIG	Montreal Process Implementation Group

NPWS	National Parks and Wildlife Service (now encompassed within PWD)
PWD	Parks and Wildlife Division (part of the Department of Environment and Conservation)
RFA	Regional Forest Agreement
RLPB	Rural Lands Protection Board
SEEDS	Social, Environmental and Economic Database System
SEEing	Social, Environmental and Economic Report
UNE	Upper North East
VCA	Voluntary Conservation Agreement (as per the <i>National Parks and Wildlife Act 1974</i>)
VDS	Visitor Data System
<i>Wildlife Atlas</i>	Atlas of NSW Wildlife

Glossary

batter – an earth slope formed by the placing of fill material or by cutting into the natural hillside.

biodiversity – the variety of life forms, the different plants, animals and microscopic organisms, the genes they contain and the ecosystems they form.

CAR reserve system – the establishment of a CAR reserve system is one of a number of arrangements put in place as a result of the joint State/Commonwealth *National Forest Policy Statement* (Commonwealth, 1992). The national reserve system, or CAR reserve system, aims to ensure the protection of a range of forest values. The acronym 'CAR' defines the goals of the reserve system: *Comprehensive* – full range of forest communities recognised by an agreed national scientific classification at appropriate hierarchical levels; *Adequate* – the maintenance of ecological viability and integrity of populations, species and communities; *Representative* – those sample areas of the forest that are selected for inclusion in reserves should reasonably reflect the biotic diversity of the communities.

carbon sequestration – carbon sequestration in terrestrial ecosystems can be defined as the net removal of carbon dioxide from the atmosphere into long-lived pools of carbon, such that the carbon dioxide originally in the atmosphere effectively can no longer physically or chemically act as atmospheric carbon dioxide. The pools can be living, above ground biomass (e.g. trees); products with a long, useful life created from biomass (e.g. lumber); living biomass in soils (e.g. roots and micro organisms); or deeper subsurface environments, such as depleted oil and gas reservoirs, coal seams which cannot be mined, deep saline formations or deep ocean (Oak Ridge National Laboratory website: www.ornl.gov/).

Comprehensive Regional Assessment (CRA)/Regional Forest Assessment (RFA) – assessments made by the NSW Government and Australian Government agencies and community stakeholders that looked closely at the impacts of changes to forest use and management on the environment, economy and community. Included an assessment of natural, cultural, social and economic values.

dedicated reserve – reserve equivalent to IUCN Protected Area Management Categories I, II, III, IV, as defined by the IUCN Commission for National Parks and Protected Areas (1994). Dedicated reserves include, but are not limited to, parks under the *National Parks and Wildlife Act 1974* and flora reserves under the *Forestry Act 1916*. Status of reserves requires action by Parliament in accordance with legislation for reservation or revocation.

ecological community – an assemblage of species occupying a particular area.

ecologically sustainable forest management (ESFM) – the management of forests so they are sustained in perpetuity for the benefit of society, by ensuring that the values of forests are not lost or degraded for current and future generations.

ecosystem – communities of organisms and their physical environment interacting as a unit.

ecosystem health – the state of an ecosystem’s processes (energy, nutrient, hydrological and biological), which maintain the vitality of the system.

ecosystem vitality – the ability of an ecosystem to perpetuate itself.

filter strip – a strip of vegetation or groundcover along each side of a watercourse/drainage line retained for the purposes of retarding/reducing the lateral flow of runoff and sediment movement into the watercourse/drainage line and to reduce the risk of channel and stream bank erosion.

forest – a vegetation type dominated by woody vegetation having a mature or potential mature stand height exceeding five metres, with an overstorey canopy cover greater than 20%.

Forest Management Zone (FMZ) – a land classification system that sets out management intent across State forests and differentiates between those areas of State forest set aside for conservation and those areas available for timber harvesting and other activities.

Forest Resource and Management Evaluation System (FRAMES) – Forests NSW’s statewide forest resource inventory, growth modelling, simulation and harvest scheduling system for public native forest resources in New South Wales.

forest type – a class in the hierarchy of vegetation classification of forests characterised by the taxonomic and or structural composition of canopy trees (usually by a dominant species).

gazettal – the formal process by which land becomes part of the NSW parks system, announced by a notice published in the NSW Government Gazette.

habitat – the living space of a species or community that provides a particular set of environmental conditions.

informal reserve – a reserve that contains and is managed for conservation values that contribute to the CAR reserve system, and which meets the principles for informal reserves as described in the JANIS report.

JANIS report – the Joint Australian and New Zealand Environment and Conservation Council (ANZECC)/Ministerial Council on Forestry, Fisheries and Aquaculture (MCFFA) National Forests Policy Statement Implementation Sub-committee report, *Nationally Agreed Criteria for the Establishment of a Comprehensive, Adequate and Representative Reserve System for Forests in Australia* (Commonwealth, 1997).

native forest – any locally indigenous forest community containing the full complement of native species and habitats normally associated with that community, or which could develop those characteristics.

old growth – forest that is ecologically mature and has little disturbance by such activities as logging, building roads or clearing. The definition focuses on forest in which the upper layer or overstorey is in the late mature to over mature growth phases.

plantation – intensively managed stands of trees of either native or exotic species, created by the regular placement of seedlings or seed.

public forest – any forest on Crown land for which management responsibility has been delegated to government agencies, local government or other instrumentalities.

snig track – a track along which snigging equipment (i.e. wheeled or tracked vehicles) travels.

species – a group of organisms that are biologically capable of breeding and producing fertile offspring with each other but not with other organisms in other groups.

State forest – land dedicated under the *Forestry Act 1916*.

sustainable yield – the long-term estimated wood yield from forests that can be maintained from a given region in perpetuity under a given management strategy and suite of sustainable use objectives.

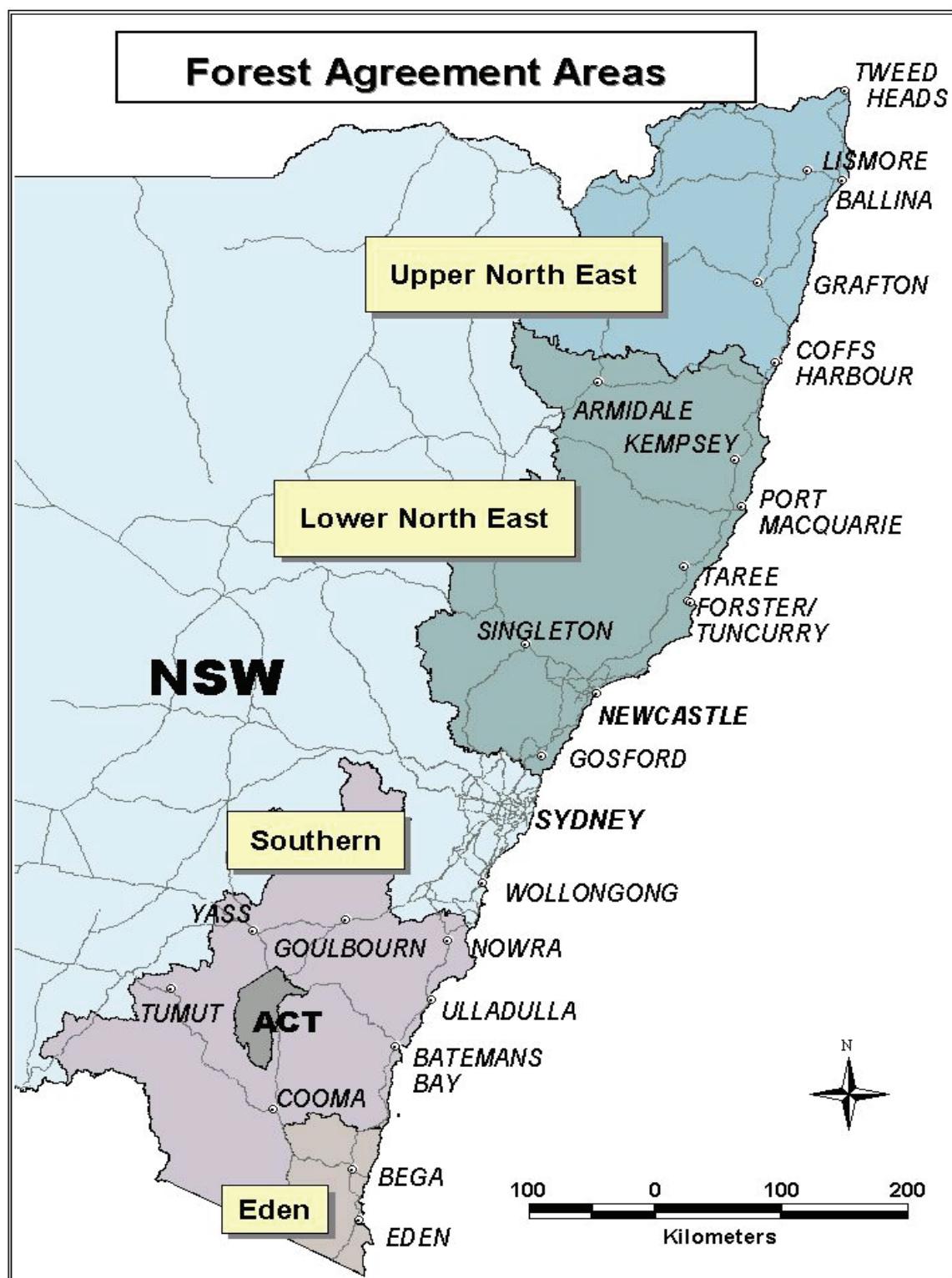
taxa —categories in the biological classification system for all living organisms. Taxa (singular: taxon) are used to organise information about the natural world.

tenure – title to land as controlled by legislation.

threatened species – any species of plant or animal listed under Schedule 1 Part 1 (endangered species), Schedule 1 Part 4 (presumed extinct) and Schedule 2 (vulnerable species) of the *Threatened Species Conservation Act 1995* or Part 7A of the *Fisheries Management Act 1994*.

threatening process – a process that threatens, or may have the capability to threaten, the survival or evolutionary development of species, populations or ecological communities

Map 1-A: NSW forest agreement regions



i

Introduction

This is the seventh annual report on the implementation of the NSW forest agreements and integrated forestry operations approvals (IFOAs). It provides details on the progress of the forest agreements and IFOAs applying to the Upper North East (UNE), Lower North East (LNE), Eden and Southern regions. This report is a requirement under section 21 of the *Forestry and National Park Estate Act 1998*.

The forest agreements and IFOAs provide a strategic and operational framework for achieving ecologically sustainable forest management (ESFM). ESFM is a key objective of the NSW Government's forest policy.

Progress towards ESFM is partially achieved by regular reporting on the:

- achievement of milestones as defined in the NSW forest agreements
- results of monitoring the ESFM criteria and indicators
- compliance of harvesting activities in State forests and other Crown timber lands with the IFOAs.

The ongoing implementation of the agreements and approvals is a cooperative undertaking between various sections of Department of Environment and Conservation (DEC) (including Parks and Wildlife Division(PWD)¹ and Environment Protection and Regulation Division (EPRD)²), the Department of Primary Industries (DPI) – Fisheries and Forests NSW and Forestry and Rural Industry Policy (FRIP) of the Department of Natural Resources (DNR)³. Together, these agencies manage New South Wales public forests in the UNE, LNE, Eden and Southern regions and their collective work in 2005/2006 produced significant advances in the management of New South Wales public forests.

Structural changes

In August 2005, the Department of Infrastructure Planning and Natural Resources (DIPNR), was restructured into two separate departments, the Department of Natural Resources (DNR) and the Department of Planning. As part of the restructure, FRIP was accommodated within DNR. As of the 1st of July 2006, FRIP will be transferred to the NSW Premier's Department and be called the Resource and Conservation Unit.

Forests NSW is in its second year of operation as a public trading enterprise within NSW Department of Primary Industries (DPI). In addition DEC finalised its organisational restructure this year.

¹ PWD encompasses the National Parks and Wildlife Service.

² The EPRD contains staff from the Forestry Policy and Regulation Section who have responsibility for auditing Forests NSW's compliance with the Environment Protection Licences and Threatened Species Licences within IFOAs.

³ References to agencies are as they were known at 30 June 2006.

Report structure

Progress on the implementation of the NSW forest agreements and IFOAs is presented in three parts:

Chapter 1 provides some discussion on the progress of milestones defined in any agreement, as well as broader discussion on other government initiatives and activities which are contributing to the sustainable management of New South Wales forests. Specific details on the progress of individual milestones, as defined in the agreements, are provided in appendix 1.

Chapter 2 is a summary of the results of monitoring of the ESFM criteria and indicators. It presents the results of monitoring, key outcomes and any where practicable, identifiable trends. Note that trends presented are generally only indicative at this stage and in many cases require more detailed and technical interpretation.

Chapter 3 provides details for Forests NSW's compliance with the terms and conditions of the IFOAs for each region. Regulatory agencies report results of auditing of terms of licences; Forests NSW reports the results of its internal compliance monitoring and achievement of non-liscence requirements under the IFOAs.

Conclusion

These agreements and approvals continue to provide an unambiguous framework for the achievement of ESFM. This report involves contributions from all the agencies involved in the implementation of these agreements and approvals and it continues to be an integral measure of progress toward the achievement of ESFM. Over the past seven years there has been a sustained and adaptable approach toward the achievement of this goal.

1

Milestone achievements and highlights

The following chapter outlines some of the significant achievements that occurred during 2005/2006. The information presented below include specific milestones required by the agreements, as well as other activities that are part of broader government initiatives which are also assisting in the sustainable management of forests in New South Wales. See appendix 1 for details on the progress of individual milestones, as listed in the agreements.

National Park Estate (Reservations) Act 2005

The *National Park Estate (Reservations) Act 2005* was assented to on the 17 November 2005. The Act has provided for the transfer of around about 6 100 hectares of State forest, in the Southern region, to national parks and state conservation areas. This brings the total forested area of the DEC estate in the south-east to more than 808 000 hectares. At the same time, 364 000 hectares of native forest will remain as State forest, which will support sustainable timber production for the region.

Under the decision, 3 033 hectares of the Monga State Forest has been added to the Monga National Park and State Conservation Areas. Nearly 2 790 hectares in the upper reaches of the Deua River catchment in the Dampier State Forest has been added to Deua National Park.

About 290 hectares of forest east of the Princess Highway near Termeil has become an extension of the Murramarang National Park – including the area surrounding the famous giant spotted gum known as 'Old Blotchy'.

In addition the Act provided for an estimated total of 23 838 hectares of State forest (in the South Coast and Tumut sub-regions of Southern region and in the Eden region) to be classified as special management zones under section 21A of the *Forestry Act 1916*.

Forests NSW EMS

In 2005/2006, further refinements to Forests NSW EMS occurred as a result of implementing findings from internal audits carried out in Native Forest Operations Branch in 2004/2005. These refinements included minor amendments to ESFM Plans and the production of a revised environment policy.

The EMS system has also progressed through the development of procedural draft documents within Planted Forests Operations Branch. In 2005/2006, FNSW planted forest regions have been drafting Regional ESFM plans, ESFM supplementary documents and implementing local EMS regional documents (including a communication strategy, EMS procedures supplement, pests and weeds management plans, a regional audit plan and the regional road management plans).

Forests NSW is also working toward certification of its EMS under the International Organisation for Standardisation (ISO) 14001 standard, with the expectation of gaining ISO 14001 next year. Forests NSW EMS went through the first stage of an independent audit by an external ISO 14001 EMS certification company towards the end of this reporting period.

In addition, Forests NSW is still considering which one of two certifying systems (Australia Forest Standard or Forest Stewardship Council) will be most appropriate in the Australian context. It is hoped that when the certification model is chosen that Forests NSW forests will be certified toward the end of 2006.

DEC EMS (including State of the Parks)

The concept of an EMS for park management is being delivered through a Park Management Program, which will define DEC's values and objectives for park management, and integrate park policy, planning, operations, monitoring, evaluation, reporting and feedback. It will improve the way DEC goes about its park management by:

- providing clear, consistent management objectives and operational procedures
- introducing an integrated system to achieve consistent standards in our park management
- improving PWD's ability to demonstrate and report on performance.

The program will develop systems that will provide for improved coordination across the PWD and make it easier for staff to access information to guide park management. These systems will promote a consistent whole-of-state approach to park management and provide for the transfer across PWD branches and regions of good ideas for improvement in park management.

The Park Management Program provides tools to make better decisions. It will require some cultural change, but the benefits will be a more efficient, effective organisation and improved conservation outcomes.

The initial focus is on-park management with the intention of adding off-park management later. The program links with, and builds on, existing processes, policies, procedures and guidelines and develops new ones. The *State of the Parks* program is one of the projects encompassed by the Park Management Program.

The NSW *State of the Parks* program aims to:

- improve the understanding of the condition of and pressures on the park system
- evaluate the effectiveness of management activities against objectives and planned outcomes
- inform planning and decision-making at all levels of management – from statewide to the park level – leading to more effective management
- measure the establishment of the NSW park system
- assist in the allocation of funding and resources

- promote effective communication of our management performance to communities (i.e. through the State of the Parks report).

The *State of the Parks* program provides a systematic approach to meeting this challenge. The survey was developed by some of the world's leading experts, based on an internationally endorsed model of management effectiveness. However, while similar programs are in use in other countries around the world, the NSW Government is one of the first to use such a large-scale program on such a large scale across an entire park system.

During 2004/2005, as part of the *State of the Parks* program, a *State of the Parks* survey was initiated using an on-line survey tool. Evaluations were based on the best information available for each park assessed and captured both quantitative and qualitative data. The *State of the Parks* web survey was completed for 665 parks during the second half of 2005. After an initial data collation period, a team of independent representatives from the NPWS Audit and Compliance Committee audited the questionnaire data. The audit confirmed the data collected through the questionnaire were sufficiently robust to be interpreted at a statewide level. Appropriate data from this survey were incorporated into the 2004/2005 *Forest Agreements Implementation Report*. A fourth *State of the Parks* survey is planned for 2007.

Finalisation of Forests NSW's Regional ESFM Plans

The UNE, LNE, Eden and Southern Forest Agreements contain requirements for Forests NSW to develop regional ESFM plans. In 2000, Draft ESFM Plans were prepared for the UNE, LNE and Eden regions. After stakeholder comment, these plans were redrafted for public display in mid-2005. Regional ESFM Plans for the South Coast and Tumut subregions of the Southern region were also drafted and put on public display in mid 2005.

In August 2005, all the regional ESFM plans were finalised. They are available at:
www.forest.nsw.gov.au/esfm/esfm.asp.

The plans set out broad strategies, performance indicators and measurable outcomes for forest management in the regions. They also include the strategies that Forests NSW will put into practice to achieve objectives in key areas of forest management. These include natural heritage, Aboriginal cultural heritage, non-Aboriginal cultural heritage, protected areas, forest health, sustainable timber supply, economic development, social development, forestry operations and consultation.

The regional ESFM plans will be periodically reviewed and also contain requirements for monitoring and reporting.

Living Parks – A Sustainable Visitation Strategy

In March 2006, following extensive consultation with key stakeholders, PWD released its statewide *Living Parks – Sustainable Visitation Strategy* for all lands reserved under the *National Parks and Wildlife Act 1974*.

The strategy aims to:

- Encourage visitors to national parks while ensuring native plants, animals and lands are conserved.
- Enhance the experience of park visitors and improve their awareness of parks' natural and cultural heritage values.
- Improve visitor management, facilities and services.
- Encourage new partnerships between DEC, the private and public sectors, Aboriginal communities and the general community.
- Provide a framework for sustainable investment in NSW parks, to benefit local and regional economies and involve Aboriginal people in visitor management.

There are 34 priority actions outlined in *Living Parks*, including the development of branch visitation management plans (BVMPs). These BVMPs will guide regional recreation and tourism planning on DEC estate. A framework for the development of these plans was completed in 2005/2006. The BVMPs are expected to be completed in 2008.

DEC – Threatened Species Reform – Priorities Action Statement

In October 2005, most of the *Threatened Species Legislation Amendment Act 2004* and remaining parts of the *Threatened Species Conservation Amendment Act 2002* commenced. These amendments provided for a range of reforms that allow for better integration of threatened species conservation with rural and land use planning, natural resource management and development assessment. One of the important reforms was a requirement for the development of a Threatened Species Priorities Action Statement (PAS).

The PAS specifies conservation strategies and actions to promote the recovery of each threatened species, population and ecological community and manage crucial threatening processes. The PAS contains approximately 10,000 actions, including those previously included in recovery plans, with some actions targeting specific species or geographic areas.

Non-quota timber volumes

In 2005/2006, 415 103m³ of non-quota logs were harvested from Forests NSW native forests and hardwood plantations across all regions. This is a slight decrease on the 416 934m³ of non-quota logs harvested in 2004/2005. A further 1 316 151m³ of non-quota sawlogs (including veneer and high quality large sawlogs) were harvested from Forests NSW softwood plantations (around a 3% increase on 2004/2005 figures) across all regions.

Non-quota pulp grade timber harvested from Forests NSW native forest and hardwood plantations in the UNE and LNE regions and from native forest in the Southern region totalled 212 450 tonnes in 2005/2006. This is about a 15% increase on 2004/2005 figures. Native forest and hardwood plantation pulp grade timbers for Eden region are not included here as they form part of the quota volumes designated in the IFOA. Quota volumes are reported under Criterion 2 in chapter 2 of this report.

Non-quota pulp grade timbers harvested from Forests NSW softwood plantations in 2005/2006 totalled 637 264 tonnes. No softwood pulp grade timbers were harvested from softwood plantations in the LNE regions during 2005/2006.

The volumes of non-quota timber harvested in 2005/2006 are provided in tables 1-1-A and 1-1-B.

Table 1-1-A: Volumes of timber products other than quota sawlogs from State forests – UNE and LNE regions – 2005/2006

Log type	Unit	UNE region			LNE region		
		Native forest	Hardwood plantation	Softwood plantation	Native forest	Hardwood plantation	Softwood plantation
Veneer*	m ³	n/a	n/a	38 191	n/a	n/a	864
High quality large*	m ³	n/a	n/a	54 024	n/a	n/a	0
High quality small	m ³	32 128	635	Included in above figure	26 144	3 172	0
Low quality	m ³	69 201	19 018		105 860	32 909	5 413
Poles/piles and girders	m ³	11 029	3 292	0	13 271	8 073	0
Fencing/landscape/sleepers (sawn)	m ³	0	0	0	1 888	0	0
Non-quota logs total	m³	112 358	22 945	124 147	147 163	44 154	6 277
Pulp grade	tonnes	11 846	7 347	3 778	69 513	27 657	0

* Veneer and high quality large sawlogs harvested from Forests NSW native forests and hardwood plantations comprise quota log volumes. Quota sawlog volumes are reported under Criterion 2 in chapter 2.

Source: Forests NSW data

Table 1-1-B: Volumes of timber products other than quota sawlogs from State forests – Eden and Southern regions – 2005/2006

Log type	unit	Eden region			Southern region		
		Native forest	Hardwood plantation	Softwood plantation	Native forest	Hardwood plantation	Softwood plantation
Veneer*	m ³	n/a	n/a	0	n/a	n/a	0
High quality large*	m ³	n/a	n/a	143 756	n/a	n/a	986 106
High quality small	m ³	1 681	0	Included in above figure	8 594	0	Included in above figure
Low quality	m ³	12 229	0	27 919	45 764	0	2 443
Poles/piles and girders	m ³	0	0	0	522	0	0
Preservation logs	m ³	0	0	16 516	0	0	8 981
Fencing/landscape/sleepers (sawn)	m ³	0	0	0	19 693	0	0
Non-quota logs total	m³	13 910	0	188 191	74 573	0	997 530
Pulp grade**	tonnes	n/a	n/a	114 114	96 087	0	519 372

* Veneer and high quality large sawlogs harvested from Forests NSW native forests and hardwood plantations comprise quota log volumes. Quota sawlog volumes are reported under Criterion 2, in chapter 2.

** Pulp grade timber volumes harvested from Forests NSW native forest in the Eden region comprise part of quota log volumes. Quota log volumes are reported under Criterion 2 in chapter 2.

Source: Forests NSW data

2

Monitoring ecologically sustainable forest management – criteria and indicators

Introduction

The NSW forest agreements and IFOAs set out the strategic and operational frameworks for the management of public forests in New South Wales. A key objective of the agreements and approvals is the achievement of ESFM. As a means to measure progress towards this objective, a set of criteria and indicators are applied to each region: the ESFM criteria and indicators.

Monitoring and reporting of these ESFM indicators commenced in 1999/2000 for the UNE, LNE and Eden regions and in 2002/2003 for the Southern region following the implementation of the forest agreements for each region.

Monitoring obligations

This chapter provides a summary of the results of monitoring for the ESFM criteria and indicators for the UNE, LNE, Eden and Southern regions during 2005/2006. The ESFM indicators are those described in table 1, attachment 9 of the UNE, LNE and Eden regions forest agreements and table 2, attachment 7 of the Forest Agreement for the Southern Region.

This chapter satisfies, in part, requirements under section 2.11.2 of the UNE, LNE and Southern regions forest agreements and section 2.10.2 of the Forest Agreement for the Eden Region, whereby 'reporting on indicators must contribute to the annual reports to Parliament by the Minister'.

These indicators are identical to the 'sustainability indicators' referred to in the NSW/Commonwealth North East, Eden and Southern Regional Forest Agreements (RFAs). This summary of monitoring also satisfies requirements under clause 49 of the North East RFA, clause 53 of the Southern RFA and clause 47 of the Eden RFA whereby the sustainability indicators must be monitored and reported against each year.

Using indicators to assess achievement of EFSM

The NSW Government's EFSM system translates the internationally accepted Montreal Process criteria for environmental protection of native forest ecosystems into day-to-day forest management. It is recognised as international best practice.

The ESFM criteria and indicators allow sustainability to be defined and measured. The system contains information about long-term management objectives for conservation, recreation and timber production in New South Wales. This report sets out achievements against those objectives.

The ESFM criteria and indicators do not necessarily provide reasons for change, rather they enable to uniform collection of data over time. The data are then interpreted to determine whether management practices are effective in providing for sustainable forest management.

The ESFM indicators have been largely based on the original Montreal Implementation Group (MIG) set of sub-national indicators⁴⁵. These sub-national indicators were developed at a national scale as a result of the Montreal Process. These sub-national indicators are reported as part of the Australian Government's *State of the Forests* reporting every five years.

Improvements in monitoring

A national review of the MIG indicators that aims to remove duplicity, ambiguity and gaps between indicators to ensure they have national and regional relevance is under way. A comprehensive review of ESFM indicators is expected as part of the first five-year review of the NSW forest agreements, IFOAs and NSW/Commonwealth RFAs. To maintain a link and level of consistency between the two monitoring streams, the impending review of the ESFM criteria and indicators will consider the revised MIG indicators. The review of ESFM criteria and indicators will also take into consideration other State monitoring and reporting processes, such as those used for *State of Environment* and *State of the Parks*. The review had not started when this report was being prepared.

Given the continuation of other reporting streams at corporate, state and national levels, there is a need to consider aligning monitoring and reporting to make best use of resources and improve the accuracy and usefulness of information provided. In 2005/2006, PWD continued to provide data in accordance with the findings of its own internal review of ESFM criteria and indicators. In particular, for many of the indicators, PWD now provides data that has been collected as a part of its *State of the Parks* program. In some cases this has meant that data have become more specific to the requirements of the indicators. The *State of the Parks* survey takes place at 2–3 year intervals and last occurred in 2005 (as included in the 2004/2005 *Forest Agreements Implementation report*). As such, updated data were not available for this report. New data are expected for the 2006/2007 *Forest Agreements Implementation report*. The data from Forests NSW continue to mainly come from its Social, Environmental and Economic Database System (SEEDS).

In addition, this year there has been a concerted effort to refer readers to the appropriate agency corporate materials and reports to provide further information on some indicators (particularly for indicators in Criterion 7). This approach means that duplication of data provision and reporting is minimised and allows for improved integration and alignment of reporting processes.

Changes in Report Structure

This year the report structure for indicators has changed slightly. In particular, the trend arrows that were included in 2003/2004 and 2004/2005 annual reports have been removed. The use of trend arrows was overly simplistic and could make the report open to misinterpretation and misrepresentation.

Conclusion

Monitoring the indicators is an evolving process. With a whole-of-government review of the ESFM criteria and indicators likely to begin in the near future, and the continuation of other reporting streams both at corporate and national levels, there is a strong need to align all monitoring and reporting to

⁴ Defined in *A Framework of Regional (Sub-national) Level Criteria and Indicators of Sustainable Forest Management in Australia* (Commonwealth, 1998).

⁵ MIG – indicators beginning with the prefix 'MIG' indicate they are based on the MIG set of regional (sub-national) indicators.

make best use of resources and improve the accuracy and usefulness of information provided. This will assist in moving towards achievement of ESFM.

Criterion 1 – Biodiversity

Forest type and growth stage

MIG Indicator 1.1.a: Extent of area by forest type and tenure (UNE, LNE, Southern regions)
Indicator 1.1: Extent of forest ecosystem types and vegetation types by growth stage (Eden region)
Sub-indicator 1.1.a.1: Understorey vegetation layer (Southern region)
MIG indicator 1.1.b: Area of forest type by growth stage distribution by tenure (UNE, LNE, Southern regions)

Additions to the DEC estate resulted in increases to the extent of some forest ecosystems and most growth stage categories. Extent of growth stage categories within State forests remains relatively stable.

Changes in the extent of forest ecosystem types are measured against modelled forest type extents listed in the RFAs⁶.

Change within the DEC estate

New gazettals⁷ were responsible for increases in the area of forest ecosystems in all regions during 2005/2006⁸.

There was an increase in the UNE region of the extent of 68 of the 163 forest ecosystems by a total area of 2,464 hectares (ha) across 12 reserves. For 47 of the 68 forest ecosystems, there was an increase in the area of Candidate Old Growth (COG) forest in the parks system by 839 ha. For 20 of the 68 forest ecosystems there was an increase in the area of Disturbed Old Growth (DOG) forest in the parks system by 355 ha. Nearly half (48%) of the total area of the additions are classified as old growth forest, in some form, which contains significant areas of habitat for those species dependent on old growth elements. Tables 2-1-A and 2-1-B provide information about changes to growth stages in the UNE since 2004/2005.

The area of threatened forest ecosystems also increased with the gazettal of new additions in the UNE. This included an increase in the reserved area of two endangered forest ecosystems: rainforest with an increase of 82 ha and swamp with an increase of 40 ha. The reserved area of a number of vulnerable forest ecosystems also increased, including 42 ha of Heath, 86 ha of paperbark and seven hectares of coastal mallee. There were also increases to the reserved area of rare forest ecosystems, including a seven-hectare increase in the banksia forest ecosystems and a two-hectare increase in the mangrove forest ecosystem.

An addition of 1 400 ha was added to the existing Maryland National Park, more than doubling the size of the reserve to 2 290 ha. This addition improves overall management of the reserve and protects vegetation communities that are underrepresented in the reserve system. Two forest ecosystems

⁶ Modelled pre-1750 extent of forest types are contained in tables 1A and 1B, attachment 1 of the North East RFA, table 1, attachment 1 of the Eden RFA, and table 1, attachment 1 of the Southern RFA.

⁷ A formal process by which land becomes part of the NSW parks system, whereby notices are published in the *NSW Government Gazette*.

⁸ Note that discussions about additional forest ecosystems and growth stages transferred under the *National Parks Estate (Reservations) Act 2005* were contained within the 2004/2005 *Forest Agreements Implementation Report*.

found on the addition, round-leaved gum (severely depleted, private land priority) and escarpment red gum (private land priority), are communities that are targeted as private land priorities, and addition of this area contributes to the targets for these, and other, communities.

For the LNE region during 2005/2006, there was an increase in the extent of 105 of the 200 forest ecosystems by a total area of 18,136 ha across 43 reserves.

For 65 of the 200 forest ecosystems there was an increase in the area of COG forest in the parks system by 7 284 ha, and for another 65 of the 200 forest ecosystems there was an increase in the area of DOG forest in the parks system by 3 785 ha (refer to table 2-1-B). Over half (62%) of the total area (ha) of the additions is classified as some form of old growth forest, with the majority being classified as COG forest. Tables 2-1-A and 2-1-B provide information about changes to growth stages in the LNE since 2004/2005.

This included an increase of 1 187 ha in the forest ecosystem dry grassy stringybark and 861 ha in dry red gum–bloodwood-apple. The area of threatened forest ecosystems, also increased with the gazettal of additions in 2005–06, in particular, significant areas of vulnerable forest ecosystems were added. These included 1,161 ha of New England stringybark–Blakely's red gum, 198 ha of dry open New England blackbutt, 137 ha of escarpment red gum, 109 ha of whitetopped box, and 89 ha of white box–ironbark-red gum. The reserved area of one endangered forest ecosystem, yellow box–Blakely's red gum, increased by one hectare. Increases in reserved area of rare forest ecosystems in the LNE region included, 1 823 ha of rainforest, 58 ha of mangrove, 36 ha of river oak and 22 ha of swamp.

The gazettal of major additions, around 9 300 ha, to Curracabundi and Nowendoc National Parks in June 2006 has increased protection for 795 ha of rainforest and 3 300 ha of COG forest. Gazettal of the additions has also improved the management of biodiversity in this area.

For the UNE and LNE, there have been additions to the ‘not growth staged’ category from acquisitions to the parks system that do not require growth staging.

Changes to forest type/structure/growth stage resulting from fire were not recorded.

Table 2-1-A: Change in area (ha) of growth stage categories within the DEC estate – UNE and LNE regions – 2005/2006

Eucalypt forest growth stage	Total change since last reporting period (ha)	
	UNE	LNE
Rainforest	+82	+1,852
Mature forest	+528	+1,262
Disturbed mature forest	+106	+1,848
Young forest	+341	+376
Recently disturbed forest	+0	+240
Not growth staged	+213	+1,489
Total	+1,270	+7,067

Source: PWD data

Table 2-1-B: Change in area (ha) of old growth stage categories within the DEC estate – UNE and LNE regions – 2005/2006

Eucalypt forest old growth stage	Total change since last reporting period (ha)	
	UNE	LNE
High conservation value old growth forest	0	0
Candidate old growth forest	+839	+7,284
Disturbed old growth forest	+355	+3,785
Total	+1,194	+11,069

Source: PWD data

There were increases in area of forest ecosystem by growth stage distribution within the parks system for the Southern region during 2005/2006, due to new gazettals.

For the Southern region during 2005/2006, there was an increase in the extent of seven of the 144 forest ecosystems by a total area of 948ha, thereby increasing the percentage of target achieved in the reservation of these forest ecosystems. The entire additions were contained within the new reserve Monga State Conservation Area, which is close to Monga National Park and Budawang National Park.

For six of the seven forest ecosystems there was an increase in the percentage of COG forest within the parks system. The forest ecosystems to increase reservation of their old growth forests were: Southern Coastal Foothills Dry Shrub Forest – *Eucalyptus sieberi*; Tableland and Escarpment Moist Herb/Fern Grass Forest – *E. radiata/E. viminalis/Viola spp*; Southern Escarpment Shrub/Fern/Herb Moist Forest – *E. cypellocarpa/E. fastigata/E. obliqua*; North East Tablelands Shrub/Herb/Grass Dry Forest – *E. radiata/E. viminalis/Lomandra longifolia*; Eastern Tableland Dry Shrub/Grass Forest – *E. pauciflora/E. viminalis/Acacia dealbata/Themeda australis*. As the size of the additions were small, the increases for each forest ecosystem were no greater than one per cent. The Monga State Conservation Area is likely to provide habitat for threatened fauna, such as the spotted-tailed quoll (*Dasyurus maculatus*), and the pale golden moth (*Diuris ochroma*).

Details about changes in growth stages since 2004/2005 for the Southern region are contained in tables 2-1-C and 2-1-D. Changes to forest type/structure/growth stage resulting from fire were not recorded.

Table 2-1-C: Change in area (ha) of growth stage categories within the DEC estate – Southern region – 2005/2006

Eucalypt forest growth stage	Total change since last reporting period (ha)
Rainforest	0
Mature forest	+102
Disturbed mature forest	+226
Recently disturbed forest	0
Young forest	+393
Unknown successional stage	0
Total	+721

Source: PWD data

Table 2-1-D: Change in area (ha) of old growth stage categories within the DEC estate – Southern region – 2005/2006

Eucalypt forest old growth	Total change since last reporting period (ha)
Candidate old growth forest	+60
No old growth category	0
Disturbed old growth forest	+167
Total	+227

Source: PWD data

There were increases in area of forest ecosystem by growth stage distribution within the parks system for Eden region during 2005/2006, due to new gazettals.

For the Eden region during 2005/2006, there was an increase in the extent of four of the 73 forest ecosystems by a total area of 471 hectares, thereby increasing the percentage of target achieved in the reservation of these forest ecosystems. The total additions were contained within one reserve, the Dangelong Nature Reserve. This addition was valuable in that it provided a corridor between two previously separated portions of the reserve and also a connection with the Kybeyan State Conservation Area.

For three of the four forest ecosystems there was an increase in the percentage of old growth forest within the park system. The forest ecosystems with an increase in old growth forest were: Monaro dry grass forest, sub-alpine dry shrub forest, and montane heath.

The addition is also likely to provide habitat and a movement corridor for the following threatened fauna: brown tree creeper (eastern subspecies) (*Climacteris picumnus victoriae*); hooded robin (south-eastern form) (*Melanodryas cucullata cucullata*); koala (*Phascolarctos cinereus*) and eastern bentwing bats (*Miniopterus schreibersii oceanensis*).

Tables 2-1-E and 2-1-F provide details about changes in growth stages since 2004/2005 for the Eden region. There have been additions to the 'not growth staged' category from acquisitions to the parks system that do not require growth staging. Changes to forest type/structure/growth stage resulting from fire were not recorded.

Table 2-1-E: Change in area (ha) of growth stage categories within the DEC estate – Eden region – 2005/2006

Eucalypt forest growth stage	Total change since last reporting period (ha)
Rainforest	0
Mature eucalypt forest	+351
Disturbed mature eucalypt forest	0
Young eucalypt forest	+1
Recently logged eucalypt forest	0
Other (not growth staged)	+64
Total	+415

Source: PWD data

Table 2-1-F: Change in area (ha) of old growth stage categories within the DEC estate – Eden region – 2005/2006

Eucalypt forest old growth stage	Total change since last reporting period (ha)
Old growth eucalypt forest	+56
Disturbed old growth eucalypt forest	0
Total	+56

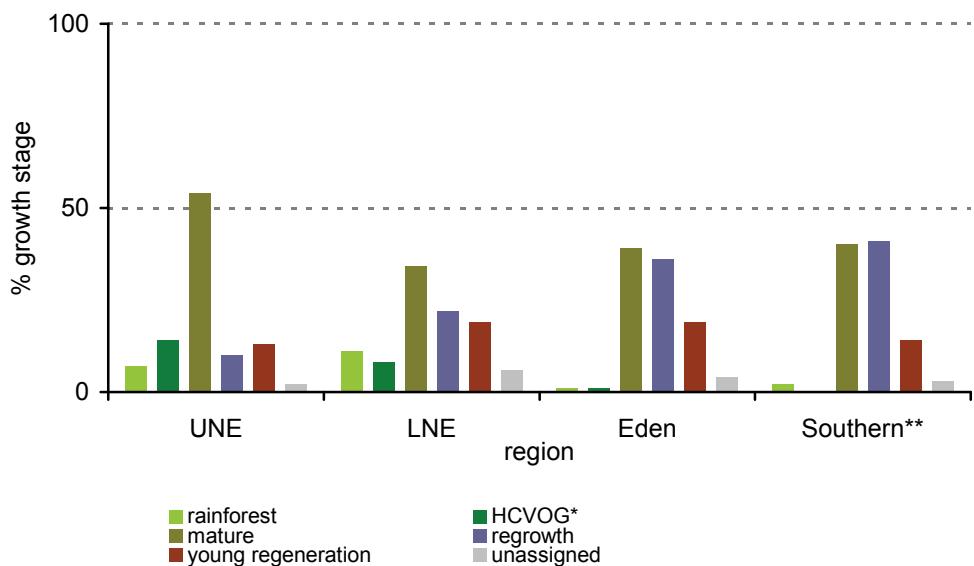
Source: PWD data

Change within State forests

The size of the State forest estate has decreased since 1999/2000 due to various land transfers, principally those facilitated by the *National Park Estate (Reservations) Act 2002*, *National Park Estate (Reservations) Act 2003* and now through the *National Park Estate (Reservations) Act 2005*. Although this has reduced the size of the estate, the distribution of growth stages within it has remained relatively stable. Between 2004/2005 and 2005/2006, there was little change to the growth stage extent within State forests in the UNE, LNE and Eden regions. There were some minor changes recorded in the percentage distribution of growth stages in the Southern region associated with decrease in estate size. Other small variations in growth stages have been generally due to harvesting activities.

The largest growth stage extent in State forests continues to be mature forest. The next most extensive growth stages are regrowth forest and young regeneration (figure 2-1-A).

Figure 2-1-A: Growth stage extent in State forests – all regions – 2005/2006



* high conservation value old growth

** Mature forest includes mature and candidate old growth; regrowth forest includes young forest; young regeneration includes recently disturbed forest; unassigned includes no growth stage assigned.

Source: Forests NSW data

Fragmentation

MIG Indicator 1.1.e: Fragmentation of forest types (UNE, LNE, Southern regions)

Indicator 1.2: Extent of connectivity in the forest landscape in relation to threatened species, habitat, general retained habitat on private land and conservation reserves (Eden region)

No outcomes to report

No new data are available for Forests NSW and PWD this reporting period. Fragmentation is not a feature of the landscape that Forests NSW and PWD map in a way that is quantifiable.

Forest dwelling species

MIG indicator 1.2.a: A list of forest dwelling species (UNE, LNE, Eden, Southern regions)

Indicator 1.3.b: List of representative species by abundance. Representative sample to include threatened species, key functional groups and indicator species (Eden region)

No outcomes to report

No new data are available from Forests NSW and PWD on this indicator for this reporting period.

Threatened species, populations and ecological communities

MIG Indicator 1.2.b: The status (threatened, rare, vulnerable, endangered or extinct) of forest dwelling species at risk of not maintaining viable breeding populations, as determined by legislation or scientific assessment (UNE, LNE, Eden, Southern regions)

Sub-indicator 1.2.b.1: The status of endangered populations and ecosystems as determined by legislation or scientific assessment (UNE, LNE, Southern regions)

Additional forest dwelling species, populations and ecosystems have been listed on the schedules of the Threatened Species Conservation Act this year.

In New South Wales, the *Threatened Species Conservation Act 1995* is the main legislation that provides for the protection of endangered and vulnerable flora and fauna species, populations and ecosystems. Flora and fauna species may be listed for protection under Schedule 1 (endangered species, populations and ecological communities) and Schedule 2 (vulnerable species and ecological communities) of the Act. The NSW Scientific Committee⁹ makes determinations for listings. Schedules of the *Threatened Species Conservation Act 1995* apply across all tenures and are maintained by the NSW Scientific Committee.

This data should be interpreted with care. Increases in the number of species listed on the schedules under the *Threatened Species Conservation Act 1995* are a result of a number of factors, including:

- increasing knowledge about species, populations and ecological communities
- taxonomic revision resulting in the splitting of previously identified species into a number of new species (sometimes with particular habitat requirements and/or limited ranges)
- improvements to the scientific committee process allowing for efficiencies in processing proposals for listing
- changes to the *Threatened Species Conservation Act 1995* regarding what can be listed
- increasing knowledge among the general community regarding the listing process.

As such, the increases presented do not necessarily reflect the true rate at which species are actually becoming threatened. While species, populations and communities are undoubtedly still at risk in NSW, the values presented in this indicator are likely to reflect the management response to the issue more accurately than the true status of all forest dwelling species. This measure does not distinguish those species for which threatened status is worsening or improving under current management practices.

Listing of forest dwelling species

The information below provides details for the data (specifically in relation to the additions or deletions to the schedules of the *Threatened Species Conservation Act 1995*) that are presented in table 2-1-G.

There were no reclassifications during 2005/2006 for vertebrate fauna and only one for vascular plants. This was in the UNE, for *Prostanthera staurophylla* (*sensu stricto*) (Torrington mint-bush) that was previously listed under Part 1 of Schedule 2 as vulnerable and has been reclassified under Part 1 of Schedule 1 as an endangered species.

⁹ An independent committee of scientists appointed by the Minister for the Environment.

In the UNE region, there was one new listing for vascular plants and two new listings for vertebrate fauna during 2005/2006. The new listings were for *Prostanthera spinosa* (spicy mint-bush) under Part 1 of Schedule 2, *Callocephalon fimbriatum* (gang-gang cockatoo) and *Turnix maculosa* (red-backed button-quail) also both under Part 1 of Schedule 2.

In the LNE region, there were three new listings for vascular plants and two new listings for vertebrate fauna during 2005/2006. The new listings are for *Senecio linearifolius* var. *dangarensis* and *Acacia dangarensis*, under Schedule 1, *Pomaderris bodalla* under Schedule 2 and *C fimbriatum* (gang-gang cockatoo) and *Turnix maculosa* (red-backed button-quail) also both under Schedule 2.

In the Southern region, there were two new listings for vascular plants and one new listing for vertebrate fauna during 2005-06. The new listings were for *Genoplesium superbum* (a midge orchid) under Part 1 of Schedule 1 and *Pomaderris bodalla* under Part 1 of Schedule 2 and *C fimbriatum* (gang-gang Cockatoo) also under Part 1 of Schedule 2.

In the Eden region, there was only one new listing for vertebrate fauna during 2005/2006. The new listing was for *C fimbriatum* (gang-gang cockatoo) under Part 1 of Schedule 2.

For all regions, *Egernia margaretae* (Centralian Ranges rock skink) has been removed from Part 1 of Schedule 1 (Endangered species), due to a taxonomic revision. This has been represented as -1 in table 2-1-G for all of the regions.

Table 2-1-G: The status of forest dwelling species – all regions – 2005/2006

Region	Schedule 1 endangered		Schedule 2 vulnerable	
	Listed before 05/06	Listed during 05/06	Listed before 05/06	Listed during 05/06
UNE region				
Vertebrate fauna	19	-1	90	2
Invertebrate fauna	3	0	0	0
Vascular plants	83	1	56	0
Total listed	105	0	146	2
LNE region				
Vertebrate fauna	13	-1	78	2
Invertebrate fauna	1	0	0	0
Vascular plants	43	2	70	1
Total listed	56	1	148	3
Eden region				
Vertebrate fauna	12	-1	39	1
Invertebrate fauna	1	0	0	0
Vascular plants	23	0	16	0
Total listed	36	-1	55	1
Southern region				
Vertebrate fauna	20	-1	57	1
Invertebrate fauna	0	0	0	0
Vascular plants	26	1	28	1
Total listed	46	0	84	2

Source: PWD data

Listing of Endangered populations and ecological communities

In 2005/2006, an additional two endangered populations and four endangered ecological communities were listed under Schedule 1 of the *Threatened Species Conservation Act 1995* (refer to table 2-1-H). Of these, one endangered population and three ecological communities can be found within the forest agreement regions. These are:

- *Cymbidium canaliculatum* (orchid population) (LNE region)
- Ribbon gum–mountain gum–snow gum grassy forest/woodland of the New England Tableland Bioregion (UNE and LNE region);
- Bangalay sand forest, Sydney Basin and South East Corner bioregions (Southern region)
- Hunter Valley Weeping Myall Woodland of the Sydney Basin Bioregion (LNE region).

Table 2-1-H: The status of Endangered Populations and Endangered Ecological Communities – all regions – 2005/2006

Region	Schedule 1	
	Listed before 05/06	Listed during 05/06
Endangered Population	8	2
Endangered Ecological Community	40	4
Total listed	48	6

Source: PWD data

Note: A number of the listed populations and ecological communities for years before 2005/2006 may not necessarily occur within forest agreement areas. Listings are derived from bioregion descriptions, which are not associated with forest agreement area boundaries.

Threatened species surveys in State forests

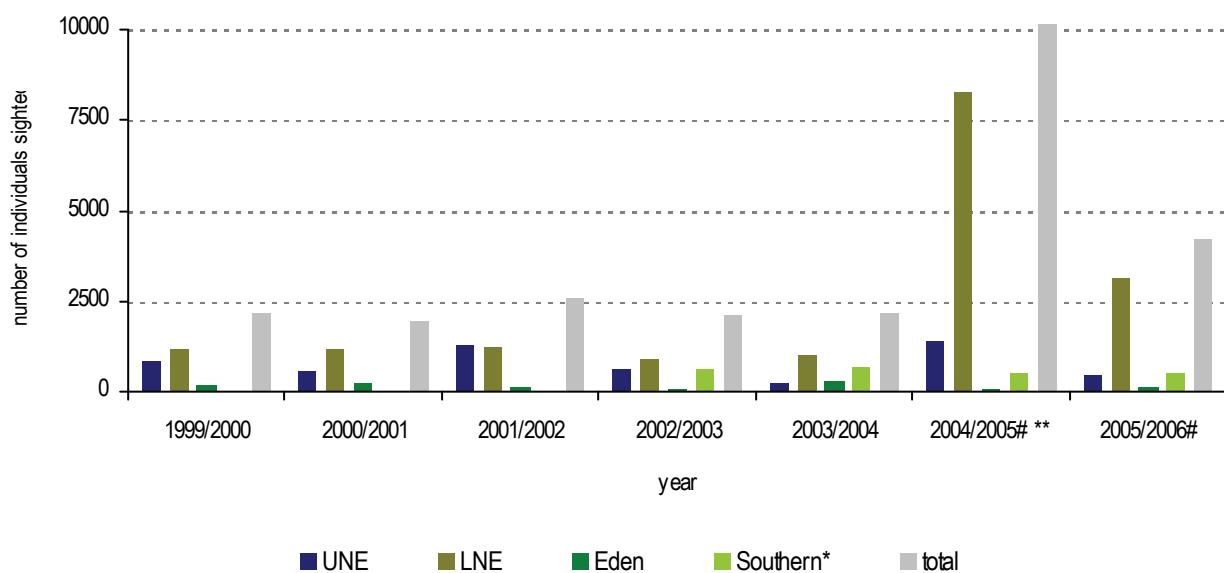
Trained Forests NSW staff survey for flora and fauna during the planning phase of forestry operations. These surveys are required in accordance with current licensing conditions under the *Threatened Species Conservation Act 1995*¹⁰ and mainly focus on locating threatened/endangered species. However, as part of the survey process, FNSW ecologists and suitably trained staff record the majority of all fauna and flora species that they detect. If threatened species are detected during surveys, Forests NSW applies protective measures as per requirements in the IFOA.

In 2005/2006, Forests NSW undertook 1 736 pre-harvest flora and fauna surveys in State forest. The surveys resulted in a total of 5 105 records of individual threatened flora and fauna species across all forest agreement areas (figure 2-1-B). The number of individuals recorded in 2005/2006 has decreased compared with 2004/2005. In the LNE there were 3 390 threatened species recorded, including 1 034 records of *Pteropus poliocephalus* (grey-headed flying fox), 826 records of *Parsonia dorrigoensis* (milky silk pod) and 385 records of *Acacia courtii*. In the Southern region, there were 516 species recorded, including 289 sightings of *Pseudophryne pengilleyi* (northern corroboree frog)¹¹. In the UNE region, there were 1 063 threatened species recorded, including 187 records of *Phascolarctos cinereus* (koala), 176 records of *Boronia umbellata* and 148 records of *Calyptorhynchus lathami* (glossy black cockatoo). There were 136 threatened species recorded in the Eden region, including 25 sightings of *Neophema pulchella* (turquoise parrot).

¹⁰ Threatened Species Licence contained in the IFOA for each region.

¹¹ Figure for corroboree frog includes tadpole numbers.

Figure 2-1-B: Forests NSW threatened species survey results – all regions



* Monitoring for the Southern region began in 2002/2003.

** For clarity reasons 2004/2005 figures do not include records for *Macrozamia johnsonii* (11 768 individuals in UNE) or *Euphrasia ciliolata* (11 350 individuals in the LNE).

For 2005/2006, data for the UNE and LNE regions have been obtained from Forests NSW's biodata system as opposed to SEEDS. Biodata provides a more comprehensive list of threatened species recorded than SEEDS. For Eden and Southern regions data continues to be supplied from SEEDS at this stage. Forests NSW is in the process of reviewing SEEDS with the aim of linking the biodata and SEEDS systems for more comprehensive reporting outcomes in the future.

Source: Forests NSW data

Species management measures

Indicator 1.3: Management measures in place to maintain species extent and abundance (interim for the first five years of Agreement) (Eden region)

No outcomes to report

No new data are available from PWD on this indicator. Data contained within last year's annual report was sourced from the 2005 *State of the Parks* survey. The *State of the Parks* survey occurs every two to three years. As such, new *State of the Parks* survey data are expected for next year's report.

Criterion 2 – Productive capacity of forest ecosystems

Land available for timber production

MIG Indicator 2.1.a: Area of forest land and net area of forest land available for timber production (UNE, LNE, Eden, Southern regions)

An estimated 53% (approximately 685 000 hectares) of native State forests are available for timber production across all regions.

Native forest

The total area of State forest, including plantations, in the UNE, LNE, Southern and Eden regions is approximately 1.66 million hectares. The native forest estate covers approximately 1.29 million hectares. Of this 1.29 million hectares, approximately 685 000 hectares (or 53%) is estimated to be available for harvest.

Specifically, at 30 June 2006¹²:

- Total Forests NSW native forest in the UNE region was approximately 390 000 hectares. It is estimated that 40% was available for harvest and 49% reserved for conservation purposes¹³ or unable to be harvested because of other restrictions¹⁴. It is estimated that 11% of the native forest estate requires further assessment¹⁵.
- Total Forests NSW native forest in the LNE region was approximately 458 000 hectares. It is estimated that 49% was available for harvest and 39% reserved for conservation purposes or unable to be harvested because of other restrictions. It is estimated that 12% of the native forest estate requires further assessment.
- Total Forests NSW native forest in the Eden region was approximately 163 000 hectares. It is estimated that 68.5% was available for harvest and 31% reserved for conservation purposes or unable to be harvested because of other restrictions. It is estimated that 0.5% of the native forest estate requires further assessment.
- Total Forests NSW native forest in the Southern region was approximately 280 000 hectares. It is estimated that around 62% was available for harvest and 38% reserved for conservation purposes or unable to be harvested because of other restrictions. It is estimated that 0.1% of the native forest estate requires further assessment (FMZ 8).

¹² The estimated percentage of land available for harvest has reduced significantly this year when compared with 2004/2005 figures. This is because in 2004/2005 areas of FMZ 8 were erroneously included in “available for harvest” figures. FMZ 8 areas are, in fact, required to be assessed before inclusion in harvestable area. Thus FMZ 8 areas are now reported as areas that require further assessment.

¹³ Land for conservation purposes is classified as FMZ 1, 2 or 3A under the FMZ system described in *Managing Our Forests Sustainably: Forest Management Zoning in NSW State Forests* (SFNSW, 1999).

¹⁴ The area of State forest identified as available for harvest (FMZ4) is not representative of the actual ‘on ground’ area available for harvest. Harvestable areas may be subject to the conditions of the IFOAs, which protect various forest values, such as riparian filter strips and threatened species habitat exclusions. Further operational exclusions may arise due to ‘on ground findings’, such as unmerchantable forest types, accessibility, rock, and low volume areas, and these are termed “operational exclusions”.

¹⁵ Areas for further assessment are classified as FMZ 8 under the FMZ system.

Plantations

Softwood plantation accounts for approximately 17% (280 000 ha) of the total State forest estate across all regions. There has been a around a 94 000 hectare increase in the area of softwood plantation on 2004/2005 figures¹⁶. The majority of softwood plantation, approximately 202 000 ha, is found within the Southern region. This equates to around 42% of the total State forest estate in the Southern region. The Eden, UNE and LNE regions have around 42 000 ha, 22 000 ha and 17 500 ha of softwood plantation respectively. Of the total softwood plantation estate, an estimated 68% of the area is available for harvest.

Of the total State forest estate across all regions about 6% is hardwood plantation. These hardwood plantations are mainly found within the UNE (approx 58 000 ha) and LNE (approx 29 000 ha). It is estimated that of the total hardwood plantation estate (approx 87 000ha), 56% of the total area is available for harvest.

Total growing stock

Indicator 2.1.b:	Total growing stock of both merchantable and non-merchantable tree species on native forest land available for timber production (UNE, LNE, Southern regions)
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No outcomes to report

No new data are available from Forests NSW on this indicator for this reporting period.

¹⁶ The large increase on 2004/2005 figures is attributable to changes in the area figure supplied for the Softwood estate in Southern region. In 2004/2005, the figure supplied (approximately 110 000 ha) was for net stocked area and not for gross area of the entire Softwood estate. This has been rectified for this reporting period and the new Southern region figure (which shows an increase in extent of around 90 0000 hectares) is a gross figure that includes non-harvest areas, clearfell areas and areas of potential future planting.

Timber products compared to sustainable volume

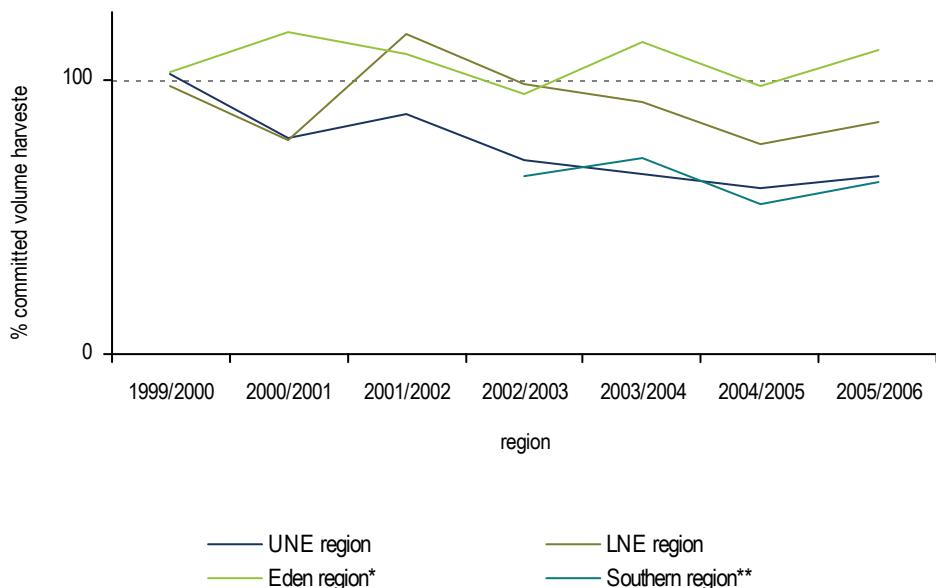
- Indicator 2.1.d: Annual removal of wood products compared to sustainable volume (UNE, LNE, Southern regions)
- Indicator 2.1.b: Annual removal of timber and non-timber products from forest ecosystems compared with those estimated to be ecologically sustainable by tenure (Eden region)
- Indicator 2.1.d: Annual removal of timber products and non-timber products from forest ecosystems by volume (Eden region)
- Indicator 6.1.a: Value and volume of wood and wood production (Southern region)

Approximately 291 000 m³ of quota sawlogs were harvested from Forests NSW native forest and hardwood plantations across all regions this year.

Committed/sustainable volumes harvested – quota sawlogs

Timber volumes permitted to be harvested by Forests NSW are designated in the NSW forest agreements, RFAs and IFOAs. An annual variation from the designated volume is permissible to accommodate changes in environmental and economic circumstances. This provision, as identified in the IFOAs, allows for harvest volumes in any one year to vary from the committed volume¹⁷ by 25%, but not exceed 5% over a five-year-period. Committed volumes designated in the agreements and approvals are made up of veneer sawlogs and high quality large sawlogs¹⁸, otherwise known as ‘quota sawlogs’. In 2005/2006, 290 686m³ of quota sawlogs were harvested across all regions. This represents 75% of committed volume (388 500m³) under all four IFOAs. Figure 2-2-A provides details of the percentage of committed quota sawlogs harvested by region.

Figure 2-2-A: Percentage of committed quota sawlog volumes harvested – all regions



* All quota sawlogs harvested from native forest.

** Timber harvesting under the terms of a NSW forest agreements and IFOA began in 2002.

Source: Forests NSW data

¹⁷ The volume of timber that may be harvested each year under the terms of the NSW forest agreements and IFOAs.

¹⁸ Having a centre diameter under bark of at least 40 centimetres.

During 2005/2006, 70 333m³ of quota sawlogs were harvested from Forests NSW native forests and hardwood plantations in the UNE region. This volume represents 65% of the committed volume. Volumes calculated using a sustainable volume of 109 000m³ per annum as specified in the UNE IFOA.

For the LNE region, quota sawlogs harvested during 2005/2006 totalled 135 744m³, representing 85% committed volume. Volumes calculated using a sustainable volume of 160 000m³ per annum as specified within the Southern IFOA.

Quota sawlogs harvested from the Eden region are wholly obtained from Forest NSW native forests as no hardwood plantation is located in the region. Quota sawlog volumes harvested in 2005/2006 totalled 23 936m³, representing 104% of the committed volume. Volumes calculated using a sustainable volume of 23 000m³ in accordance with the Eden IFOA.

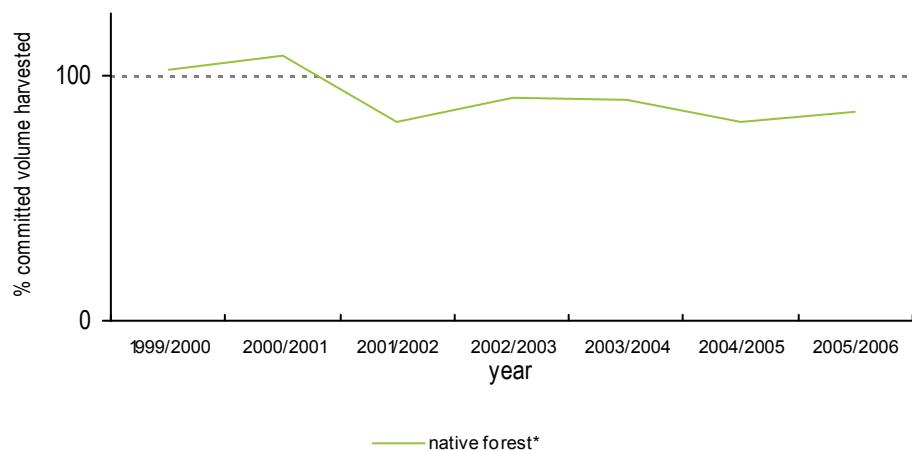
Quota sawlogs harvested from the Southern region have been wholly obtained from Forests NSW native forests. Quota sawlogs harvested during the year totalled 60 673 m³. This volume represents 63% of the committed volume, calculated using a sustainable volume of 96 500 m³ per annum, extrapolated from the IFOA [48 500 m³ (South Coast) and 48 000 m³ (Tumut)].

In 2005/2006, quota sawlogs harvested did not exceed volumes permitted under the terms of the Eden and LNE Forests Agreements and IFOAs. Quota sawlog volumes harvested were below volumes permissible under the terms of the Southern and UNE Forest Agreements and IFOAs. However, Forests NSW continued to supply quota sawlogs in accordance with its wood supply agreement commitments within these regions. The total quota sawlog commitments contained in wood supply agreements are less than those specified in the NSW Forest Agreements and IFOAs.

Quota sawlogs harvested during 2005/2006 were largely obtained from Forests NSW native forest (96%), with the remainder from hardwood plantations (4%). The proportion of quota sawlogs obtained from hardwood plantations has averaged about 4–5% since 2002/2003.

Pulp grade sawlogs also form part of quota sawlog volumes for the Eden region. Quota pulp grade sawlogs are calculated using a sustainable volume of 345 000 tonnes per annum. Quota pulp grade sawlogs are hardwood only, obtained from native forest. The volume of pulp grade sawlogs harvested has increased by 6% since 2004/2005 to 294 119 tonnes, or 85% of the committed volume. Committed volume percentages of pulp grade sawlogs since 1999/2000 are shown at figure 2-2-B.

Figure 2-2-B: Committed volumes harvested – pulp grade sawlogs – Eden region only



Source: Forests NSW data

Non-quota sawlogs and pulp grade timbers

See chapter 1 for details of non-quota sawlogs and pulp grade timbers.

Standing volume of species logged

Indicator 2.3: Standing volume of log stocks by species groups and diameter at breast height class for multi-aged and regrowth native forest and available for timber production by land tenure (Eden region)

No outcomes to report

No new data are available from Forests NSW on this indicator for this reporting period.

Species and royalty of logs harvested

Indicator 6.1: Average volume and royalty value of logs harvested per annum by species and grade by tenure (Eden region)
(This indicator was defined within the Eden region set of criteria and indicators under Criterion 6 – Socio-economic Benefits. For continuity of reporting it has been included under Criterion 2 – Productive Capacity of Forests.)

No outcomes to report

No new data are available from Forests NSW on this indicator for this reporting period.

Volume of non-timber products

Indicator 2.1.b: Annual removal of timber and non-timber products from forest ecosystems compared with those estimated to be ecologically sustainable by tenure (Eden region)

Indicator 2.1.d: Annual removal of timber products and non-timber products from forest ecosystems by volume (Eden region)

Indicator 2.1.e: Annual removal of non-timber forest products (e.g. berries, mushrooms, game, honey, wildflowers, tree ferns and possums) compared to the sustainable level (Southern region)

(These indicators are applicable to the Eden and Southern regions. However, data have been provided on the quantities of non-timber products harvested for all regions (including the UNE and LNE regions). Values of products harvested have been provided for the Eden region only.)

The quantities of non-timber products removed from State forests have generally decreased across all regions.

No new data are available from PWD for this indicator for this reporting period.

State forests are the source of numerous non-timber forest products. For the purpose of measurement against this indicator, non-timber products in State forests have been determined to be those products that are not supplied to sawmills or processing plants. Non-timber forest products include firewood, seed, gravel and bark. In addition to non-timber products, Forests NSW also continue to provide detail on commercial activities that occur in State forests (such as beekeeping and grazing). Forests NSW, as has been the case since monitoring began, and due to the availability of data for other reporting requirements, is able to comprehensively report against these indicators for all regions. Specific details of actual products and quantities of products taken from State forests, by region, are provided in table 2-2-A.

Table 2-2-A: Non-timber products obtained from State forests – all regions – 2005/2006

Forest product	Unit	Region			
		UNE	LNE	Eden	Southern
Grazing	ha	187 166	68 203	7 037	112 353
Apiculture	sites	980	336	102	1 193
Seed	kg	0	3	0	50
Firewood	tonnes	125	1 733	689	5 786
Craft timber	m ³	0	3	0	3
Misc native timber pieces	number	0	3767	0	53
Wood blocks	number	0	0	0	3 750
Film/documentary	permits	0	3	5	0
Communication sites	number of permits	30	53	8	31
Other structures	number of permits	17	39	7	25
Powerlines/cables/pipelines	km	3	63	50	1 052
Gravel/sand/rock	tonnes	0	300	56 616	42
Research	number of permits	3	16	2	8

Source: Forests NSW data

In 2005/2006, across all regions, 374 759 ha of State forests were covered by grazing permits, occupation permits or crown lease.

There were 2 611 of apiary sites on State forests in the UNE, LNE, Southern and Eden regions at the end of the reporting period. This is a decrease of 1% (28 sites) from figures reported in 2004/2005.

The quantities of firewood taken, across all regions, have decreased by 16% on 2004/2005 figures. In 2005/2006, it was estimated that 8 333 tonnes of firewood were obtained from State forests.

In 2005/2006, 56 958 tonnes of material (gravel, sand and rock) were extracted from State forests across all regions. This is a slight increase of approximately 2000 tonnes on 2004/2005 figures. The majority of volume is quarried from within the Eden region.

Plantations

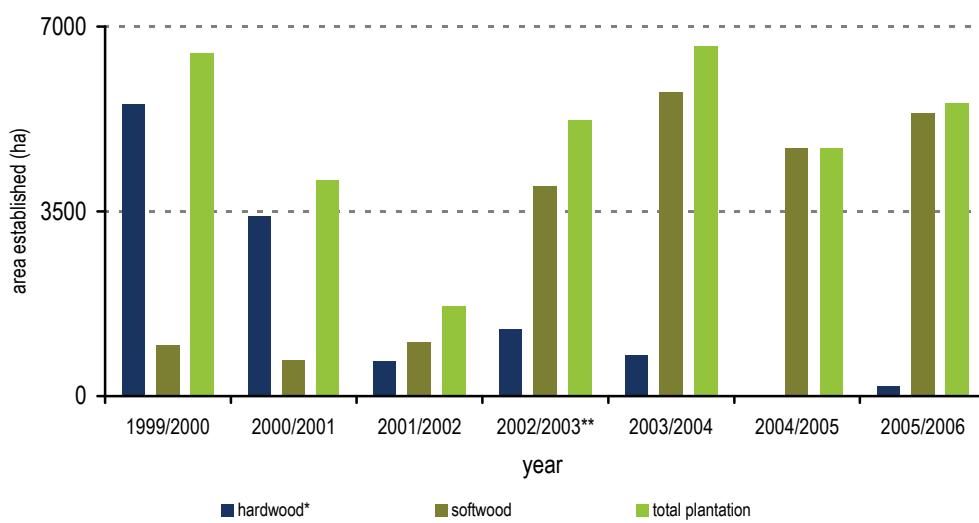
MIG Indicator 2.1.f: Area and percent of plantation established meeting effective stocking one year after planting (UNE, LNE, Eden, Southern regions)

The area of plantation established on State forests increased this year. The effective regeneration rate in all regions remains high.

Plantations established

In 2005/2006, Forests NSW established 5 364 ha of softwood plantation(figure 2-2-C). The majority of plantations were established in the Southern region (4 292 ha). Softwood plantations were also established in the UNE (934 ha) and Eden (138 ha) regions. In the LNE region, 180 hectares of hardwood plantation were established this year.

Figure 2-2-C: Area of hardwood and softwood plantations established by Forests NSW – all regions



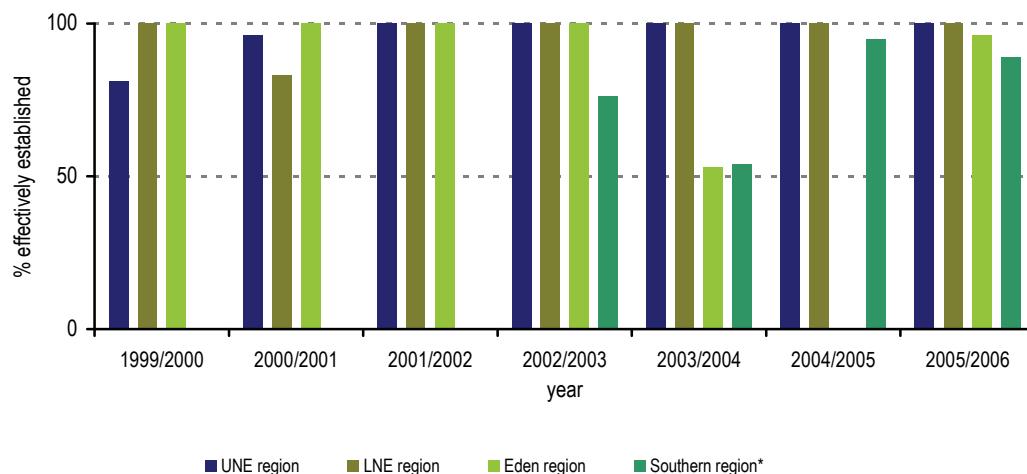
** includes area established in the Southern region after ESFM monitoring began

Source: Forests NSW data

Effective stocking rates

The effective stocking rate is the survival of planted trees one year after planting at a level that promotes a cost-effective return upon harvest. Since ESFM monitoring began effective stocking rates of Forests NSW's softwood plantations have remained consistently high, with the exception of 2003/2004. In 2005/2006, effective stocking rates for UNE and LNE were 100%, Eden was 96% and Southern 89% (figure 2-2-D).

Figure 2-2-D: Effective stocking rates for Forests NSW softwood plantations – all regions



* monitoring for the Southern region began in 2002/2003

Note – where value is zero no measure of effective stocking was carried out in that year.

Source: Forests NSW data

Regeneration

MIG Indicator 2.1.g: Area and percentage of harvested area of native forest effectively regenerated (UNE, LNE, Eden, Southern regions)

Native forest regeneration surveys in the LNE and Southern regions this year indicate high effective regeneration rates.

Data and interpretation

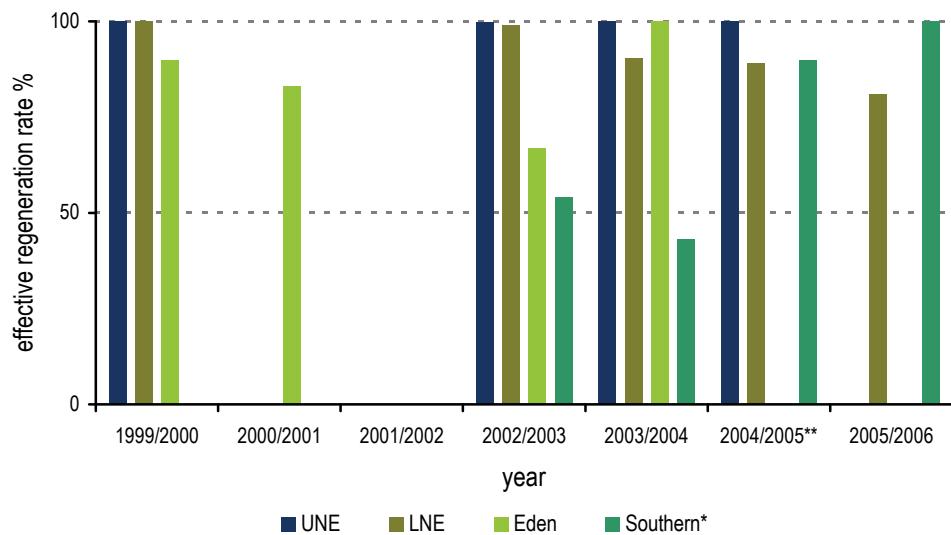
The PWD has no new data on regeneration of previously harvested lands available for this reporting period.

Forests NSW regenerates harvested native forest to re-establish pre-harvest forest structure and species composition, specific to each forest type and locality. Surveys identify effective regeneration rates.

In 2005/2006, there were 45 regeneration surveys carried out over 3 429 hectares of State forest in the LNE (2 997 ha) and Southern regions (432 ha). There were no regeneration surveys in the UNE or Eden regions. Details from the UNE and Southern region indicate that effective regeneration rates remain high. (figure 2-2-E). Results for 2005/2006 showed a regeneration rate of 100% in the

Southern region and 81% in the LNE region. Regeneration rates for the Southern region have considerably improved since 2002/2003.

Figure 2-2-E: Effective regeneration rates on State forests – all regions



where value is zero '0' there were no regeneration surveys carried out.

* Monitoring for the Southern region began in 2002/2003.

** Note: the effective regeneration rate for the LNE region in 2004/2005 has changed. This is due to accidental omission of regeneration survey data from Forests NSW's Central region in that years report.

Source: Forests NSW data

Criterion 3 – Ecosystem health and vitality

Weeds, feral animals and disease

Indicator 3.1.a:	Area and percent of forest affected by processes or agents that may change ecosystem health and vitality (narrative as interim) (UNE, LNE, Eden, Southern regions)
Indicator 3.1:	List of biological factors influencing forest health and vitality, including weeds, feral animals, insects and disease (Eden region)

More than \$873 000 was directed towards the control of a feral animals and noxious/environmental weeds across approximately 530 000 hectares of State forest in the UNE, LNE, Eden and Southern regions. Monterey Pine aphid continues to have an extensive impact upon Forests NSW softwood plantations.

The effect of feral animals and noxious or environmental weeds for ecosystem health on public lands is a continuing concern for land managers. In order to maintain and improve biodiversity and productive capacity, DEC and Forests NSW continue to carry out efforts to control noxious weeds, feral animals (including introduced predators), pests and disease. Control programs often take place in cooperation with other land management agencies and neighbours.

Forests NSW and PWD do not have data on the area and percentage of forest affected by negative agents. As an alternative, Forests NSW continues to provide information for this indicator through providing details on expenditure and area treated for targeted weed and feral animal species across its estate. No new data are available from PWD on this indicator for this reporting period. However, a report, which is expected to be publicly released in early 2007, will provide details of pest and weed management on the DEC estate. This report, *Protecting our National Parks from Pests and Weeds*, will update information on the 'Pest Measure'¹⁹ that has previously been reported, and also provide information on pest and weed management in national parks and reserves throughout New South Wales. The report will provide the latest evaluation of management performance in relation to pest and weeds, with information sourced from the 2005 *State of the Parks* qualitative survey.

Feral animals and noxious or environmental weeds

As mentioned above, statewide data for PWD will be provided in a report *Protecting our National Parks from Pests and Weeds*, which will be released in 2007.

In 2005/2006, Forests NSW directed approximately \$890 000 towards the control of a range of negative agents across more than 2.7 million hectares of State forest in the UNE, LNE, Eden and Southern regions. Of the total amount spent, 56% was spent on feral animal control and 44% on weed control.

Specifically, noxious or environmental weed control efforts were carried out over an estimated 1 736 hectares²⁰, at a cost of \$396 100. Fifteen weed species were subject to control works during the year,

¹⁹ Pest measure is a performance indicator that was developed by PWD to monitor the effectiveness of pest management on its reserves.

²⁰ There has been a significant reduction in the area figures supplied for Eden and Southern regions in 2005/2006 when compared with 2004/2005 figures. This is because figures supplied for Eden and Southern regions in 2004/2005 were for "estimated area affected" not "estimated area treated".

including, *Sporobolus fertilis* (giant Parramatta grass), *Ageratina adenophora* (crofton weed), *Nassella trichotoma* (serrated tussock) and *Hypericum perforatum* (St John's wort). The most extensively treated weed species was *Lantana camara* (lantana), over an area of approximately 600 hectares at a cost of approximately \$13 000. The largest expenditure (\$195 000 approx) was on *Rubis fruticosus* sp. Agg. (blackberry) control. Table 2-3-A contains further detail for noxious/environmental weed control activities by Forests NSW during 2005/2006.

Table 2-3-A: Forests NSW control efforts for noxious/environmental weed species – all regions – 2005/2006

Region	Number of species treated	Area treated (ha) (approx)	Expenditure (\$) (approx)
UNE	3	218	21 500
LNE	9	1 417	90 600
Eden	6	56	72 200
Southern	10	45	211 800
total	15*	1736	396 100

* total number of individual species treated across all regions

Source: Forests NSW data

Feral animal (including introduced predator) control efforts in State forests (all regions) took place over approximately 530 000 hectares at a cost of \$477 200 (table 2-3-B). Eight feral animal species were targeted in 2005/2006, including *Sus scrofa* (pig), *Capra hircus* (goat), *Felis catus* (cat) and *Oryctolagus cuniculus* (rabbit). Control efforts were most extensive in the Southern region, where \$307 000 was directed at four species across more than 370 000 hectares of State forest. The most expenditure (\$420 000 approx) was on *Vulpes vulpes* (fox) and *Canis familiaris* (wild dog) control.

Table 2-3-B: Forests NSW control efforts for feral animal species – all regions – 2005/2006

Region	Number of species treated	Area treated (ha) (approx)	Expenditure (\$) (approx)
UNE	2	25 100	16 000
LNE	6	56 100	48 000
Eden	4	75 400	106 000
Southern	4	371 000	307 000
total	8*	527 600	477 000

* total number of individual species treated across all regions

Source: Forests NSW data

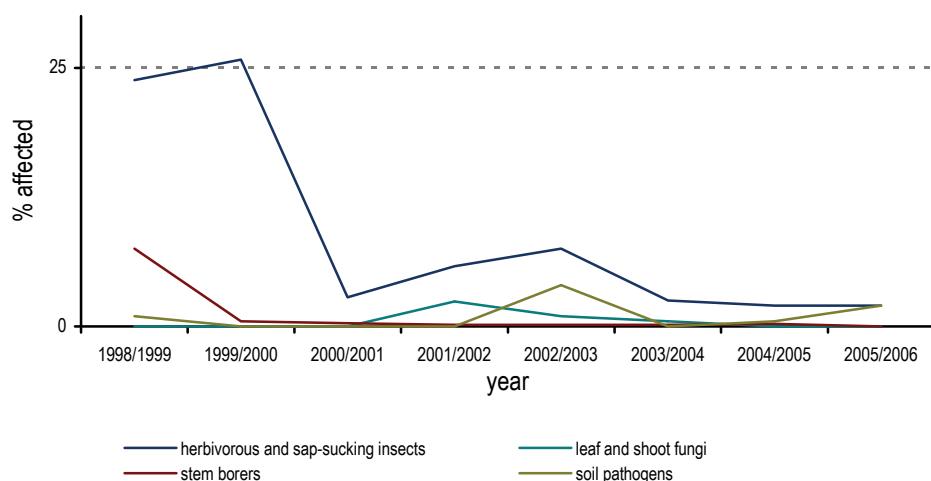
Pests, disease and physical agents

Fungal diseases, insect pests or other physical agents can severely affect the biodiversity of an area and its future productivity by altering the growth rate and survival of trees. Forests NSW carries out

regular surveys to monitor the extent of biological agents and critical nutrient deficiencies in both hardwood and softwood plantations.

Surveys are carried out in hardwood plantations for all agents, but only four selected agents are regularly reported in hardwood plantations: herbivorous and sap-sucking insects, leaf and shoot fungi, stem borers and soil pathogens. As illustrated in figure 2-3-A, herbivorous and sap-sucking insects, affected around 25% of the hardwood plantation estate in 1999/2000; this has decreased to around 2% in 2005/2006. Soil pathogens also affected 2% of the hardwood plantation estate in 2005/2006. The other surveyed agents were not recorded within the hardwood plantation estate in 2005/2006.

Figure 2-3-A: Percentage of new Forests NSW hardwood plantations affected by selected agents – statewide



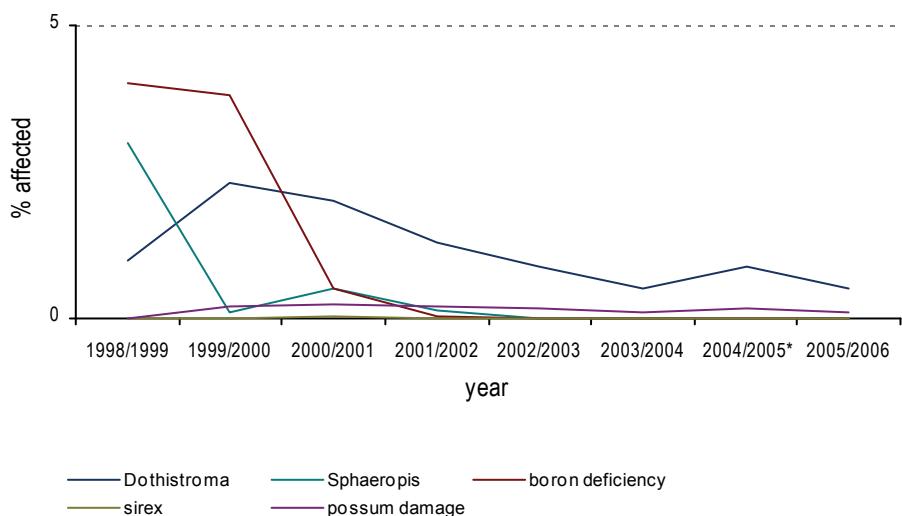
Note: The percentages shown are calculated across the entire planted hardwood forest (post-1995) estate in all Forests NSW regions (not just forest agreement regions).

Source: Forests NSW data

Forests NSW surveys for six agents in softwood plantations: *Dothistroma* (needle blight), *Sphaeropsis* (fungus), boron deficiency, *Sirex* (wood wasp), possum damage and since 2004/2005 *Essigella californica* (Monterey pine aphid). In 2005/2006, the most extensive agent is the Monterey pine aphid, which is now estimated to affect around 25% of the estate (up from 15% in 2004/2005). The aphid can significantly reduce growth rates as a result of it causing discolouration of leaves and loss of needles. Forests NSW researchers and operational staff are committed to controlling this new pest agent. Forests NSW provides funds towards a national research program to investigate this serious problem.

Figure 2-3-B shows the extent of other agents – *Dothistroma* and possum damage were estimated to affect 0.5% and 0.1% of the estate respectively. While *Sphaeropsis*, *Sirex* and boron deficiency were each estimated to affect around 0.01% of the estate.

Figure 2-3-B: Percentage of new Forests NSW softwood plantations affected by selected agents – statewide



* Figures for 2004/2005 have changed from previous report. This is due to a correction of erroneous data supplied last year.

Note: *Essigella californica* figures are not shown on this graph due to clarity purposes.

Note: The percentage shown is calculated across the entire softwood estate in all State forest regions (not on forest agreement regions).

Source: Forests NSW data

Bell miner associated dieback (BMAD) is a continuing concern for forest management in the UNE and LNE regions. During 2005/2006, work took place in the Jilliby Valley in LNE that, as a result of BMAD, used airborne remote sensing techniques and led to an accurate method of mapping eucalypt tree canopy health. Work is progressing to adapt this method for use with satellite imagery to enable a cost-effective method for rating forested lands for BMAD hazard. The Environmental Trust and the Natural Heritage Trust have provided funding for this work.

Fire

Indicator 3.2: Impact of fire on forest-related values (Eden region)

(This is an Eden region indicator. For continuity of reporting, all regions are reported here.)

Bushfires affected an estimated 51 655 hectares of DEC estate and State forests this year. Prescribed burns were conducted over an estimated 50 800 hectares of State forests and DEC estate this year.

Data and interpretation

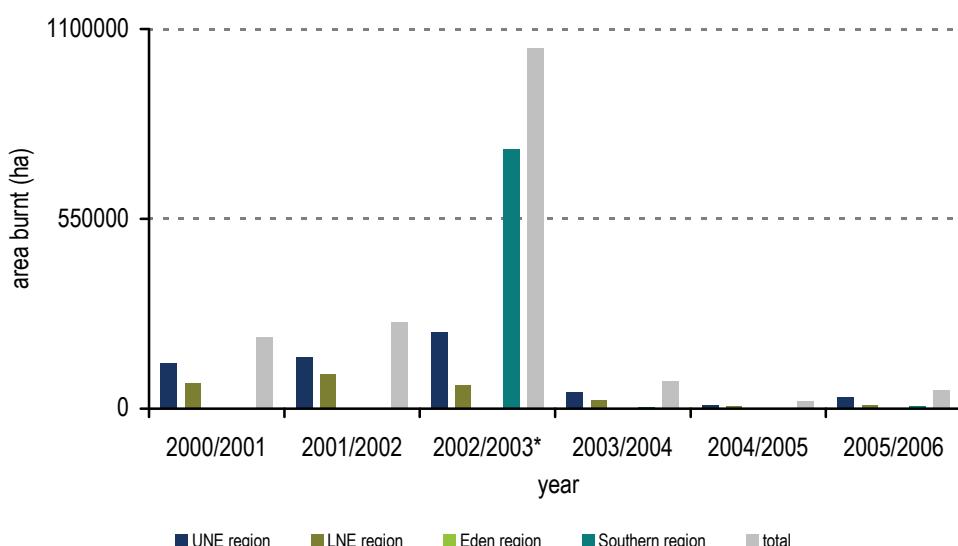
The size, intensity and frequency of fire events are monitored across public forest areas to help identify the impact of fire on biodiversity and economic values and improve emergency and land management practices. Fire events may be a bushfire or a prescribed burn. In general, prescribed burns are of lower intensity than bushfires and occur during the cooler months of the year. The exception to this is back

burning to control the spread of bushfires. Data provided by DEC have been obtained from the PWD's Incident Database, compiled from daily situation reports during fire incidents. As it is a statewide data set it includes data for the entire LNE region. Forests NSW's data have been drawn from its regional offices, based on regional fire plans, plans submitted to bushfire management coordinating committees and records of burning for each season.

Bushfire

Bushfires are uncontrolled fire events of varying intensity that can cause severe and widespread damage to the environment and infrastructure, and threaten human life. However, fire plays a crucial role in the diversity and productivity of the Australian bush.

Figure 2-3-C: Area burnt by bushfire – DEC estate and State forests – all regions



* Monitoring began for the Southern region in 2002/2003.

data were incomplete for 1999/2000

Source: PWD and Forests NSW data

In 2005/2006, the DEC estate experienced an increase in the total amount of land burnt by bushfire (46 323 ha) when compared to 2004/2005 figures (13 520 ha). In particular, in the UNE region the area burnt by bushfire increased from 5 246 ha in 2004/2005 to 27 607 ha in 2005/2006. The exception was in the Eden region where the area burnt by bushfire actually decreased from 384 ha in 2004/2005 to 55 ha in 2005/2006.

In 2005/2006, the total area affected by bushfires in State forests has decreased (note that figures for softwood plantations were not supplied this year). The total area affected by bushfire fell from 7 580 ha (in 2004/2005) to 5 332 ha (in 2005/2006), a 30% reduction. The region that was most affected by bushfire was the UNE region with 5 271 ha burnt. The area affected by bushfire in the LNE region was 42 ha and 19 ha were burnt in Eden. There were no recorded bushfires in the Southern region this year.

Prescribed burning

Prescribed burning is an important part of fire management that assists in reducing the incidence and severity of bushfires and improving bushfire control. Planning involves predicting fire behaviour using rainfall or drought history, weather (temperature, humidity, wind speed and direction), vegetation and fuel characteristics and topography.

Prescribed burning carried out in State forests includes hazard reduction burns, post logging burns, pre-logging burns and area establishment burns (for plantations). In 2005/2006, Forests NSW had planned for hazard reduction burns and post-logging burns to be carried out on about 70 300 hectares of State forest across the four forest agreement regions. Hazard reduction and post-log burns then took place over approximately 26 300 hectares (37% of the planned area). A further 3 000 hectares of plantation land was subject to area establishment burns. In addition 2 200 ha of land was subject to pre-harvest burns. Much of the area treated by prescribed burns was in the Southern region (approximately 17 000 hectares).

In 2005/2006, prescribed burning on DEC estate occurred on approximately 24 500 hectares across all regions. The largest area undergoing prescribed burning was in the Southern region. Additionally, approximately 260 ha of the DEC estate were mechanically treated (e.g. slashed), mainly in the Upper North East region.

The total area of parks within the LNE undergoing prescribed burns in the 2005/2006 year was approximately 9 200 ha; while approximately 30.5 ha was treated mechanically. In the UNE region the total area of parks undergoing prescribed burns was approximately 2 100 hectares and the area treated mechanically was estimated at 226.4 ha. In the Southern region, the area of parks treated with prescribed burns was approximately 10 900 hectares and the area treated mechanically was estimated at 1.4 ha. In the Eden region, the area of parks undergoing prescribed burns was estimated to be around 2 300 hectares and the area treated mechanically was approximately 1.4 ha.

Data for prescribed burns and mechanical treatment were collected on a park basis. Three parks were located on the boundary between two RFA regions and, because of this, data for the area treated were double counted, that is have been allocated to each RFA region.

The affected parks and RFA regions were:

- Nymboi-Binderay National Park, which occupies part of both the UNE and LNE RFA regions. (1.1 ha of this park underwent mechanical treatment.)
- Bongil Bongil National Park, which occupies part of both the UNE and LNE RFA regions. (3.3 ha of this park underwent mechanical treatment.)
- Wadbilliga National Park underwent 1 697 ha of prescribed burns. This park occurs on the boundary of both the Southern and Eden regions. Double counting of this figure for these regions means that the total area burnt is approximate rather than precise, as the area data are not mutually exclusive.

Criterion 4 – Soil and water resources

Roads and crossings

Indicator 4.1.a:	Area and percent of forest land covered by Comprehensive Road Management Plans, which include an assessment of the extent of existing road infrastructure, processes for ongoing improvement, targets and milestones (UNE, LNE, Southern regions)
Indicator 4.1:	Road density by category and catchment, and stream crossing density by catchment, for the total forest agreement area, including forest and non-forest areas. Calculation of an ecologically sustainable road index and ecologically sustainable crossing index (Eden region)

Nine regional road management plans cover all State forests in the Forest Agreement regions.

Data and interpretation

Forests NSW has nine regional road management plans that cover the four forest agreement areas. The plans are applicable to each Forests NSW softwood and native forests region²¹. Currently these road management plans are internal Forests NSW documents, but may be used in the future as a basis for the preparation of a regional ESFM supplementary plan for road management.

The total length of the road network within State forests across the forest agreement regions totalled approximately 30 000 kilometres (table 2-4-A). Total road length has decreased for all regions, except the Eden region, which increased by 2 710 km. The largest decrease in total road length was for the UNE region (3 353 km). Decreases in road length were also recorded for the LNE region (1 140 km) and Southern region (710 km)²².

No new data are available from PWD on this indicator. Comparison between PWD regions remains difficult because of different road classification systems.

²¹ Forests NSW regional boundaries do not correspond with forest agreement area boundaries. As a result a number of Forests NSW road management plans may be applicable to each forest agreement region (for example, the UNE region is covered by road management plans for the North East Native Forest Operations Branch, Western Native Forest Operations Branch and Northern Planted Forest Operations Branch).

²² Annual variations in road length may be associated with improved assessment methods and the resultant updating of the road network data; changes in agency ownership of road networks; and/or road closure or reopening/new construction of roads.

Table 2-4-A: Length of road by classification on State forests – all regions – 2005/2006

Length of road by classification (km)	UNE	LNE	Eden	Southern
Primary access	286	32	406	713
Secondary access	0	538	895	973
Feeder	0	819	894	5262
Harvesting, link and boundary	4 101	3371	10	5084
Fire trail and service trail	3 782	643	3260	901
Total road length	8169	5403	5465	12 993

Source: Forests NSW data

Soil erosion

MIG Indicator 4.1.a (interim): Area and percentage of forest land systematically assessed for soil erosion hazard, and for which sitevarying scientifically-based measures to protect soil erosion and water values are implemented (UNE, LNE, Eden, Southern regions)

There were soil erosion hazard assessments on approximately 82 000 hectares (gross) this year.

Data/information discussion

Forests NSW assesses harvest areas for potential and existing soil erosion issues during the harvest planning process. In 2005/2006, across all regions, Forests NSW surveyed soil across an estimated gross area of 82 252 hectares and a net harvest area of 25 588 hectares. Table 2-4-B details the gross, net harvest and the percentage of total net area harvested for each region during the year.

Table 2-4-B: Area of Forests NSW native forest assessed for soil erosion hazard and the net area harvested as a percentage of the total forest area – all regions – 2005/2006

Region	Gross area (ha)	Net harvest area (ha)	Percentage (%) of region's production area harvested
UNE	20 632	5 439	1.4
LNE	24 473	9 924	2.2
Eden	16 515	4 786	2.9
Southern	20 632	5 439	1.9
Total	82 252	25 588	

Source: Forests NSW data

Only activities associated with roads, park management infrastructure and visitor facilities are likely to result in soil erosion on DEC estates. As a result, DEC does not make broad area assessments of soil erosion potential. However, when engaging in activities on parks or reserves, the PWD carries out a Review of Environmental Factors under the provisions of the *Environmental Planning and Assessment Act 1979*, which will consider the protection of soil and water values.

Criterion 5 – Maintenance of forest contribution to global carbon cycles

Biomass and carbon

MIG Indicator 5.1.a: Total forest ecosystem biomass and carbon pool, and if appropriate, by forest type, age class, and successional stages (UNE, LNE, Eden Southern regions)

Approximately 3.1 million tonnes of carbon is estimated to be sequestered in Forests NSW hardwood and softwood plantations. This is a slight increase on 2004/2005 figures.

Estimates of the total amount of carbon sequestered across the public forest estate are not available.

While DEC does not have the capacity to report on this indicator, Forests NSW estimates the amount of carbon sequestered in its planted forest estate. The assumptions for the carbon sequestration calculations are shown in table 2-5-A.

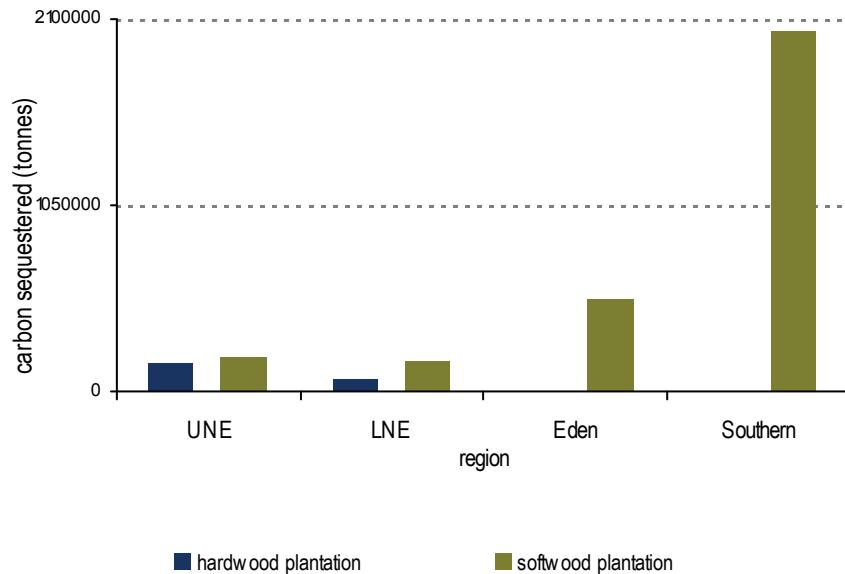
Table 2-5-A: Assumptions for carbon sequestration in Forests NSW's planted forest estate

Assumptions	Softwood	Hardwood
$\text{CO}_2 \text{ sequestered (tonnes CO}_2\text{e)} = \text{net plantation area} \times \text{Mean tree biomass increment (MTBI)} \times \text{Carbon Proportion (CP)} \times \text{Carbon to Carbon dioxide factor (CCF)}$ where		
MTBI = SBI + CBI + RBI	9.487296	11.64735
SBI (stem biomass Increment) = TSVI x BD	6.72	8.25
TSVI (total stem volume increment)	16m ³ /ha/year	15m ³ /ha/yr
BD (basic density)	0.42 t/m ³	0.55t/m ³
CBI (canopy biomass increment) = SBI x .1765	1.18608	1.456125
RBI (root biomass increment) = (SBI + CBI) x .2	1.581216	1.941225
CP = 0.5	0.5	0.5
CCDF = 3.667	3.667	3.667

Source: Forests NSW

In 2005/2006, Forests NSW estimated that there were 3 125 994 tonnes of carbon sequestered in its planted forest estate (refer to figure 2-5-A). The Southern region is the largest contributor to this total with an estimated 2 028 803 tonnes of carbon sequestered. It is estimated that the plantation estate in the UNE, LNE and Eden regions have 345 902 tonnes, 237 285 tonnes, 514 004 tonnes respectively of carbon sequestered.

Figure 2-5-A: Sequestered carbon in Forests NSW hardwood and softwood plantations – all regions – 2005/2006



Source: Forests NSW data

MIG Indicator 5.1.c: Contribution of forest products to the global carbon budget (UNE, LNE, Eden, Southern regions)

Global carbon budget

No outcomes to report

No new data are available from PWD and Forests NSW for this indicator.

Case Study: PWD and Greenfleet

During the 2005/2006 reporting period, Greenfleet Australia approached PWD to investigate opportunities to facilitate strategic revegetation activities on lands reserved under the *National Parks & Wildlife Act 1974* to offset carbon emissions from motor vehicles, household/office energy usage and air travel.

Greenfleet Australia and PWD held initial discussions looking at the possibility of using the lands identified as part of the 'Carbon Sinks for Ecosystem Reconstruction' project as sites for Greenfleet's tree planting program.

It was agreed that PWD would prepare a draft MOU between DEC and Greenfleet Australia, with the following objectives:

- Carry out coordinated revegetation projects in the NSW reserve system to achieve improved conservation outcomes.
- Provide Greenfleet with the carbon sequestration value of the revegetation activities in the NSW reserve system and send it to Greenfleet for negotiations.

In July 2006, PWD sent the draft MOU to Greenfleet for further negotiations.

Criterion 6 – Socio-economic benefits

Visitation

MIG Indicator 6.2.c: Number of visits per annum (UNE, LNE, Eden, Southern regions)

The total number of permits issued for activities in State forests decreased slightly this year when compared with 2004/2005 figures.

No new data are available from PWD for this indicator. Data contained within last year's annual report were sourced from the 2005 *State of the Parks* survey. The *State of the Parks* survey takes place every 2-3 years. As such, new *State of the Parks* survey data are expected for next year's report.

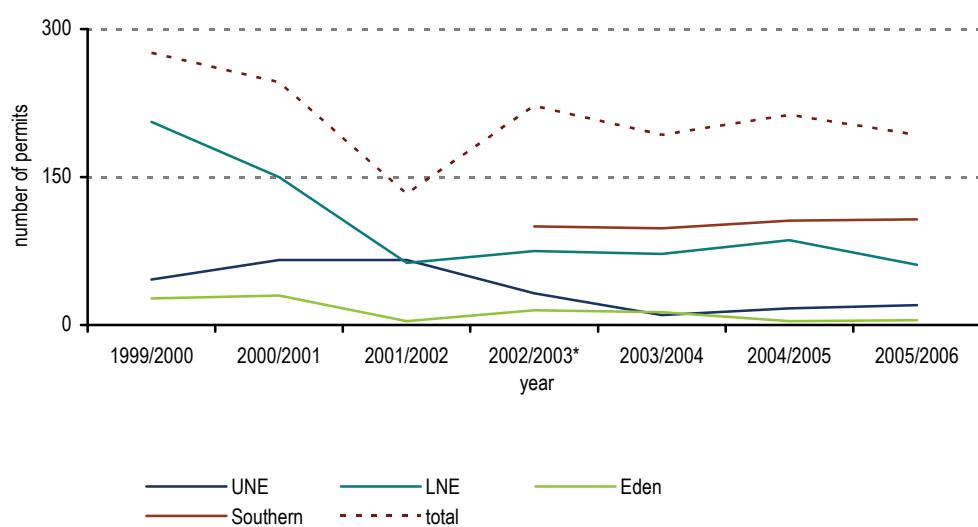
No data for the number of visits made to State forests were available for this report. However, Forests NSW does provide some measure of recreational use through data that details the number of permits issued for recreational and educational activities.

A variety of recreational and educational activities occur in State forests. When organised recreational and educational activities take place in State forests a permit may be required. Recreational and educational activities that may require a permit include horse riding, car rallies, bushwalking and military training exercises. In 2005/2006, permits were issued for 193 recreational or educational

activities in State forests. Permits were issued for activities largely in the Southern (107) and LNE regions (61).

The total number of permits issued for activities in State forests has, once again, remained relatively stable this year. As shown in figure 2-6-A, the total number of permits issued increased in 2002/2003, due to the inclusion of data for the Southern region. However, the total number of permits have only shown minor annual variations.

Figure 2-6-A: Permits issued for recreation/educational activities in State forests – all regions



* monitoring began in the Southern region in 2002/2003

Source: Forests NSW data

Recreation/tourism facilities

Indicator 6.3: Availability and usage of recreation/tourism facilities (Eden region)
(Data has been provided for all regions.)

The total number of recreation/tourism facilities on State forests decreased slightly this year when compared with 2004/2005 figures.

No new data are available from PWD on this indicator. Data contained within last year's annual report were sourced from the 2005 *State of the Parks* survey. The *State of the Parks* survey takes place every 2-3 years. As such, new *State of the Parks* survey data are expected for next year's report.

Forests NSW continues to provide data for the actual number of facilities available on its estate. The total number of recreation and tourism facilities in State forests in 2005/2006 totalled 143 (table 2-6-C). The majority of these recreational and tourism facilities were within the LNE (64) and Southern (53) regions. Overall there was a 5% decrease in the number of facilities across all forest agreement

regions. This is mainly due to an 18% reduction of facilities within LNE region, in particular a decrease in the amount of marked forest walks and camping areas. In the Southern region, the number of facilities has increased by 15% due to an increase in the number of roadside rest and picnic areas, marked forest walks and camping areas. The number of recreation and tourism facilities in the UNE and Eden regions remained unchanged in 2005/2006.

Table 2-6-A: Recreation/tourism facilities in State forests – all regions – 2005/2006

Recreational facilities provided	Region				total
	UNE	LNE	Eden	Southern	
Roadside rest area/picnic area	2	17	8	15	42
Forest drives (marked)	2	1	1	0	4
Forest walks (marked)	3	13	2	9	27
Lookouts	1	7	0	6	14
Camping areas	1	19	3	17	40
Camps/huts/cottages	1	7	2	6	16
Other	0	0	1	0	1
Total facilities	10	64	17	53	144

Source: Forests NSW data

In addition, across the forest agreement regions, 3 053 hectares of State forest have a designated ‘special value’ of tourism and recreation under the forest management zoning system. This value is applied to sites that have established recreation facilities or sites that are planned and suitable for development.

Employment

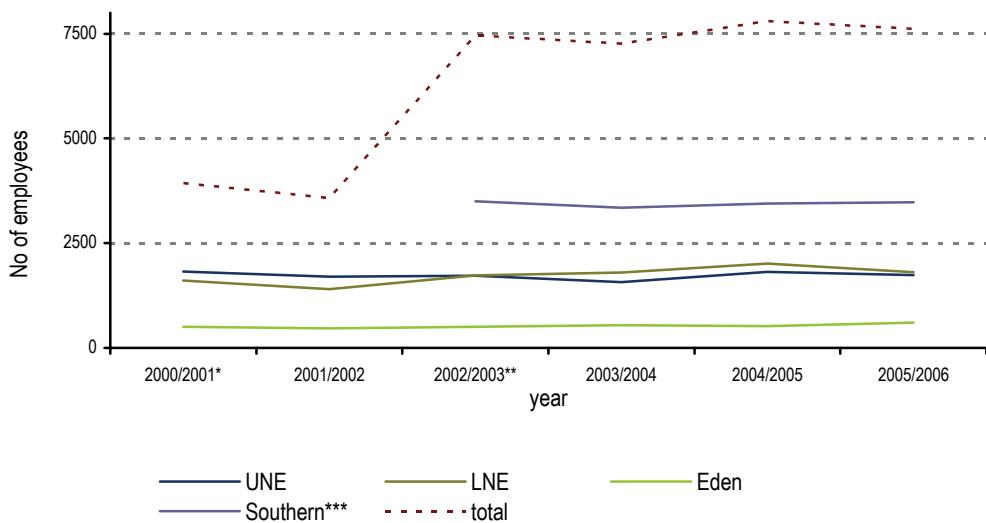
MIG Indicator 6.5.a: Direct and indirect employment in the forest sector and forest sector employment as a proportion/percentage of total employment (UNE, LNE, Eden, Southern regions)
 Indicator 6.4: Employment numbers by type across all forest users in the Eden region

Employment in the forest sector increased this year when compared with 2004/2005 figures.

Employment in the forest management and conservation sector is important to many regional economies. Data within this indicator have been provided by Forests NSW (direct and indirect employment) and PWD (direct employees only).

In 2005/2006, the estimate for total employment in forest sector decreased slightly (figure 2-6-B). At the end of 2005/2006, combined employment by Forests NSW and PWD was estimated to be 7 615 equivalent full-time (EFT) employees.

Figure 2-6-B: Total PWD (direct) and Forests NSW (direct and indirect) regional employment – all regions



* Data for 1999/2000 has not been included as an accounting error was made in employment figures for Forests NSW and incomplete data were available for employment by the PWD.

** Marked rise in total employment in 2002/2003 due to the inclusion of employment figures for the Southern region.

*** The employment figures in the Southern region (from 2002/2003 to 2004/2005) have changed this year. This is because the figures supplied from Forests NSW in previous annual reports have been found to be erroneous.

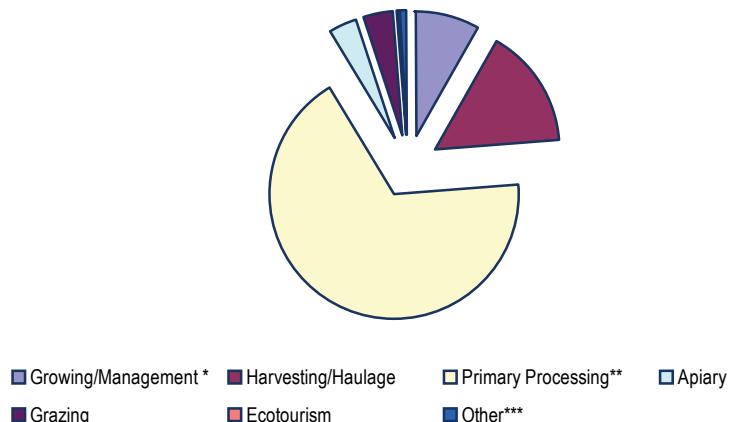
Source: PWD and Forests NSW data

Forests NSW – direct and indirect employment

The direct and indirect employment figures provided by Forests NSW cover a range of activities, including growing and managing of forests, harvesting and haulage, primary processing, apiary, grazing and other activities (such as gravel extraction and plantation establishment contractors).

Estimated figures provided by Forests NSW for the total direct and indirect employment in the forest sector across all regions totalled 6 676 EFT positions for 2005/2006. The largest employment sector is primary processing, which makes up 67% of its total employment across all forest agreement regions (figure 2-6-C). Harvesting and haulage accounts for 16% and growing and managing of forests accounts for 8% of employment.

Figure 2-6-C: Forest sector employment (direct and indirect) – all regions – 2005/2006



* Includes administration, maintenance activities, consultants and contractors.

** Processing occurs at a site where the input is raw material supplied by Forests NSW.

*** Includes gravel extraction, forest product removal and miscellaneous timber harvesting.

Source: Forests NSW data

PWD direct employment

PWD provide data on direct employment only. This is because multipliers have not been developed for calculating indirect employment in relation to the park system. PWD direct employment figures are based on an establishment plan provided from Aurion (a central human resource database).

In 2005/2006, there were 304, 198, 281 and 56 staff employed within the LNE, UNE, Southern and Eden regions respectively. In comparison with figures supplied from 2004/2005 this is a slight increase in employment numbers.

Gross income

Indicator 6.5: Gross income index related to forests (Eden region)

No outcomes to report

No new data are available from PWD or Forests NSW for this indicator

Places of cultural significance

Indicator 6.4.c:	Change in condition and number of recorded places, artefacts, sites, buildings or other structures (UNE, LNE regions)
Indicator 6.6:	Change in condition and number of recorded places, artefacts, sites, buildings or other structures (Eden region)
Indicator 6.4.c(i):	Change in condition and number of Aboriginal cultural heritage features within the forest estate, including recorded places, artefacts, sites, or other structures (Southern region)
Indicator 6.4.c(ii):	Change in condition and number of historic heritage features within the forest estate including recorded places, artefacts, sites, buildings or other structures (Southern region)

Forests NSW surveys identified an additional 87 new Aboriginal sites this year

Cultural, social and aesthetic cultural values of an area are often difficult to quantify. More often than not such values are intangible and their significance subjective. However, one indicative measure of how well forests are being managed for cultural values is the number of places or areas of cultural, social or aesthetic significance identified and/or conserved.

Aboriginal cultural heritage in the DEC estate

In 2005/2006, the total number of Aboriginal objects recorded on-park totalled 4,529 (figure 2-6-D), with a further 15,153 Aboriginal objects recorded off-park (figure 2-6-E) across all regions. Overall there has been a decrease in the total number of Aboriginal objects recorded on-park and off-park when compared with the figures provided for 2004/2005.

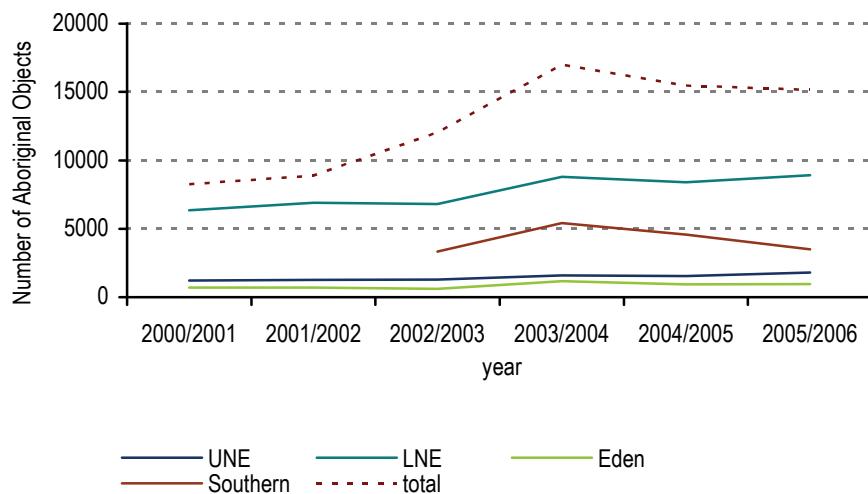
Rather than a result of a change in the number of Aboriginal objects per region, it is likely that the reported changes are due to differences in the methodology of calculating the total number of sites between 2004/2005 and 2005/2006. The Aboriginal Heritage Information Management System (AHIMS) database is also constantly under review and subject to addition and subtraction of records, this may have contributed to the reported overall decrease in Aboriginal objects.

Specifically for the Southern region, the total number of Aboriginal objects recorded on- and off-park has decreased substantially when compared with 2004/2005 figures.

However, for the UNE, LNE and Eden regions there was a slight increase in the total number of Aboriginal objects recorded on- and off-park. This could be a result of survey and research activity, and increased community participation in providing information to AHIMS.

Updates on the condition of Aboriginal objects are not available for the 2005/2006 reporting period. Data contained within last year's annual report was sourced from the 2005 *State of the Parks* survey. The *State of the Parks* survey takes place every 2-3 years. As such, new *State of the Parks* survey data are expected for next year's report.

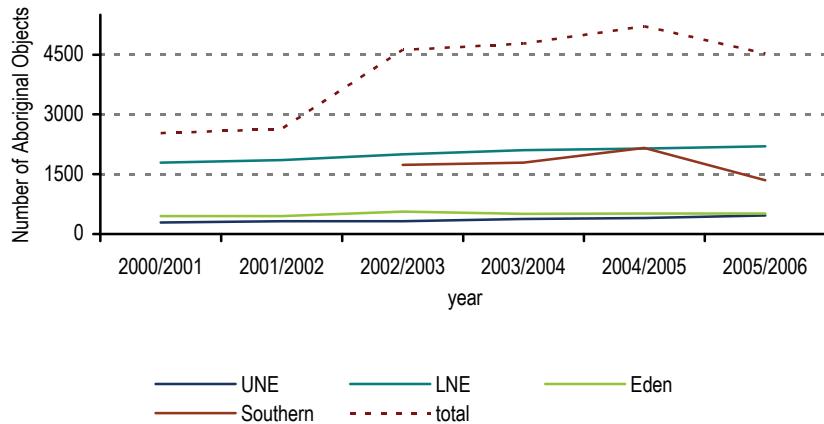
Figure 2-6-D: Number of Aboriginal objects recorded off DEC estate – all regions



Note: Number of sites off-park includes those on private land and other public tenure.

Source: PWD data (AHIMS)

Figure 2-6-E: Number of Aboriginal objects recorded in DEC estate – all regions



Source: PWD data (AHIMS)

Aboriginal cultural heritage in State forests

Forests NSW surveys for Aboriginal sites as part of its pre-harvest survey process. If a site is detected, the local Aboriginal land council or indigenous representatives are contacted to decide the protection given to the site. Forests NSW also seeks advice about the long-term management of these sites.

Forests NSW also uses the PWD AHIMS system to check that the Forests NSW system has not missed any detected sites. In addition, previously detected sites are also protected from the impact of harvesting operations.

In 2005/2006, Forests NSW surveys identified 87 new Aboriginal sites in State forests. New sites were mostly located in the LNE region (61). They were also found in the Southern (14), Eden (11) and UNE regions (1). No sites of Aboriginal significance were destroyed²³ during 2005/2006.

Historic (non-indigenous) cultural heritage

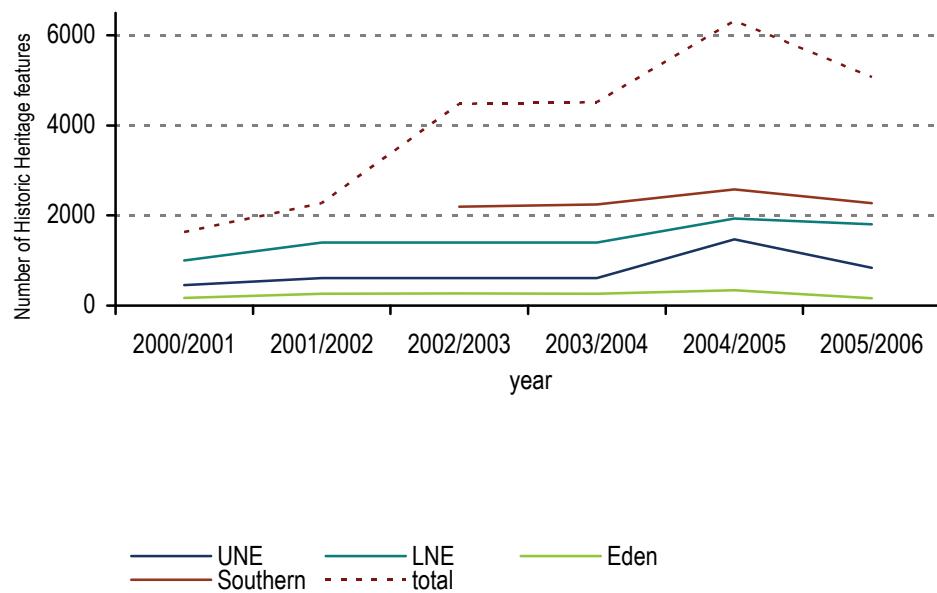
In 2005/2006, a total of 5 075 historic items and places have been recorded on-park across all regions (Figure 2-6-F), which is a decrease of 1 248 sites on the 2004/2005 figure. This can principally be attributed to a decrease in the total number of historic places recorded in the Southern region.

It is likely the reported changes are due to differences in the methodology for calculating the total number of historic places recorded between 2004/2005 and 2005/2006, rather than a change in the number of items or places recorded per region. In addition, as the Historic Heritage Information Management System (HHIMS) database is constantly under review and subject to addition and subtraction of records, this may have contributed to the decrease in sites within the regions.

²³ The destruction of sites requires licence approval from DEC and consultation with the relevant local Aboriginal land council.

Updates on condition of historic heritage features are not available for the 2005/2006 reporting period. Data contained within last year's annual report was sourced from the 2005 *State of the Parks* survey. The *State of the Parks* survey takes place every 2-3 years. As such, new *State of the Parks* survey data are expected for next year's report.

Figure 2-6-F: Number of historic cultural heritage objects recorded – all regions



Source: PWD data (HHIMS)

Historic heritage features on State forests

Forests NSW Regions maintain a Section 170 Heritage and Conservation Register using the State Heritage Inventory database developed by the NSW Heritage Office that identifies sites and objects of heritage significance for internal reference. Site details are also submitted to the NSW Heritage Office for inclusion on the State Heritage Register when required. All sites of non-indigenous exploration and settlement that are assessed and recognised to be of local or regional historical significance are also incorporated within Forests NSW GIS system. Potential buffers around significant sites are incorporated into the FMZ system.

The total area of State forest zoned for heritage value across the regions was 3 242 hectares, with a further 21 752 hectares zoned mainly for aesthetic value. Most of these areas are located within the Eden and Southern regions.

Criterion 7 – Legal, institutional and economic frameworks

Legal framework

MIG Indicator 7.1 (narrative): Extent to which the legal framework (laws, regulations, guidelines) supports the conservation and sustainable management of forests (UNE, LNE, Eden, Southern regions)

The legal framework for sustainable management of forests continued to be developed and implemented this year.

Additions and changes to legal framework

The legal framework for forests and forest management is extensive. It includes legislation, amendments to existing legislation, policies, guidelines and codes of practice.

Reporting against this indicator is at a statewide level and when any policy or other document is specific to a region, it is indicated. The following discussion includes only information on the legal framework for forests and forest management not previously reported.

National Park Estate (Reservations) Act 2005

The *National Park Estate (Reservations) Act 2005* was assented to on the 17 November 2005. The Act has provided for the transfer of around about 6 100 hectares of State forest, in the Southern region, to national parks and state conservation areas. Refer to chapter 1 for more details.

Native Vegetation Act 2003 and Native Vegetation Regulation 2005

The *Native Vegetation Act 2003* and *Native Vegetation Regulation 2005* commenced in December 2005. The Act and Regulation replace the *Native Vegetation Conservation Act 1997*.

The *Native Vegetation Act 2003* establishes the legal basis for ending broadscale clearing unless the clearing improves or maintains environmental outcomes. The *Native Vegetation Act 2003* also encourages revegetation and rehabilitation of land with native vegetation by providing landholders with incentives for good land management (DNR 2006).

The Native Vegetation Regulation provides the framework for how the Act will work operationally. The Regulation was developed after extensive consultation with a number of stakeholders. Provisions within the Regulation include:

- the form and content of property vegetation plans (PVPs) and how they will be recorded
- information about PVPs and development consents
- clearing without approval (including regrowth and routine agricultural management activities)
- the methodology for assessing whether a clearing proposal passes the ‘improve or maintain’ test required by the Act

- Catchment Management Authority (CMA) discretionary powers (DNR 2006).

Further details of legislation administered by DEC and DPI and other legal changes that have occurred during 2005/2006 can be found in the *DEC Annual Report 2005-06* (pages 160–162) and the *NSW DPI Annual Report 2005-06* (pages 189–190). Details of legislation administered by DNR and legislative changes that occurred during 2005/06 can be found in the *DNR Annual Report 2005-06* (appendix 9).

Extent to which legal framework provides for ecologically sustainable forest management in State forests and on DEC estate

In 2005/2006, as part of data provision for the Commonwealth *State of the Forest 2008* reporting process, Forests NSW and PWD rated the extent to which the existing legal framework, applicable to their tenure, provided for ESFM. The ESFM components considered included forest management planning and review; and public and indigenous participation. This detail is provided in table 2-7-A. Forests NSW and PWD also considered whether the existing legal framework provided for best practice for a number of forest activities (see detail provided in table 2-7-B). These tables indicate that Forests NSW and PWD consider that the existing legal framework overwhelmingly provides for the various ESFM aspects and coverage of forest activities.

Table 2-7-A: Extent that legal frameworks provide for ecologically sustainable forest management

ESFM aspect. Extent to which the legal framework provides for:	State forests	DEC estate
Forest management planning and review:		
Accountable management body	Y	Y
Dispute resolution process	Y	Y
Forest management planning	Y	Y
Management review	Y	Y
Planning for environmental values	Y	Y
Planning review	Y	Y
Policy review	Y	Y
Property rights	Y	Y
Periodic assessment of forest-related resources	Y	Y
Indigenous participation:		
Formal indigenous participation in management	Y	P
Indigenous participation in planning	Y	Y
Recognition of cultural values	Y	Y
Recognition of Native Title Rights	Y	Y
Has mechanisms to recognise the customary and traditional rights of Indigenous peoples	Y	P
Traditional management on relevant public land (e.g. joint management/co-management)	P	Y
Access* to forests for traditional activities		
Access to Indigenous cultural heritage on forest land	Y	Y
Allows for the performance of traditional practices	Y	P
Allows for the protection of indigenous intellectual property	Y	P
Public participation:		
Legislation requires broad-based public consultation for forest-related policy	Y	Y
Legislation requires broad-based public consultation to develop forest-related management plans	Y	Y
Legislation requires publication of specific forest-related information	Y	P
Freedom of information legislation allows public access to information related to forests	Y	Y
Other aspects		
Recognition of scientific values	Y	Y
Recognition of voluntary reserves on private land	N	Y
Regulation of forest clearing	Y	Y
Resource assessment	Y	P
Secure land tenure	Y	Y
SFM an explicit objective	Y	P

Ratings

Y = Yes. The legislation exists and is fairly comprehensive.

P = Partly. The legislation or mechanism exists but does not cover all aspects or is limited in its application.

N = No. The legislation does not exist.

* Access includes an ability to enter and pursue activities such as foraging, hunting, or ceremonial.

Source: PWD and Forests NSW data

Table 2-7-B: Extent that forest activities are covered by legal frameworks in State forests and on DEC estate

Forest Activities	State forests	DEC estate
Access to the forest		
Planning and sighting roads	Y	Y
Road design and construction	Y	Y
Upgrading existing roads and tracks	Y	Y
Rock quarries and gravel pits	Y	Y
Bridge, causeway and ford construction	Y	Y
Road maintenance	Y	Y
Harvesting		
Design, planning and equipment	Y	-
Wet weather	Y	-
Snig tracks and landings	Y	-
Water quality and stream protection	Y	-
Salvage operations	Y	-
Steep country	Y	-
Timber harvesting plans	Y	-
Conservation of other values		
Flora	Y	Y
Fauna	Y	Y
Rare or endangered species	Y	Y
Landscape	Y	Y
Archaeology (cultural heritage)	Y	Y
Geomorphology	Y	Y
Care of soils	Y	Y
Water quality and flow	Y	Y
Forest establishment		
Reforestation	Y	Y
Maintaining forests		
Fire management	Y	Y
Pest, disease, weed control	Y	Y
Use of chemicals	Y	Y
Thinning	Y	-
Non-wood products/uses	Y	Y
Apiary	Y	Y
Grazing	Y	-
Recreation	Y	Y
Socio-economic		
Occupational health and safety	Y	Y

Ratings

- Y = Yes. There is a legislative requirement to apply best practice for this activity in this tenure category.
- P = Partly. There is a legislative requirement to apply best practice for this activity in this tenure but this requirement does not cover all aspects or is limited in its application.
- N = No. There is no legislative requirement to apply best practice for this activity in this tenure.

Source: PWD and Forests NSW data

Legal Framework For Aboriginal Interests

During 2005/2006, DEC continued to investigate ways of improving and updating the provisions of the *National Parks and Wildlife Act 1974*, which regulate and protect Aboriginal cultural heritage. DEC consulted other state government agencies involved in Aboriginal heritage and planning, Aboriginal peak stakeholder bodies and Aboriginal communities, to review ways in which these provisions, largely unchanged since 1974, can be brought more into line with the major changes that have occurred in the planning system.

In March 2006, the Minister for the Environment appointed 11 members to the Aboriginal Cultural Heritage Advisory Committee. The members, who come from across NSW, are listed in appendix 5.

The Minister, supported by DEC, hosted a two-day induction workshop at Parliament House, Sydney, on 11 and 12 May 2006. The workshop provided committee members with an opportunity to learn about the role and function of DEC and the Minister's expectations of the committee. DEC regards the committee as its principal advisory body on Aboriginal cultural heritage in NSW. The committee will contribute to the development of statewide policies, programs and approaches to Aboriginal cultural heritage management.

Public Participation in Policy Development

For information in relation to public participation during 2005/2006, specifically in relation to the National Parks and Wildlife Advisory Council, National Parks and Wildlife Regional Advisory Committees refer to page 64 of the *DEC Annual Report 2005/2006*. For additional information on these committees and other significant committees refer to appendix 5 of the *DEC Annual Report 2005/2006*.

Data on non-indigenous and indigenous participation in park management was contained within last year's annual report and was sourced from the 2005 *State of the Parks* survey. The *State of the Parks* survey takes place every 2-3 years. As such, new *State of the Parks* survey data are expected for next year's report.

Management policies, guidelines and codes of practice

Both PWD and Forests NSW have numerous policies and guidelines that assist in supporting the conservation and sustainable management of forests. Information provided in this section is applicable to forest agreement areas but is not necessarily on a forest agreement scale (for example, many policies are applicable statewide).

DEC policies and guidelines

A list of policy documents called the Summary of Affairs is published on the DEC website (www.environment.nsw.gov.au). These documents include corporate policy documents, scientific policies and manuals, environmental guidelines, field policies and procedures. Many of these documents are also available on the DEC website, while others may be purchased.

Table 2-7-C contains a list of non-legislative policies and guidelines that are specifically relevant to park management and ESFM. The dates in brackets indicate when the policy was last reviewed. It does not include additional policies that affect PWD in the areas of finance, OH&S and HR.

Table 2-7-C: Major non-legislative DEC park management policies relevant to ESFM

Major non-legislative policies relevant to park management
Access to inholdings (Feb 2003)
Adaptive reuse leases policy (Feb 2003)
Adventure activities policy (July 2002)
Beekeeping policy (July 2002)
Boundary fencing policy (2005)
Cultural heritage conservation policy
Cultural heritage community consultation policy
Commercial recreation policy (July 2002)
Cycling policy (June 2003)
Discovery Program policy and guidelines (Sept 2003)
Filming and photography policy (July 2002) (under review)
Firewood policy (July 2002)
Firearms policy (July 2002)
Fire management manual 2005 (updated yearly)
Hang-gliding and paragliding policy
Koala rehabilitation policy
Leases for permanent residential accommodation policy (Feb 2005)
Memorandum of understanding policy (July 2002)
Military activities policy (July 2002)
Neighbour relations policy (July 2002)
Orienteering, rogaining and geocaching policy (Sept 2002)
Parks name policy (March 2003)
Pets policy (Aug 2002)
Policy on the translocation of threatened fauna in NSW
Policy on management of native birds that show aggression to people (Aug 2003)
Recreational horse riding policy (May 2006)
Rehabilitation of fauna policy (July 2002)
Revocation of land policy (July 2002)
Soil conservation and rehabilitation policy (July 2002) (to be repealed and replaced by the soils policy statement)
Taxidermy and preserved fauna policy (July 2002) (to be repealed and replaced by the taxidermy and preserved fauna policy statement)
Threatened species information disclosure policy (updated Feb 2005)
Trade of fauna policy (July 2002)
Vehicle access policy (July 2002)
Visitor safety policy (July 2002)
Voluntary conservation agreements policy (under review)
Volunteers policy and guidelines (under review)
Walking tracks policy (July 2002)
Wild dog policy
Plan of management manual
Environmental planning and assessment manual
Property and leasing manual

Forests NSW policies, guidelines and codes of practice

Forests NSW has a number of policies, codes and guidelines that assist in sustainable forest management. A number of Forests NSW's policies, and the most recent Summary of Affairs, can be found on the Forests NSW website (www.dpi.nsw.gov.au/forests).

DNR Code of Practice for Private Native Forestry

A draft Code of Practice for Private Native Forestry has been developed by DNR following discussions with various stakeholders. It is proposed that the draft code will be enacted under an amendment to the *Native Vegetation Act 2003* and will receive biodiversity certification under the *Threatened Species*

Conservation Act 1995. The draft code includes provisions for the protection of cultural heritage. The draft code is expected to be on public display in July and August 2006.

Extent to which non-legislative policy framework provides for ecologically sustainable forest management on State forests and DEC estate

As part of data provision for the Commonwealth *State of the Forest 2008* reporting process, Forests NSW and PWD rated the extent to which their respective policy frameworks provided for ESFM. The ESFM components considered included forest management planning and review, and public and indigenous participation (table 2-7-D). The table indicates that Forests NSW and PWD believe that the existing non-legislative policy framework overwhelmingly provides for the various aspects of ESFM aspects.

Table 2-7-D: Extent that non-legislative policy frameworks in State forests and on DEC estate provide for ESFM

Extent to which the non-legislative policy framework provides for:	State forests	DEC Estate
Forest management planning and review:		
Accountable management body	Y	Y
Dispute resolution process	Y	Y
Forest management planning	Y	Y
Management review	Y	Y
Planning for environmental values	Y	Y
Planning review	Y	Y
Policy review	Y	Y
Property rights	Y	Y
Periodic assessment of forest-related resources	Y	Y
Public participation:		
Broad-based public consultation for forest-related policy	Y	Y
Broad-based public consultation to develop forest-related management plans	Y	Y
Publication of specific forest-related information	Y	P
Allows public access to information related to forests	Y	Y
Indigenous participation:		
Indigenous participation in management	Y	Y
Indigenous participation in planning	Y	Y
Recognises cultural values	Y	Y
Recognises native title rights	Y	P
Recognises the customary and traditional rights of indigenous peoples	Y	P
Allows traditional management on relevant public land (e.g. joint management/co-management)	Y	P
Allows access for traditional activities	Y	P
Allows access to indigenous cultural heritage	Y	P
Allows the performance of traditional practices	Y	P
Allows for the protection of indigenous intellectual property	Y	Y
Other aspects		
Recognition of scientific values	Y	P
Recognition of voluntary reserves on private land	Y	Y
Regulation of forest clearing	Y	Y
Resource assessment	Y	P
Secure land tenure	Y	Y
SFM an explicit objective	Y	P

Ratings

Y = Yes. This aspect of SFM is covered fairly comprehensively by policies in our jurisdiction.

P = Partly. This aspect of SFM is only partially covered (or has limited application) by policies in our jurisdiction.

N = No. This aspect of SFM is not covered by policies in our jurisdiction

Institutional framework

MIG Indicator 7.2 (narrative): Extent to which the institutional framework supports the conservation and sustainable management of forests (UNE, LNE, Eden, Southern regions)

The institutional framework for sustainable management of forests continued to be developed and implemented this year

Public education and awareness

Forests NSW activities

Forests NSW employees attended an estimated 763 community forums, meetings or presentations across all forest agreement regions during 2005/2006 (refer to table 2-7-E). Of the total number, 187 were within the UNE region, 315 in the LNE region, 97 in the Eden region and 164 in the Southern region. These forums, meetings or presentations covered a wide range of matters related to forest management, including community bushfire management, cultural management, feral animal and noxious weed control and interactions with industry stakeholders.

Table 2-7-E: Forests NSW staff attendance at community fora – all regions – 2005/2006

Community Forum Categories	UNE	LNE	Eden	Southern
Catchment management	14	0	1	3
Community bushfire management	24	46	22	34
Community/school/education	12	21	7	5
Conservation/environmental	10	14	6	6
Cultural management	63	81	3	6
Feral animals/noxious weed control	12	3	3	0
Flora and fauna management	10	4	0	5
Forestry/forest practices	11	39	19	47
Industry/stakeholders	12	33	5	26
Local emergency management	4	2	3	8
Local government	5	12	3	5
Other	3	42	14	1
Recreation/tourism	5	14	2	10
Regional planning/RFA	2	4	9	8
Total	187	315	97	164

PWD activities

Data on the levels of awareness and/or education programs and how far these meet management needs and visitor expectations was contained within last year's annual report. This data was sourced from the 2005 *State of the Parks* survey. The *State of the Parks* survey takes place every 2–3 years. As such, new *State of the Parks* survey data are expected for next year's report.

In addition, DEC continues to maintain a number of programs and projects that raise awareness of, or involve the public in, forest conservation and management. These are described below.

PWD Discovery Program

This program delivers on legislative responsibilities for interpretation and education under the *National Parks and Wildlife Act 1974*, the *Wilderness Act 1987*, *Threatened Species Conservation Act 1995*, *Marine Parks Act 1997* and *Two Ways Together* (the NSW Government's Aboriginal Affairs Plan).

For updates on key achievements of the Discovery Program for 2005-06 refer to pages 69 and 70 of the *DEC Annual Report 2005-06*.

Volunteers

For information in relation to volunteers and the results for this year's refer to page 65 of the *DEC Annual Report 2005-06*.

Voluntary Conservation Agreements (VCAs), Wildlife Refuges and Land for Wildlife

For updated figures to June 2006 on VCAs, Wildlife Refuges and Land for Wildlife refer to pages 43 and 45 of the *DEC Annual Report 2005-06*.

Electronic Service Delivery

For updated figures on visits to DEC websites during 2005/2006 refer to page 6 of the *DEC Annual Report 2005-06*, and pages 7 and 179 for the number of information requests handled by DEC Information Centre.

For additional information relevant to this indicator refer to pages 175 and 176 of the *DEC Annual Report 2005-06*. This information is specifically in relation to DEC's statement of affairs, which is a requirement under the *Freedom of Information Act 1989*.

During 2005/2006, DEC published a number of documents in a number of formats, including print and online. These documents encompass corporate publications, discussion papers and draft plans, guidelines and advisory documents, environmental and technical reports, fire management plans and strategies, plans of management, recovery plans, education and community relations, brochures, booklets and leaflets, new or revised parks and reserves brochures, newsletters and magazines and posters. For a comprehensive list of all the above documents refer to appendix 13 of the *DEC Annual Report 2005-06*.

Planning, assessment and policy review

DEC State of the Parks Program

DEC's State of the Parks program continued to be developed in 2005/2006. For more details refer to chapter 1.

Park Management Planning

For updated figures to June 2006 for plans of management for national parks and nature reserves around NSW refer to page 65 of the *DEC Annual Report 2005-06*. For details about the number of plans of management completed for the UNE, LNE, Eden and Southern regions refer to appendix 1.

Conservation Compliance Audit

In 2005/2006, there were a number of conservation compliance audits as part of the 2005/2006 plans of management self-audit program. These audits were carried out for: Dharug National Park (LNE), Glenrock State Conservation Area (LNE), Hat Head National Park (LNE), Torrington State Conservation Area (UNE), Eurobodalla National Park (Southern) and Tinderry Nature Reserve (Southern).

Forests NSW's ESFM plans

Forests NSW's revised Regional ESFM Plans for the Upper North East, Lower North East and Eden regions were finalised in August 2005. Regional ESFM Plans for the South Coast and the Tumut sub-regions of Southern region were also finalised in August 2005. For more details refer to chapter 1.

Staff training and development

No new data are available from PWD or Forests NSW for this indicator. For updated figures to June 2006 for PWD employees by classification, refer to appendix 6 of the *DEC Annual Report 2005-06*.

Enforce laws, regulation and guidelines

For information on updated figures and information on Forests NSW's compliance with the Eden, Southern, UNE and LNE IFOAs, and for internal compliance findings refer to chapter 3 of this report.

Data for the levels of management and impacts of illegal activities within DEC estate was contained within last year's annual report. This data was sourced from the 2005 *State of the Parks* survey, which takes place every 2-3 years. As such, no new data were available for this reporting period. New *State of the Parks* survey data are expected for next year's report.

In 2005/2006, PWD provided information for the number FTE staff involved in enforcement of laws, regulations and guidelines of forest-related matters. Table 2-7-F provides this data.

Table 2-7-F: Number of staff involved in enforcement of laws, regulations and guidelines on forest-related matters – statewide

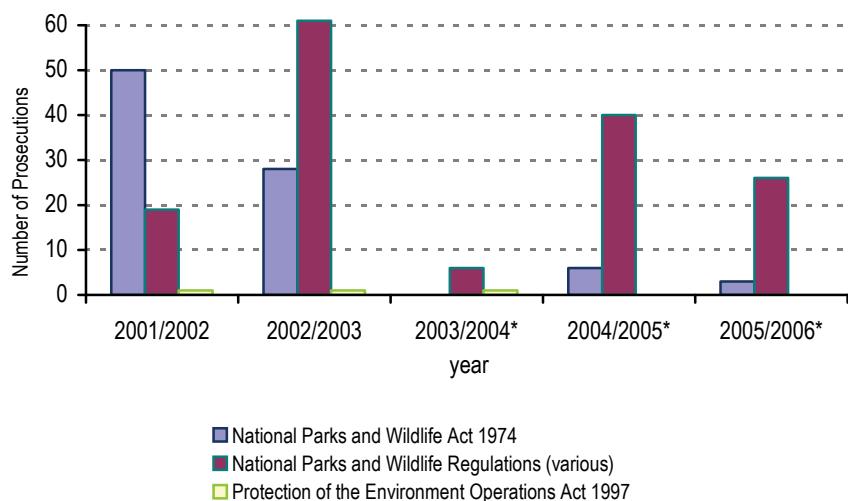
Officers with Delegated Authority	2001/02	2002/03	2003/04	2004/05	2005/06
Assist/district/area managers	79	77	77	78	82
Field officers	552	544	564	563	603
Trainee/rangers/senior rangers	253	260	253	256	273
Law enforcement officers	6	5	now handled by other DEC staff (not PWD)		
One-off authorisations	144	102	134	236	*authorisation process currently changing
	1034	988	1028	1133	958*

Source: PWD data

In 2005/2006, PWD also provided data for the number of prosecutions and infringements issued under the *National Parks and Wildlife Act 1974*, *Protection of the Environment Operations Act 1997* and various National Parks and Wildlife regulations. Figure 2-7-A provides details for the number of prosecutions under these various legislative instruments. For further detail on specific prosecutions

completed under parks, wildlife and Aboriginal heritage legislation during 2005/2006, refer to pages 21 and 167 of the *DEC Annual Report 2005-06*.

Figure 2-7-A: Number of prosecutions issued by PWD under selected Acts and Regulations – statewide



*Figures reported from 2003/04 onwards are for the PWD of DEC only. Prosecutions are now often carried out by other divisions within DEC.

Source: PWD data

DNR Plantation officers carry out audits of plantations authorised under the *Plantations and Reafforestation Act 1999* and the *Timber Plantations (Harvest Guarantee) Act 1995*. In relation to private native forestry activities, there has been enforcement action for breaches of the *Native Vegetation Conservation Act 1997*. Action varied from warning letters to prosecution in the local courts. For details of the number of prosecutions and warning letters issued under the *Native Vegetation Conservation Act 1997* and *Native Vegetation Act 2003* refer to the *Department of Natural Resources Annual Report 2005/06* at www.dnr.nsw.gov.au.

Capacity to measure and monitor change

MIG indicator 7.4 (narrative): Capacity to measure and monitor changes in the conservation and sustainable management of forests (UNE, LNE, Eden, Southern regions)

The ESFM criteria and indicators (within this report) are the main mechanism to monitor changes in the conservation and sustainable management of forests in the UNE, LNE, Eden and Southern regions. The indicators monitor the effectiveness of management practices and their impact on the social, economic and environmental values of forests. The adequacy of the existing indicators will be assessed as a part of the five-yearly reviews of forest agreements.

On a statewide scale monitoring of the DEC estate occurs through the *State of the Parks* reporting system (refer to chapter 1) and on State forest estate through *SEEing* reporting.

Research and development

MIG indicator 7.5 (narrative): Capacity to conduct and apply research and development aimed at improving forest management and delivery of forest goods and services (UNE, LNE, Eden and Southern regions)

Since the merging of several government agencies into the DEC in 2003, much of the research responsibility of PWD has been transferred to other divisions within DEC. Among DEC's research programs are projects focussing on weeds, pests and fire. All of these have implications for sustainable forest management but are not necessarily focussed just on forests and some are across tenures. Therefore, it is not possible to identify any specifically forest-related research done. PWD continues to take part in specific local project-based research, as well as supporting the work of other divisions, agencies and institutions in this area. For details of published papers by DEC staff for 2005/2006 that may be relevant to the ESFM Criteria and Indicators refer to appendix 14 of the *DEC Annual Report 2005/06* at www.environment.nsw.gov.au.

Research and development objectives of Forests NSW are delivered through DPI Science and Research, as well as through the Plantation and Tree Improvement units of Land Management and Technical Services. These groups provide strategic research support to the organisation's operation and service branches. The main focus of Forests NSW's research activities is on providing innovative science-based outcomes for forest resource development and sustainability. Details of Forests NSW research activities can be found in its *Research and Development – Annual Report 2005/06* at www.dpi.nsw.gov.au/forests

Other natural resource management agencies, such as DNR, also provide details of publications in their annual reports each year. These may be accessed through www.nsw.gov.au.

3

Compliance with the integrated forestry operations approvals

Introduction

Integrated Forestry Operations Approvals (IFOAs) provide the operational framework for the conduct of forestry operations in State forests and Crown timber land. The approvals, made under the *Forestry and National Park Estate Act 1998*, contain non-liscence terms and terms of licences under the *Protection of the Environment Operation Act 1997* (Environment Protection Licence (EPL)), *Threatened Species Conservation Act 1995* (Threatened Species Licence (TSL)) and the *Fisheries Management Act 1994* (Fisheries Licence). Threatened Species Licences and the Environment Protection Licences are administered by EPRD (DEC) and the Fisheries Licence administered by DPI–Fisheries. An IFOA enables authoritative, unambiguous and consistent environmental regulation of native forest harvesting operations. There are four IFOAs currently in place that cover each forest agreement region.

In 2005/2006, amendment 4 to the Eden IFOA commenced. This amendment defines “exclusion zones” (where logging is prohibited) for *Heleioporus australiacus* (giant burrowing frog), *Isoodon obesusulus* (southern brown bandicoot) and the *Pseudomys fumeus* (smoky mouse) by a data layer/map. The amendment operates until the end of February 2008, during which time the original conditions for the species concerned are suspended. DEC and Forests NSW will develop new permanent prescriptions for each animal.

EPRD (DEC) regularly audits Forests NSW’s pre-operational planning and operations in forest regions covered by an IFOA to assess adherence to EPL and TSL requirements. In 2005/2006, there were eight audits. As a result of these audits Forests NSW was issued with three penalty notices; two clean-up notices and seven warning letters; was required to undertake remedial work at 56 sites; seek expert soil conservation advice for 13 sites; and provide an engineering assessment for one site.

DPI–Fisheries did not report any breach of the Fisheries Licence in 2005/2006.

FRIP within DNR oversees the application of the non-liscence terms of the IFOAs and also investigates complaints in relation to these terms. In 2005/2006, no public complaints were received in relation to non-liscence terms.

IFOA amendments

Amendment 4 for the IFOA in the Eden region commenced on the 23 March 2006. The amendment, to the TSL in the IFOA, essentially suspends site-based protective prescriptions for the giant burrowing frog (*Heleioporus australiacus*), southern brown bandicoot (*Isoodon obesulus*) and smoky mouse (*Pseudomys fumeus*), and replaces them with landscape-based prescriptions. The new prescriptions allow for the protection of potential habitat for each of the species rather than protection being centred on records of the species.

The amendment also suspends for approximately two years the requirement for Forests NSW to carry out pre-harvest surveys that specifically target these species.

The amendment also requires that management plans be developed for each of the species. The species management plans will provide for the collection of information to improve knowledge about each species, for the investigation of new approaches to managing each species and for monitoring the impacts of logging on the species and the persistence of the species in the landscape. The species management plans will be developed cooperatively between DNR, DEC and Forests NSW.

Environment Protection Licence and Threatened Species Licence

Introduction

DEC's role in the management of Forests NSW's forestry operations is to protect the aquatic environment from water pollution and protect threatened species and their habitats. Compliance with the conditions set out in the EPL and TSL, which are issued to Forests NSW, are the chief means by which this is achieved. These licences are contained within the IFOAs for the UNE, LNE, Southern and Eden regions.

TSL coverage is mandatory in all active native forestry operations. Forests NSW may exercise its right not to seek EPL coverage for certain operations; however, these operations are still subject to section 120 of the *Protection of the Environment Operations Act 1997*, which prohibits the pollution of waters.

Summary of Auditing Program

To determine Forests NSW's compliance with licence conditions and other relevant legislative requirements, EPRD (DEC) has developed an active audit program of Forests NSW forestry operations. The audit program ensures that Forests NSW is taking the required measures to protect the environment through planning and operational activities.

Non-compliance with conditions of the licences are dealt with through meetings with senior Forests NSW officers, issuing feedback or warning letters, clean-up notices, penalty notices or prosecution action as appropriate to the circumstances.

During 2005/2006, EPRD (DEC) conducted eight audits of Forests NSW pre-operational planning and operations in forest regions covered by an IFOA. As a result of these audits, Forests NSW was issued with three penalty notices, two clean-up notices and seven warning letters, required to undertake remedial work at 56 sites, seek expert soil conservation advice for 13 sites and provide an engineering assessment for one site.

The following details the outcomes of EPRD's (DEC) audit program in each forestry region.

Upper North East Region (UNE)

In the UNE region, EPL coverage applied to 38 separate forestry operations, there were 171 operations where harvesting occurred without EPL coverage and the TSL applied to 209 forestry operations. EPRD (DEC) conducted one audit, as a result of a community complaint regarding water pollution and threatened species breaches.

The audit identified 12 non-compliances with licence conditions. There were seven non-compliances related to the EPL requirements, which included:

- eroding road batters
- an unstable snig track crossing
- instances where trees had been harvested within filter strips.

EPRD (DEC) identified five non-compliances with TSL conditions, including:

- damage to retained trees;
- debris piled against retained trees; and
- riparian habitat protection zones not marked and subject to harvesting.

As a result of the audit, EPRD (DEC) provided verbal feedback and sent a warning letter to Forests NSW outlining the issues of non-compliance identified. EPRD (DEC) also required that expert soil conservation advice be sought for four sites and that remedial work be carried out at five locations.

Lower North East Region (LNE)

In the LNE region, the EPL applied to 27 forestry operations, there were 131 operations where harvesting occurred without EPL coverage and the TSL applied to 158 forestry operations.

During 2005/2006 EPRD (DEC) conducted four audits. Two audits were proactive and the other two were reactive. These audits identified 155 non-compliances of the EPL best practice conditions, including:

- eroding and slumping road batters
- trees felled from within and into filter strips
- inadequate road drainage on the approaches to stream crossings
- inefficient soil erosion and sediment control measures
- road drainage not discharging onto stable surfaces.

EPRD (DEC) identified 19 non-compliances against the TSL, which included:

- not keeping non-compliance register
- felling trees into and from within the protection zone
- retaining poor quality and damaged trees.

EPRD (DEC) also received four community complaints regarding potential water pollution and threatened species breaches in the LNE forest region. Two of these matters resulted in field audits by EPRD (DEC), one prompted a community field day and the other was resolved with a clarification letter.

As a result of these auditing activities in the LNE region, EPRD (DEC) provided feedback and sent three warning letters to Forests NSW regarding non-compliance with licence conditions. Forests NSW was required to undertake remedial work at 29 sites and seek expert soil conservation advice on seven occasions and provide an engineering assessment for one site. EPRD (DEC) issued Forests NSW with one clean-up notice and three penalty notices. During 2005/2006 EPRD (DEC) also issued Forests NSW with one clean-up notice and three penalty notices for audits conducted in 2004/2005.

Southern region

In the Southern region, EPL coverage applied to 27 forestry operations in the Southern region, there were 62 operations where harvesting occurred without EPL coverage and the TSL applied to 89 forestry operations.

During 2005/2006, EPRD (DEC) conducted two proactive audits of Forests NSW's operational and planning activities. These audits identified 87 non-compliances with the EPL, including:

- inadequate road drainage adjacent to crossings;
- road drainage not diverting on to stable surface;
- tree felled into filter strip; and
- failure to record commencement and cessation dates for roads and crossings.

EPRD (DEC) identified 20 non-compliances with the TSL, which included:

- retained trees felled;
- logging debris piled against retained trees;
- tree felled in protection zone; and
- register of non-compliances not kept.

EPRD (DEC) received four community complaints regarding potential water pollution and threatened species breaches in the Southern forest region. These matters were resolved by EPRD (DEC).

As a result of these auditing activities in the Southern forest region, EPRD (DEC) provided feedback and sent two warning letters to Forests NSW regarding non-compliance with licence conditions.

Forests NSW was required to undertake remedial work at 14 sites and seek expert soil conservation advice on one occasion.

Eden Region

The EPL applied to 119 forestry operations and the TSL applied to 119 forestry operations in the Eden region. There were no operations where harvesting occurred without EPL coverage.

EPRD (DEC) conducted one proactive audit within the region and identified a total of 91 non-compliances with licence conditions. Of these 83 non-compliances were with the EPL and included:

- road drainage not diverting on to stable surface
- snig track drainage exceeding specified distances
- inadequate planning of roads and crossings.

EPRD (DEC) identified eight non-compliances with the TSL, which included:

- lack of targeted surveys for species
- logging debris in exclusion zone
- logging debris piled against retained trees.

EPRD (DEC) received one community complaint regarding potential water pollution and threatened species breaches in the Eden forest region. This matter was resolved by EPRD (DEC).

As a result of these audits, EPRD (DEC) provided feedback to Forests NSW and issued one Warning Letter regarding non-compliance with the EPL and TSL. Forests NSW was issued with one clean-up notice, was required by EPRD (DEC) to undertake remedial work at eight sites and seek expert soil conservation advice on one occasion.

Fisheries Licence

DPI–Fisheries did not report any breach of the Fisheries Licence in any region during 2005/2006.

Non-Licence Terms

FRIP within DNR oversees the implementation and investigates complaints in relation to non-licence terms in the UNE, LNE, Eden and Southern IFOAs. FRIP also coordinates discussions about various IFOA implementation issues with DPI and DEC as they arise. No complaints about non-licence terms were received from the public during 2005/2006.

In 2005/2006, Forests NSW continued to draft a number of plans required under the non-licence terms, such as regional weed and feral animal management plans. Forests NSW also provided a number of documents in accordance with non-licence requirements. These documents included:

- an annual plan of logging operations;
- annual reports on logging operations; and
- a plan of forest products operations.

Forests NSW internal compliance program

Summary of Forests NSW internal compliance program

Forestry operations carried out in State forests and other Crown timber land are governed by the terms and conditions of IFOAs and Forests NSW's internal requirements (such as codes of practice) and occupational health and safety requirements. To ensure compliance, Forests NSW regularly monitors internal compliance. Any non-compliance requires corrective action to minimise any future re-occurrence. The Forests NSW internal audit system consists of a four-tiered approach:

- Tier 1 monitoring – on-site monitoring by the supervising forest officer, to ensure compliance with operational conditions.
- Tier 2 monitoring – on-site checking of Tier 1 by the supervising forest officer's supervisor to ensure correct application of standards.
- Tier 3 audits – independent audit of Tiers 1 and Tier 2 by regional staff not directly involved in the operation, and/or independent audit by the EMS Audit team from Forests NSW.
- Tier 4 audits – independent audit by Management Audit and Review Branch of Forests NSW.

All operations are covered by the audit procedure with risk assessments determining the focus of Tier 1 and Tier 2 monitoring and of the Tier 3 and Tier 4 audits.

Outcomes of Forests NSW internal compliance program

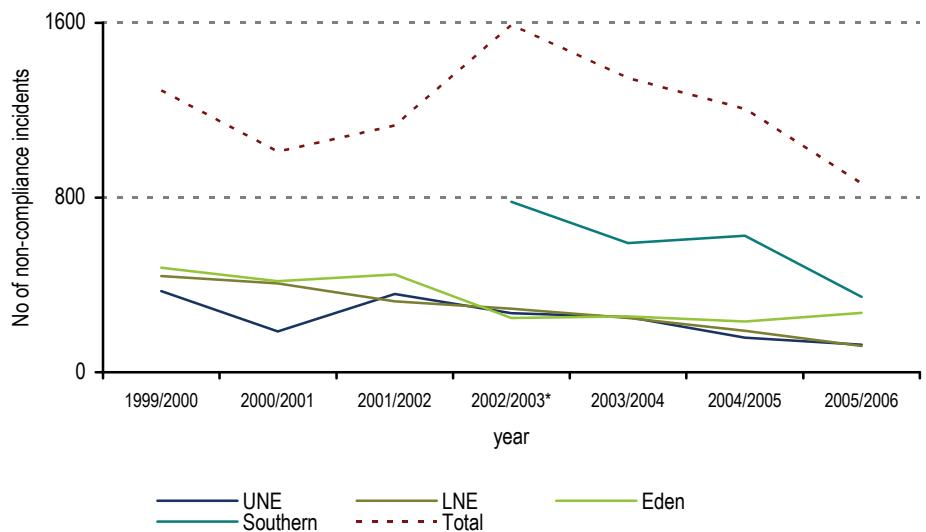
During 2005/2006, Forests NSW staff filled out 2 860 compliance sheets under the four-tier audit system across all regions. Of the 224 721 potential compliance areas identified and assessed under Tier one audits, 863 incidents of non-compliance were identified. This was a compliance rate of over 99.6%.

The 863 incidents across all regions represent a 28% decrease in non-compliance incidents when compared with 2004/2005 figures (figure 3-1-A). The number of incidents fell in all regions except the Eden region, which recorded a slight increase. Since 2002/2003, when monitoring first began for Southern region, there has been a 46% decrease in non-compliance incidents recorded across all regions.

Compliance checks were carried out for soil and water quality, flora and fauna, fish habitat and passage, and other issues such as safety. Non-compliance was relatively evenly spread across, soil

and water quality (32%), flora and fauna (32%) and other issues – such as safety (36%). No issues related to fish habitat and passage were recorded in any region.

Figure 3-1-A: Non-compliance incidents recorded through Forests NSW internal monitoring – all regions



* monitoring for the Southern region began in 2002/2003.

Source: Forests NSW data

In addition to the four-tier audits there was one external audit carried out on Forests NSW's EMS by an external EMS certification company. As discussed in chapter 1, Forests NSW is working towards accreditation of its EMS under the ISO 14001 standard.

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Appendix 1

Individual milestone progress

Appendix 1 provides details on the progress of individual milestones that are listed in the UNE (attachment 12), LNE (attachment 12), Eden (attachment 11) and Southern (attachment 9) Forest Agreements. See chapter 1 for further elaboration of some of these.

Definitions of milestones status

Completed	Indicates the milestone required the production of a document or plan that has been produced.
Implemented	Indicates that the milestone required a process or system to be put in place and it has been put in place.
Continuing	Indicates a product or process is ongoing or annually required.
In progress	Indicates a product or process is still being developed or is draft.
Deferred	Indicates that the action required by the milestone has been postponed.
No reporting required	Indicates an action that is no longer required to be reported or is reported in another way such as in the five-year review or on an 'as needed basis'.

Due date	Region	FA section*	Milestone	Progress
MANAGING THE FORESTS				
Environmental Management Systems				
2001	1 April	UNE, LNE, Eden	2.1.1 Att 3 Att 4	In progress FNSW finalised a number of corporate systems and management reviews in readiness to obtain its external accreditation in ISO 14001 (EMS) in June 2006. The ISO 14001 accreditation will cover both native and plantation operations. During 2005/2006, FNSW completed its review and implemented recommendations of the internal audits that were done in 2004/2005. The findings of these reports formed the basis for the external verifiers to assess FNSW's EMS systems.
2003	30 June	Sthn	2.1.1 Att 2 & 3 Att 6(2c)	In progress Complete and implement SFNSW EMS. Refer to milestone above.
2003	31 December	Sthn	2.1.1	In progress A further part of the EMS will be prepared to cover the planted forest component.
2004	1 April	UNE, LNE, Eden	2.1.2 Att 3	In progress DEC is developing a park management program that will provide the concept of an EMS. The program will define DEC's objectives for park management, and integrate park policy, planning, operations, monitoring, evaluation, reporting and feedback. It will provide the tools to make better decisions and will also improve coordination across DEC to make it easier for staff to access information to guide park management. Program components being developed include a park management guide, park facilities manual, asset maintenance system, visitation management plans and a planning review. Another component is the <i>State of the Parks</i> program, which will form an important part of the monitoring framework that will be part of an EMS. The first NSW <i>State of the Parks</i> report was released in November 2001 and provided an overview of the conservation values of NSW and their management within the park system. The second NSW <i>State of the Parks</i> survey was run in late 2004, with a public report released in June 2005. This report examined key issues for management within NSW parks and included data on the effectiveness of park management. A third survey took place in September 2005, with a fourth survey planned for September 2007. A third <i>State of the Parks</i> report, containing data from the 2005 and 2007 surveys, is planned for release in 2008.

Due date	Region	FA section*	Milestone	Progress																									
2004 30 April	Sthn	2.1.2 Att 6(2b)	Development and implementation of and EMS by NPWS.	In progress Refer to milestone above.																									
Ongoing	Sthn	2.1.2	To facilitate implementation of the EMS, NPWS staff and contractors must continue to receive appropriate competency-based training.	Continuing DEC continues to provide staff training programs. These cover natural and cultural (including Aboriginal) heritage management and operational, technical and safety matters. Programs range from technical training related to occupational health and safety requirements to statewide capacity-building initiatives targeted at particular staff classifications.																									
PLANS OF MANAGEMENT																													
<p>Plans of management for the NPWS estate</p> <table border="1"> <thead> <tr> <th>FA section*</th> <th>Region</th> <th>Due date</th> <th>Milestone</th> <th>Progress</th> </tr> </thead> <tbody> <tr> <td>2.3.2 Att 8</td> <td>UNE, LNE, Eden</td> <td>1 January</td> <td>Preparation of plans of management for dedicated reserves under the National Parks and Wildlife Act 1974.</td> <td>The preparation of plans of management under the National Parks and Wildlife Act 1974 continues. Of the 362 national parks/nature reserves/state conservation areas (SCAs)/historic sites/Aboriginal areas in the North East Region (LNE and LNE), 136 have plans of management adopted by the NSW Minister for the Environment. A further 43 draft plans have been publicly exhibited and another 83 are in preparation, with eight of these in draft form. The remaining 100 plans of management are yet to be started. The increase in the total number of reserves since the last reporting period reflects the addition of new reserves in 2005-06.</td></tr> <tr> <td>2.3.2</td> <td>Sthn</td> <td>31 January</td> <td>Preparation of plans of management for dedicated reserves under the National Parks and Wildlife Act 1974.</td> <td>Of the 18 reserves in the Eden Region, 12 have plans of management adopted by the NSW Minister for the Environment. A further three draft plans have been publicly exhibited and another is in preparation. Preparation of a plan for Biamanga National Park can now proceed as leaseback arrangements with the Aboriginal owners are finalised. Preparation of a plan of management for Dangelong Nature Reserve had not yet begun.</td></tr> <tr> <td>2.4.1 Att 8</td> <td>UNE, LNE, Eden</td> <td>31 March</td> <td>Release and adoption of NSW Biodiversity Strategy.</td> <td>Completed Of the 125 in the Southern Region, 34 have plans of management adopted by the NSW Minister for the Environment. A further 39 draft plans have been publicly exhibited and another 31 are in preparation. The remaining 21 plans of management are yet to begin.</td></tr> <tr> <td>2.4.1 Att 6(2d)</td> <td>Sthn</td> <td>Ongoing</td> <td>Implementation of NSW Biodiversity Strategy.</td> <td>Implemented Refer to milestone above.</td></tr> </tbody> </table>					FA section*	Region	Due date	Milestone	Progress	2.3.2 Att 8	UNE, LNE, Eden	1 January	Preparation of plans of management for dedicated reserves under the National Parks and Wildlife Act 1974.	The preparation of plans of management under the National Parks and Wildlife Act 1974 continues. Of the 362 national parks/nature reserves/state conservation areas (SCAs)/historic sites/Aboriginal areas in the North East Region (LNE and LNE), 136 have plans of management adopted by the NSW Minister for the Environment. A further 43 draft plans have been publicly exhibited and another 83 are in preparation, with eight of these in draft form. The remaining 100 plans of management are yet to be started. The increase in the total number of reserves since the last reporting period reflects the addition of new reserves in 2005-06.	2.3.2	Sthn	31 January	Preparation of plans of management for dedicated reserves under the National Parks and Wildlife Act 1974.	Of the 18 reserves in the Eden Region, 12 have plans of management adopted by the NSW Minister for the Environment. A further three draft plans have been publicly exhibited and another is in preparation. Preparation of a plan for Biamanga National Park can now proceed as leaseback arrangements with the Aboriginal owners are finalised. Preparation of a plan of management for Dangelong Nature Reserve had not yet begun.	2.4.1 Att 8	UNE, LNE, Eden	31 March	Release and adoption of NSW Biodiversity Strategy.	Completed Of the 125 in the Southern Region, 34 have plans of management adopted by the NSW Minister for the Environment. A further 39 draft plans have been publicly exhibited and another 31 are in preparation. The remaining 21 plans of management are yet to begin.	2.4.1 Att 6(2d)	Sthn	Ongoing	Implementation of NSW Biodiversity Strategy.	Implemented Refer to milestone above.
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Due date	Region	FA section*	Milestone	Progress
Regional ESFM plans				
2000	1 April	UNE, LNE, Eden	2.2.1	Preparation of Regional ESFM plans and subject to public exhibition and consultation.
2002	31 August Annually	Sthn UNE, LNE, Eden	2.2.1, 4.3 Att 6(1) & 2(a) 2.2.6	Preparation of Regional ESFM plans. Report on progress on meeting targets in Regional ESFM plans.
2002	30 June Annually	Sthn Sthn	6.16 2.2.6	Progress in meeting the targets in the Regional ESFM plans must be reported annually through Regional ESFM reports. Formation of a working group to make recommendations on the management and tenure of areas of State forests that are isolated from the productive State forests.
Flora reserves				
2001	1 April	UNE, LNE, Eden	2.2.2	In progress Preparation of working plans for flora reserves to be incorporated into the Regional ESFM Plans.

Due date	Region	FA section*	Milestone	Progress
2002 31 August	Sthn	2.2.2 2.3.2	Complete and make public working plans for land dedicated or set apart as flora reserves (attached to the Regional ESFM Plans).	In progress FNSW Regional ESFM plans for the South Coast and Tumut sub-regions of the Southern region provide details of the flora reserves in each region. ESFM Plans also provide information on the status of each flora reserve working plan (i.e. draft or current) at the time of publication. Current Working Plans for Flora Reserves, approved by the Minister for Primary Industries, are publicly available. Remaining working plans, such as those for new flora reserves, are progressively being completed.
Informal reserves				
2001 1 April	UNE, LNE, Eden	2.3.3	Preparation of working plans for informal reserves and areas managed by prescription in State forests to be included in the Regional ESFM Plans.	In progress A model plan for informal reserves is being developed as an ESFM supplementary plan.
2002 31 August	Sthn	2.3.3	Preparation of working plans for informal reserves (FMZ 2 and 3a) and guidelines for areas managed by prescription (FMZ 3b and 4) in consultation with DoP, NPWS and DMR.	In progress Refer to milestone above.
Larger more significant exclusion areas of rainforest, high conservation value old growth forest and other prescriptive exclusions				
2001 30 June	UNE, LNE, Eden	2.4.4.5	Directors-General of NPWS, PlanningNSW and CEO SFNSW to agree on the larger more significant exclusion areas of rainforest, high conservation value old growth and other prescriptive exclusions.	In progress No further progress to report.
2002 31 December	Sthn	2.4.5.6	The larger more significant exclusion areas will be those as agreed between the Director-General of NPWS, Chief Executive Officer of SFNSW and the Director-General of DoP.	In progress Refer to milestone above.
2002 1 January	UNE, LNE, Eden	2.4.4.5	Preparation of management plans for large areas of rainforest, high conservation value old growth and other areas excluded by prescription (attach to Regional ESFM Plans and in consultation with NPWS).	In progress No further progress to report.
2002 31 August	Sthn	2.4.5.6	Preparation of guidelines for the management of large areas of rainforest, high conservation value old growth and other areas excluded by prescription and attached to the Regional ESFM Plan.	In progress Refer to milestone above.

Due date	Region	FA section*	Milestone	Progress
Creation of special management zones				
1999	1 October	UNE, LNE, Eden	2.3.1 Minister for Forestry to create informal reserve pursuant to the amended <i>Forestry Act 1916</i> and called 'special management zones'.	In progress No additional special management zones (SMZs) were declared during 2005/2006 in UNE and LNE regions. In the Eden region, the <i>National Park Estate (Reservations) Act 2005</i> provided for approximately 2,620 hectares to be dedicated as SMZ under section 21A of the <i>Forestry Act 1916</i> .
2002	31 August	Sthn	2.3.1 Creation of special management zones in State forests.	In progress In the Southern region, the <i>National Park Estate (Reservations) Act 2005</i> provided for around 7550 hectares in the Tumut sub-region and 13670 hectares in the South Coast sub-region to be dedicated as SMZ under section 21A of the <i>Forestry Act 1916</i> .
Forest Management Zoning				
1999	1 October	Eden	2.2.2 Alt 5	Mapping of FMZs (as defined in attachment 5 of agreement) and attached to Regional ESFM Plans. Zones delineate areas of State forest to be managed as conservation reserves and those managed for timber production. Completed An FMZ map has been attached to Regional ESFM plan for Eden. Regional ESFM Plans and FMZ maps can be found at www.forest.nsw.gov.au/esfm/esfm.asp .
2000	1 April	UNE, LNE	2.2.2 Alt 5	Provision of maps of FMZs (as defined in attachment 5 of the agreement) and attached to Regional ESFM Plans. Completed FMZ maps have been attached to Regional ESFM plans for UNE and LNE. Regional ESFM Plans and FMZ maps can be found at www.forest.nsw.gov.au/esfm/esfm.asp .
2002	31 August	Sthn	2.2.2 Alt 5	Provision of mapped FMZ in all State forests attached to the Regional ESFM Plans. Completed FMZ maps have been attached to Regional ESFM plans for the South Coast and Tumut sub-regions of Southern region. Regional ESFM Plans and FMZ maps can be found at www.forest.nsw.gov.au/esfm/esfm.asp .
Ongoing	UNE, LNE, Eden	Alt 8	Implement the Forest Management Zoning System.	Implemented The Forest Management Zoning (FMZ) system for State forests was publicly announced in March 1999 with the release of <i>Managing Our Forests Sustainably: Forest Management Zoning in NSW State Forests</i> . Implementation of this FMZ system continues in accordance with this document.

CAR RESERVE SYSTEM						
	Due date	Region	FA section*	Milestone	Progress	
Additions to the NPWS estate						
Ongoing	UNE, LNE	6.16.2	The NSW Government may attempt to voluntarily acquire leases using approaches coordinated with the NPWS purchase strategy. Funding to be sought for the purchase of leasehold lands.	Continuing UNE/LNE – DECC received a Treasury commitment of \$1.5 million/year for five years (2001/2002-2005/2006) to purchase leasehold and freehold lands as required by the UNE and LNE Forest Agreements. In 2005/2006, DECC purchased four leasehold properties (4 053 hectares) in UNE and six leasehold properties (6 612 hectares) in LNE. Eden – No additional leases were voluntarily acquired this year.		
Ongoing	As soon as practical	UNE, LNE, Eden	Any areas for which leases are purchased must be incorporated by gazettal into the NPWS estate as soon as practical.	Continuing UNE/LNE – During 2005/2006, four forest leases (5586 hectares) in LNE were incorporated into the DEC estate. Eden – No additional leases were gazetted into the DEC estate this year.		
1999	31 August	UNE, LNE, Eden	6.16.2 6.16.1 (E)	Preparation of procedures for purchasing leases on land.	In progress Standard DEC acquisition procedures have been used for the voluntary acquisition of leases. 2005/2006 was the final year of the five-year \$1.5M/yr budget allocation for these acquisitions and the program is now complete.	
2001	1 April	Eden	6.16.1	Pursue the voluntary purchase of any leases on State forest tenure that has been revoked.	In progress No Crown leases were purchased by DEC in 2005/2006.	
Aquatic reserves						
Ongoing	As required	UNE, LNE, Eden	2.3.4	Minister for Fisheries may declare aquatic reserves under the <i>Fisheries Management Act 1994</i> within State forests, national parks, native reserves and other Crown lands and develop management arrangements for these reserves.	Continuing No aquatic reserves were declared under the <i>Fisheries Management Act 1994</i> .	
Ongoing	As required	Sthn	2.3.4	Minister for Fisheries may declare aquatic reserves.	Continuing No aquatic reserves were declared under the <i>Fisheries Management Act 1994</i> .	

Due date	Region	FA section*	Milestone	Progress
Upgrading FMZ areas/mineral and petroleum interests/additional conservation areas				
1999 1 December	UNE, LNE	6.16.2	Identification of areas 'available for formal reservation' refined from the 'areas for further consideration'. Process for identifying these lands was outlined in the PlanningNSW memo dated 4 February 1999, and entitled 'Procedure for dealing with lands for further consideration for reservation'.	In progress No further progress on this milestone has occurred this year.
1999 1 December	UNE, LNE	6.16.2	SFNNSW must pursue upgrading to FMZ 2, and any FMZ 3 areas that would be classed as 'available for formal reservation' but for unresolved mineral issues.	In progress No further progress on this milestone has occurred this year.
2000 30 June	UNE, LNE	6.16.2	NPWS and SFNNSW, in consultation with the Department of Mineral Resources, to complete negotiations on the FMZ category for State forests with mineral and lease interests.	In progress No further progress on this milestone has occurred this year.
2000 30 June	UNE, LNE	6.16.2 2.3.1	Lands must be zoned by SFNNSW as FMZ 2 and FMZ 3 where they are encumbered by leases or have major mineral value precluding FMZ 2 and must be managed accordingly. Any activities on these lands that may diminish the values of the area must only be carried out with the agreement of NPWS and following consultation with leaseholders.	In progress No further progress on this milestone has occurred this year.
Every five years or as required Ongoing	UNE, LNE	2.3.3	Review of mineral and petroleum objections over FMZ 2 and FMZ 3 lands every five years or as required and land may be added to the dedicated reserve system.	Continuing No further progress on this milestone has occurred this year.
Ongoing	UNE, LNE, Eden	2.3.1 6.16.2 6.16.1 (E)	Consult with DMR when upgrading FMZ 3 to FMZ 2 and purchase of leases.	Continuing No further progress on this milestone has occurred this year.

	Due date	Region	FA section*	Milestone	Progress
2007	30 April and every five-year review	Sthn	2.3.3	Review of mineral and petroleum objections over FMZ 2 and FMZ 3 lands.	In progress No further progress on this milestone has occurred this year.
Crown reserves					
1999	30 September	UNE, LNE, Eden	2.3.3	MOU regarding the management of Crown reserves.	Completed No crown reserves managed by PWD remain in the Eden, UNE and LNE regions. All crown reserves were reclassified as SCAs.
1999	30 September	UNE, LNE, Eden	2.3.3	Formation of a management committee regarding the management of Crown reserves.	No reporting required Refer to milestone above.
2002	30 June	Sthn	2.3.3	Formation of a committee to advise the Manager of the Reserve Trust on the matters specified in the MOU concerning Crown Reserves.	No reporting required An MOU between DEC and the DPI Minerals provides for the formation of a Crown Reserves Minerals Advisory Board. No issues requiring the board's consideration have yet arisen.
Ongoing	Every five years	UNE, LNE, Eden	2.3.3	NPWS and DMR to review Crown reserves every five years, any areas no longer required for mineral interests must be dedicated under the National Parks and Wildlife Act 1974 with concurrence of DMR.	No reporting required No Crown reserves managed by PWD remain in the Eden, UNE and LNE regions. All crown reserves were reclassified as SCAs. Some preparatory work has begun for the review of SCAs that is due in 2007.
2007	30 April and each five-year period	Sthn	2.3.3	Engaging in a review of Crown reserves every five years.	In progress Reclassification of the remaining two Crown reserves as SCAs – Mullengandra and Woomargama (both in the Tumut sub-region of Southern region) – will occur but is pending the resolution of issues regarding the inclusion/exclusion of roads in the reserves. When finalised, there will be no Crown reserves managed by PWD remaining in the Southern region. Some preparatory work has begun for the review of SCAs that is due in 2007.
2002	1 January	Eden	2.3.3	Preparation of plans of management for Crown reserves that are adjacent to land dedicated or reserved under the National Parks and Wildlife Act 1974.	No reporting required All Crown reserves in Eden have been reclassified as State Conservation Areas. Plans of management for SCAs are included in the figures reported under the 'Preparation of plans of management for dedicated reserves under the National Parks and Wildlife Act 1974' milestone on page 79.
2005	1 January	UNE, LNE	2.3.3	Preparation of plans of management for Crown reserves that are adjacent to land dedicated or reserved under the National Parks and Wildlife Act 1974.	No reporting required All Crown Reserves in UNE and LNE have been re-categorised as SCAs. Plans of management for SCAs are included in the figures reported under the 'Preparation of plans of management for dedicated reserves under the National Parks and Wildlife Act 1974' milestone on page 79.

Due date	Region	FA section*	Milestone	Progress
2006 31 January	SInh	2.3.3	Preparation of plans of management for Crown reserves.	In progress In late 2002, all but six Crown reserves in the Southern region were reclassified as SCAs. Four were subsequently reclassified as SCAs in April 2005. Plans of management for SCAs are included in the figures reported under the "Preparation of plans of management for dedicated reserves under the National Parks and Wildlife Act 1974" milestone on page 79. Recategorisation of the remaining two Crown reserves as SCAs – Mullengandra and Woomargana (both in the Tumut sub-region) – will occur but is pending the resolution of issues regarding the inclusion/exclusion of roads in the reserves.
2003 1 January	UNE, LNE	6.16.2	NPWS to assess forest conservation values on remaining vacant Crown land in consultation with the DLWC, DMR and other relevant stakeholders.	In progress As a result of the assessment, approximately 9 000 hectares of Crown land was added to the formal reserve system on 23 December 2005. Negotiations between DEC and the Department of Lands over the remaining areas proposed for reservation (approximately 6 300 hectares) are unresolved at this stage.
COOPERATIVE APPROACHES FOR THREATENED SPECIES MANAGEMENT				
<i>Assessment of species</i>				
1999 30 June	UNE, LNE, Eden	2.4.3	Implementation of a process to assess conservation requirements in relation to important new information concerning the biology and ecology of a species and/or effectiveness of licence conditions.	Implemented DEC has implemented a process that mirrors the one adopted for species newly listed in schedules of the <i>Threatened Species Conservation Act 1995</i> (stipulated in condition 1.3 of Appendix B in the IFOAs for the UNE, LNE and Eden regions). A process is also in place for the review of certain fauna conditions of the Threatened Species Licences. This process includes the exchange and assessment of new information by the DEC, FNSW and, where appropriate, independent experts. Recommendations arising from such reviews are provided to the relevant Ministers for approval. The process covers both flora and fauna.
Ongoing	UNE, LNE, Eden	2.4.3	Review of particular Threatened Species Licence conditions in light of new information on the distribution, population size or ecology of a threatened flora species.	Continuing Where the application of Threatened Species Licence conditions results in 20% or more of the area of net logging area of a compartment being made unavailable because of exclusion zones, FNSW may request that PWD review the conditions.
Ongoing	SInh	2.4.5.4	New information is to be assessed, and where required Threatened Species Licence is reviewed and FOA amended.	Continuing Refer to milestone above.

Due date	Region	FA section*	Milestone	Progress
Ongoing	Sthn	2.4.5.4	Where new information on the distribution, population size or ecology of threatened flora and fauna suggests that the species allocation to a particular condition of the Threatened Species Licence needs to be reviewed. NPWS and FNSW will undertake such a review.	Implemented A process was implemented in 1999/2000 that mirrors the one adopted for species newly listed in schedules of the <i>Threatened Species Conservation Act 1995</i> (stipulated in condition 1.3 of appendix B and appendix C in the IFOA for the Southern region). A process is also in place for the review of certain fauna conditions of the Threatened Species Licences. This process includes the exchange and assessment of new information by DEC, FNSW and, where appropriate, independent experts. Recommendations from such reviews are provided to the relevant Ministers for approval as they arise.
Ongoing	UNE, LNE, Eden	2.4.4.2	Details the process to be followed when an important new record of a species in the area is found.	Implemented Process has been established and has been included in the IFOAs.
Ongoing	UNE, LNE, Eden	2.4.3 2.4.4.1	Agencies to notify each other of any proposal to nominate for listing or delisting of any species, populations, ecological communities or key threatening processes. The IFOA provides a review process to deal with changes to threatened species schedules.	Implemented FNSW process included in provisions of the IFOAs. DEC notification occurs as required. DEC routinely notifies FNSW of preliminary and final determinations made by the Scientific Committee for the listing of species in schedules of the <i>Threatened Species Conservation Act 1995</i> . DEC is not permitted to provide information on non-DEC proposals for listings or de-listings until the Scientific Committee has made at least a preliminary determination.
Ongoing	Sthn	2.4.4	Notify NPWS/FNSW of listing and delisting of threatened species, populations, etc and review IFOA for changes to schedules on Threatened Species Licence.	Implemented Refer to milestone above.
Ongoing	Sthn	2.4.5.1	Review IFOA for changes to schedules on Threatened Species Licence.	Implemented Refer to milestone above.
1999	1 October	UNE, LNE, Eden	Development of a process for the assessment of new records of threatened species, populations and ecological communities not already covered by licences, whereby the conservation requirements of the species are assessed.	Implemented A process was implemented in 1999/2000, and mirrors that adopted for species newly listed in schedules of the <i>Threatened Species Conservation Act 1995</i> (stipulated in condition 1.3 of appendix B in the Eden, UNE, LNE and Southern IFOAs and also appendix C in the Southern IFOA). Whenever the Scientific Committee makes a final determination to list a threatened species, populations and ecological communities not already covered by licences and considered likely to occur on State forests and be affected by logging activities, the DEC advises FNSW of the determination and the need to apply condition 1.2 of the Threatened Species Licence. Regular updates of the <i>Wildlife Atlas</i> are provided to FNSW of all threatened species under its data licence with the DEC. The provision of this information assists FNSW in planning its logging operations. If a newly listed species is present in a compartment planned for logging, the Forest Policy and Regulation Section of DEC is contacted, which then assesses the conservation requirements of the species and advise FNSW of an appropriate condition. The Threatened Species Licence does not cover 'Endangered Ecological Communities', therefore FNSW is not authorised to engage in activities that may affect Endangered Ecological Communities.

Due date	Region	FA section*	Milestone	Progress
Ongoing	Sthn	2.4.5.3	Implement stated process where important new record was discovered in an area.	Implemented This process was not implemented during 2005/2006.
Ongoing	Sthn	2.4.5.3	Conservation requirements must be developed and implemented for new records of threatened species, populations and ecological populations and IFOA must be reviewed.	Implemented This process was not implemented during 2005/2006.
Ongoing	UNE, LNE, Eden	2.4.4.1	A process must be developed and implemented whereby the conservation requirements of a species new to science are assessed. The IFOA provides a review mechanism.	Implemented The process mirrors that adopted for species newly listed in schedules of the <i>Threatened Species Conservation Act 1995</i> (stipulated in condition 1.3 of appendix B in the Eden, UNE, LNE and Southern IFOAs and also appendix C in the Southern IFOA).
Ongoing	UNE, LNE, Eden	2.4.4.1	Details the process to be followed when a species new to science is found.	Implemented Refer to milestone above.
Ongoing	Sthn	2.4.5.2	Implement stated process when species new to science are found.	Implemented This process was not implemented during 2005/2006.
Ongoing	Sthn	2.4.5.2	Conservation requirements must be developed and implemented for species new to science and IFOA must be reviewed.	Implemented The process mirrors that adopted for species newly listed in schedules of the <i>Threatened Species Conservation Act 1995</i> (stipulated in condition 1.3 of appendix B in the Eden, UNE, LNE and Southern IFOAs and also appendix C in the Southern IFOA).
Ongoing	UNE, LNE, Eden	2.4.3	Cooperation over non-liscence components of the <i>Threatened Species Conservation Act 1995</i> , such as nomination of species, populations, ecological communities and key threatening processes, recovery plans, threat abatement plans and critical habitat.	Implemented Cooperation continues as necessary. For instance, various recovery plans and threat abatement plans being prepared by DEC involve FNSW through: provision of FNSW expertise; representation on recovery teams; implementation of specific actions by FNSW; and consultation during the drafting and public exhibition of plans.
Ongoing	Sthn	2.4.4	Preparation of cooperative approaches for non-liscence components of the <i>Threatened Species Conservation Act 1995</i> and <i>Fisheries Management Act 1994</i> , such as nomination of species, populations, ecological communities and key threatening processes, recovery plans, threat abatement plans and critical habitat.	Implemented Refer to milestone above.

Due date	Region	FA section*	Milestone	Progress
Management and recovery planning				
1999 31 December	UNE, LNE	2.4.3	Refinement of models to identify Hastings River mouse habitat.	Completed A NSW and National Recovery Plan for the Hastings River mouse was finalised and published in April 2005 (see www2.nationalparks.nsw.gov.au/pdfs/recoveryplan_hastingsrivermouse_dec04.pdf). Actions within the plan, including refinement of habitat models, are subject to budgetary constraints as noted in the plan.
Ongoing	UNE, LNE, Eden	2.4.3	Continued implementation of joint management plans, such as Pine Creek Koala Management Plan.	Implemented Pine Creek was largely converted to a nature reserve in 2004 and high priority koala habitat was specifically included in the reserve. FNSW continues to implement the Pine Creek Koala Management Plan in remaining sections of Pine Creek State Forest. Amendments to the Pine Creek Koala Management Plan for the Pine Creek State Forest in the UNE region may be considered in the future. This is because a large portion of the former Pine Creek State Forest has now been added to the Bongil Bongil National Park.
Pest, weed and feral animal control				
1999	All	UNE, LNE, Eden	6.16.3	Completed Wild dog control using 1080 baiting on lands managed by the National Parks and Wildlife Act 1974 where SFNSW has given approval Baiting continues in accordance with PWD regional pest management strategies.
2005 1 April	UNE, LNE, Eden	2.4.2	Preparation of grazing management plans, predator and feral control plans and threatened flora species management plans.	In progress A model plan for pest animal management is approved and the preparation of regional plans based on this model are in progress. Preparation of a model grazing management plan was in progress for this reporting period; and regional plans will be prepared based on this model plan. There was one flora species management plan approved by PWD in North East region for <i>Macrozamia johnsonii</i> , which was approved in Sept 2005. (This is the second flora species plan approved the other was <i>Boronia umbellata</i> in 2000.)
2006 31 July	Sthn	2.4.3	Preparation of grazing management plans and feral and introduced predator control plans.	In progress Refer to milestone above.

Due date	Region	FA section*	Milestone	Progress
	UNE, LNE, Eden	Ongoing	<p>Continuing</p> <p>DEC has long running cooperative programs with a variety of landholders, land management agencies and interest groups to manage pest animals (e.g. foxes, wild dogs, feral horses, pigs, deer), weeds (e.g. bitou bush, lantana, scotch broom) and forest health (e.g. BMAD). Pest animal and weed control programs are identified and prioritised in regional pest management strategies, and integrated into DEC plans of management, recovery plans, threat abatement plans and the priority actions statements. The regional pest management strategies are in the process of review, in 2007, and revised versions will be published in December. The department's website presents a range of information on agency pest, weed and forest health programs. For example, the BMAD strategy is in the process of implementation, in a partnership between DECC, FNSW, other government agencies and stakeholders and cooperative wild dog/fox management plans (the Bombala and Far South Coast Community Wild Dog Control Plan and the Wadbilliga Wild Dog Control Plan) have been developed between DEC, FNSW, the Rural Lands and Protection Board and the community.</p> <p>FNSW annually participates in regular meetings held by the local Rural Lands Protection Boards regarding the control of noxious animals and weeds. As a result of attending these meetings, FNSW annually contributes to cooperative control programs. A model plan for weed management is approved and development of regional plans based on the model is in progress. When completed, Regional weed management plans and regional pest animal management plans will detail cooperative arrangements at the landscape level for noxious weed control and feral animal control. FNSW has also been a major contributor to Forests Health research regarding BMAD within native hardwood forests in the UNE region. This work has included forest research, literature reviews and collaboration with universities regarding PhD studies to reduce the level of forest affected.</p> <p>In addition, under the <i>Game and Feral Animal Control Act 2002</i>, FNSW has facilitated access by qualified and licensed hunters into 97 State forests declared around the state under the Act for feral animal control. Hunting occurs in these forests under a special licensing system administered by the Game Council NSW. This system replaces the hunting permits previously issued under section 32B of the <i>Forestry Act 1916</i>. Other measures to control feral animals include active tracking, baiting and trapping programs in State forests to manage wild dogs and foxes.</p>	

Due date	Region	FA section*	Milestone	Progress
Ongoing	SInn	2.12	<p>NPWS and SFNSW must participate in cooperative programs where a broader landscape approach is most effective in addressing noxious weed control, feral animal control or other matters relating to forest health.</p>	<p>Continuing</p> <p>DEC has established cooperative programs with a variety of landholders, land management agencies and interest groups to manage pest animals (e.g. foxes, wild dogs, feral horses, pigs, deer), weeds (e.g. bitou bush, lantana, asparagus species, scotch broom) and forest health (e.g. BMAD). Pest animal and weed control programs are also integrated into DEC plans of management, recovery plans and threat abatement plans. Additionally, regional pest management strategies have been prepared that outline objectives and strategies for managing priority pest animals and weeds across the DEC estate; aim to maximise the effectiveness of pest control programs; and outline how DEC will cooperatively manage pests across the landscape with other State government land management agencies, local government, Rural Lands Protection Boards, landowners and community groups. See the DEC website for examples of relevant programs and strategies.</p>
				<p>Regional pest management strategies have been completed for the DEC (Parks and Wildlife Division) South Coast and South West Slopes regions, and cooperative wild dog/fox management plans developed between the RLPB, SFNSW, DEC and the community in the DEC (Parks and Wildlife Division) Snowy Mountains, South Coast and Far South Coast regions. There is also a co-operative program covering bitou bush management, shorebird protection and conservation initiatives on private land.</p> <p>Forests NSW annually participates in regular meetings held by the local Rural Lands Protection Boards regarding the control of noxious animals and weeds. As a result of attending these meetings, FNSW annually contributes to cooperative control programs. A model plan for weed management is approved and a regional plan based on the model is in progress. When completed, regional weed management plans and regional pest animal management plans will detail cooperative arrangements at the landscape level for noxious weed control and feral animal control.</p> <p>In addition, under the <i>Game and Feral Animal Control Act 2002</i>, Forests NSW has facilitated access by suitably qualified and licensed hunters into 97 State forests declared around the state under the Act for feral animal control. Hunting occurs in these forests under a special licensing system administered by the Game Council NSW. This system replaces the hunting permits previously issued under section 32B of the <i>Forestry Act 1916</i>. Other measures to control feral animals include active tracking, baiting and trapping programs in State forests to manage wild dogs and foxes.</p>
2007	30 April	SInn	Alt 6(2m)	<p>In progress</p> <p>DEC plans of management identify priority pest and weed problems and the need for actions that are in turn addressed by statewide threat abatement plans or regional pest management strategies. Regional pest management strategies outline objectives and strategies for managing priority pest animals and weeds across the DEC estate; aim to maximise the effectiveness of pest control programs; and outline how DEC will cooperatively manage pest issues across the landscape with other State government land management agencies, local government, Rural Lands Protection Boards, landowners and community groups.</p> <p>As discussed in revised regional ESFM plans FNSW regions will develop a weed management plan and a pest animal management plan. These regional plans will be based on the approved model plans to ensure consistency. The plans will include details of the objectives, strategies and co-operative arrangements to manage priority pest animals and weeds within each FNSW region. Plans for each FNSW region are expected to be finalised by the end of 2007.</p>

	Due date	Region	FA section*	Milestone	Progress
PRIVATE LAND					
Regional Native Vegetation committee					
1999	30 June	Eden	2.8.1	Establishment of Regional Native Vegetation committee under the forest agreement, to promote conservation of rare or non-existent ecosystems on private land.	Completed The Regional Native Vegetation committee has been established and held its first meeting in October 2000.
2000	1 January	UNE, LNE	29.1	Establishment of a committee under the forest agreement, to look at conservation values on private land that are a conservation priority for inclusion in the CAR reserve system, and seek funding.	Completed Refer to milestone above.
2002	30 June	Sthn	2.9	Establishment of a committee to look at conservation issues on private land.	Completed Refer to milestone above.
Regional vegetation management plans					
Ongoing			Alt 6(2e) Alt 6(3) point 4	Establishment of regional vegetation management plans under the Native Vegetation Conservation Act 1997 to cover private lands and form a basis for strategic regional planning of private native forestry.	Continuing The two regional vegetation management plans (RVMPs) finalised under the Native Vegetation Conservation Act 1997 (the Mid Lachlan RVMP and the Riverina Highlands RVMP) lapsed when the Native Vegetation Act 2003 came into force on 1 December 2005. The focus of the Native Vegetation Act 2003 is on catchment action plans prepared by Catchment Management Authorities (CMAs) that identify priorities for investment in natural resource assets including native vegetation. As at 30 June 2006, no catchment action plans had been finalised. In relation to Private Native Forestry, a code of practice is being developed that is expected to be on public display in July and August 2006. The code of practice will contain appropriate and effective management provisions for private forests.
Identification of lands of conservation priority					
2000	1 January	UNE, LNE	2.9.1	Identification of forest ecosystems on private land that are of conservation priority for inclusion in the CAR reserve system.	In progress The forest agreements require identification of forest ecosystems on private land for inclusion in the CAR reserve system (list contained in attachment 2 NE RFA). As stated in the UNE/LNE forest agreements, this will require completion and incorporation of the CRAFTI data into regional databases. This project was completed in an amended form for UNE in 2005 in conjunction with the Northern Rivers Catchment Management Authority. The project for LNE is in progress but has been delayed and is now anticipated to be completed in 2008.

				In progress	Priority forest ecosystems for voluntary protection on private land are identified in attachment 2 of the Southern RFA.
Voluntary conservation mechanisms					
Ongoing	UNE, LNE, Eden	2.9.1 2.8.1 (E) Att 7	Principles applying to land and voluntary mechanisms that may be applied to achieve conservation on private land (e.g. VCAs, property agreements, management contracts etc.).	Continuing DEC DNR	<p>Under the <i>Native Vegetation Conservation Act 1997</i>, the purpose of Registered Property Agreements and Management Contracts was to:</p> <ul style="list-style-type: none"> • Provide a mechanism for landholders to adopt an integrated approach and appropriate strategies for the management of native vegetation on their land. • Protect native vegetation of high conservation value, to improve the condition of existing native vegetation and to encourage the revegetation of land with appropriate native vegetation. • Provide incentives for landholders to appropriately manage native vegetation on their land. <p>Property Agreements were registered on the title of the land for periods up to and including in perpetuity. Management contracts were civil contracts for the designated period (typically 10 to 15 years). All existing property agreements and management contracts have been continued under the <i>Native Vegetation Act 2003</i>; however, no new ones can be signed. Over the life of the program, 842 agreements (property agreements and management contracts) were signed to protect over 81 000 hectares of native vegetation.</p> <p>The <i>Native Vegetation Act 2003</i> came into operation on 1 December 2005. Under the <i>Native Vegetation Act 2003</i>, property vegetation plans (PVPs) can be agreed between landholders and Catchment Management Authorities (CMAs) for conservation works on private land. However, CMAs are also delivering incentive funding using other, non-statutory, forms of agreement.</p> <p>The new native vegetation framework has a strong emphasis on conservation, and \$436 million has been allocated by the State and Federal Governments to the CMAs over four years to fund conservation activities.</p>
Ongoing	SInn	2.9 Att 5	Voluntary conservation of private land, where conservation values either do not occur on public land or are not adequately reserved on public land. According to principles in Attachment 5.	Continuing	<p>Refer to milestone above</p>

	Due date	Region	FA section*	Milestone	Progress
Private native forestry and plantations					
				In progress – native forest	<p>DNR is developing a draft code of practice for private native forestry following discussions with various stakeholders. It is proposed that the draft code will be enacted under as an amendment to the Native Vegetation Act 2003 and will receive biodiversity certification under the <i>Threatened Species Conservation Act</i> 1995. The draft code is expected to be on public display in July and August 2006.</p> <p>Limited advice regarding marketing of private native forestry products is provided through the NSW Private Forestry Development Committees. The PFDGs have also attempted to assist the formation of private forestry marketing cooperatives, which assist in securing markets for private forestry products. NSW, in cooperation with Australian Forest Growers (through DAFF funding), has also supported the development of a group certification mechanism for private forest growers (both native forest and plantation products), which again will assist in providing access to markets for certified timber.</p>
2007	30 April	Sthn	Att 6(3) point 3	Completed – plantations Codes of practice for private plantations and private native forests will be in place within five years. The State will also provide advice regarding marketing and pricing.	<p>This milestone was achieved with the implementation of the <i>Plantations and Reafforestation (Code) Regulation 2001</i> in December 2001. The <i>Plantations and Reafforestation Act</i> 1999 and the code provide certainty for harvesting, which was previously provided under the <i>Timber Plantations (Harvest Guarantee) Act</i> 1995. Plantations certified under the <i>Timber Plantations (Harvest Guarantee) Act</i> 1995 are deemed to be authorised under the <i>Plantations and Reafforestation Act</i> 1999.</p> <p>A statutory review of the Act and code began in January 2005. As required, a report to Parliament on the outcomes of the review was filed in December 2005. Inter-agency working groups are meeting to develop amendments to the Act and code, based on the recommendations in the report. An industry reference group will be convened to consider the proposals put forward by the working groups. The proposed amendments will go on public exhibition in due course, thereby providing an opportunity for comment by the broader community. The review is scheduled to conclude in 2007.</p>
Ongoing				Continuing	<p>The development of the regulatory framework highlighted in the milestone above will ensure a more efficient integrated approval process.</p> <p>As a means of encouraging private forestry development, the State will develop a regulatory framework that enables a more efficient integrated approval process to allow for effective private forestry development.</p>

Due date	Region	FA section*	Milestone	Progress
2001 Code commence d 14 December	Sthn	Att 6(3) point 5	<p>Implemented</p> <p>This milestone was achieved with the implementation of the <i>Plantations and Reafforestation (Code) Regulation 2001</i> in December 2001. The <i>Plantations and Reafforestation Act 1999</i> and the code provide certainty for harvesting, which was previously provided under the <i>Timber Plantations (Harvest Guarantee) Act 1995</i> are deemed to be authorised under the <i>Plantations and Reafforestation Act 1999</i>.</p> <p>A statutory review of the Act and code began in January 2005. As required, a report to Parliament on the outcomes of the review was filed in December 2005. Inter-agency working groups are meeting to develop amendments to the Act and code, based on the recommendations in the report. An industry reference group will be convened to consider the proposals put forward by the working groups. The proposed amendments will go on public exhibition in due course, thereby providing an opportunity for comment by the broader community. The review is scheduled to conclude in 2007.</p>	
Ongoing	Sthn	2.2.3	<p>Implemented</p> <p>The <i>Plantations and Reafforestation (Code) Regulation 2001</i> requires applicants for plantation authorisation to submit a plantation plan as part of their application. Refer to clause 14 of the code. Operational plans are also required for specified plantation operations – site preparation involving ripping and ploughing, construction crossing rivers, and harvesting exceeding a certain volume. Refer to clauses 26 and 27 of the code. The requirements for plantation plans and operational plans will not be affected by the Act and code review, although it is proposed that some additional items will be required to be shown on plantation plans.</p>	
Ongoing	Sthn	Att 6(3) point 4	<p>Continuing</p> <p>The <i>Native Vegetation Act 2003</i> establishes a different regime that does not include regional vegetation management committees. Catchment Management Authorities have subsumed their role.</p>	
Ongoing	Sthn	Att 6(3)	<p>With appropriate public involvement, and consistent with the <i>Native Vegetation Conservation Act 1997</i>, the regional vegetation management committees will pursue planning policies that provide for appropriate long-term, secure, management provisions for private native forests including harvesting for commercial wood production.</p>	<p>Continuing</p> <p>No further progress to report.</p>
Ongoing	Sthn	Att 6(3) point 1	<p>Improve administrative arrangements and cooperation and coordination by State agencies to facilitate the timber industry using private forest resources.</p>	<p>Continuing</p> <p>No further progress to report.</p>
Ongoing	Sthn	Att 6(4)	<p>Undertake a private forest inventory of southern NSW to determine the basis of yield of wood products from private land is required, with the agreement of forest owner groups.</p>	<p>Continuing</p> <p>No further progress to report.</p>

				Milestone	Progress
Due date	Region	FA section*			
World Heritage and wilderness					
2000	1 January	UNE, LNE	2.5	Public exhibition of wilderness assessment report for the UNE and LNE regions.	Completed The Northern Wilderness Assessment Report was publicly exhibited in mid-2001.
2002	31 December	Sthn	2.5	NPWS must provide advice to the Minister administering the National Parks and Wildlife Act 1974 on the submissions received during public consultation and the areas recommended for wilderness declaration.	Completed Advice was provided to the Minister for the Environment about the 27 500 submissions received during the public exhibition of the Southern Wilderness Assessment Report.
Ongoing	UNE, LNE	Att 8		Make subsequent decisions on the declaration and management as wilderness of areas of the CAR reserve system provisionally identified as wilderness during the regional forest assessment.	Completed On 19 February 2003, 151 000 hectares of wilderness were declared in northern New South Wales. Seven new wilderness areas were created: the Levers, Bundjalung, Banyabba, Cathedral Rock, Carrai, Mount Seaview and Limeburners Creek. The declarations also included additions to the Washpool, Bindery-Mann, Guy Fawkes, New England, Macleay Gorges, Kunderang, Willi Willi and Barrington wilderness areas. These declarations were formally gazetted on 21 March 2003. Two new wilderness areas were declared in the north-east in 2005/2006. One is the Chaelundi Wilderness (11 000 hectares) within Chaelundi National Park, declared on 2 December 2005. The other is the Mummel Gulf Wilderness (10 790 hectares) within Mummel Gulf National Park, declared on 28 February 2006. These areas were assessed during the Comprehensive Regional Assessment but were previously too small for declaration. However, substantial Crown land acquisitions that adjoin these areas have enabled their declaration.
2001	1 April	UNE, LNE	2.7	Review of CERRA World Heritage Areas to identify any additional rainforest to be included.	In progress In 2005, the Central Eastern Rainforest Reserves of Australia (CERRA) Technical & Scientific Advisory Committee (TSAC) provided a ranked list of potential sites to the CERRA Ministerial Council as the recommended starting point for the expansion of CERRA on its current rainforest theme. These areas include those that form part of existing parks in CERRA, those that have been previously recommended by the IUCN and those that scored highly when assessed against criteria linked to CERRA's world heritage values. DEC provided assistance in refining and applying these criteria to potential reserves. The Commonwealth Minister has declined to coordinate a process to develop a nomination to extend CERRA until he receives a formal approach from both relevant NSW and Queensland State Ministers. DEC is reviewing the TSAC list (to ensure that regional issues and management implications are considered) and will work with the NSW Premiers Department and Cabinet Office in determining statewide priorities consistent with Government priorities.

Due date	Region	FA section*	Milestone	Progress
2002	1 April UNE, LNE< Eden	2.7 2.6 (E)	Further studies of the dedicated reserve system to identify World Heritage values, including eucalypt dominant vegetation and religious beliefs embedded in the landscape.	In progress UNE/LNE A consultant's report, commissioned by the Commonwealth Department of Environment and Heritage (DEH) and completed in mid-2005, identified potential sites of national significance in the broader CERRA region based on the following themes: Aboriginal earthen ceremonial initiation sites ('bora rings'), stone arrangements, dreaming creation places, working together and resistance. The report was reviewed by DEH and finalised. Work is continuing on seeking National Heritage Listing for some or all of the sites and, potentially, a World Heritage nomination based on Indigenous cultural values. There was no progress in investigating World Heritage values of eucalypt dominant vegetation.
2004	30 April Sthn	2.7	Studies of the dedicated reserve system to identify World Heritage values.	In progress An assessment of the Australian Alps (including Kosciuszko NP) is complete and NSW Cabinet is to consider a joint nomination of the Australian Alps for National Heritage Listing. This has not yet occurred. National Heritage Listing is a prerequisite before consideration can be given to World Heritage nomination.
Cultural heritage				
1999	1 October	UNE, LNE, Eden	2.8 2.7 (E)	Completed Cultural heritage management guidelines for SFNSW to be attached to the IFOA.
2002	30 June	Sthn	2.8	Completed SFNSW cultural heritage management guidelines should be attached to the IFOA.
1999	1 April	UNE, LNE, Eden	2.8 2.7 (E)	Completed Cultural heritage policies endorsed by the NPWS Executive include its Cultural Heritage Strategic Policy, Consultation Policy, Cultural Heritage Information Policy and Guidelines for the Assessment of Impact on Heritage Places. These policies are consistent with the principles contained in the CRA/RFA project reports: <i>Protective Mechanisms for Cultural Heritage – Generic Version</i> (Cultural Heritage Working Group, 2000a) and <i>Protective Mechanisms for Cultural Heritage – Lower North East Region</i> (Cultural Heritage Working Group, 2000b). Ongoing review of PWD statewide guidelines is also consistent with the principles contained in the above-mentioned reports.

Due date	Region	FA section*	Milestone	Progress
2001 1 April	UNE, LNE, Eden	2.8 2.7 (E)	Finalisation of SFNSW policy on indigenous and non-indigenous cultural heritage.	In progress Regional indigenous and non-indigenous policies have been incorporated in the final Regional ESFM plans. Forests NSW's statewide Aboriginal Cultural Heritage management policy has been incorporated into <i>Operational Guidelines for Aboriginal Cultural Heritage Management</i> . These guidelines were finalised in May 2006.
2002 Annually	31 August Sthn	2.8	Finalisation of policy on Aboriginal and Non-Aboriginal cultural heritage (SFNSW).	In progress Refer to milestone above. Continuing Cultural heritage performance and achievements are outlined in DEC's annual report. More detailed performance indicators for cultural heritage are included in <i>State of the Parks</i> reporting. The second <i>State of the Parks</i> report was released in June 2005. FNSW reports on cultural heritage performance and indicators within its <i>SEEing</i> report for 2005/2006. FNSW and DEC also contribute significant information to this report each year, which includes cultural heritage indicators.
Ongoing	UNE, LNE, Eden Sthn	2.8 2.7 (E)	Report on cultural heritage performance through annual report; State of the Environment reports that publish against performance indicators and provide access to the outcomes of performance reviews.	Continuing Cultural values are managed according to DEC's legislative responsibilities and existing statewide policies and guidelines. These include a Cultural Heritage Strategic Policy, Consultation Policy, Cultural Heritage Information Policy and Guidelines for the Assessment of Impact on Heritage Places. FNSW has completed its <i>Operational Guidelines for Aboriginal Cultural Heritage Management</i> to assist FNSW develop and maintain a systematic approach to consultation with Aboriginal communities on forest management and to manage Aboriginal values in State forests. This document was finalised in May 2006.
Ongoing	Sthn	Att 8 2.8	Manage cultural values, both Aboriginal and non-Aboriginal, according to guidelines.	Continuing Refer to milestone above.
2005	Sthn	5.1.4.5	Apply cultural heritage management guidelines when managing cultural heritage.	Continuing All NPWS staff located in the Southern Directorate be provided with adequate cultural awareness training to improve customer relations with Aboriginal communities.

Due date	Region	FA section*	Milestone	Progress
Places of cultural significance				
Ongoing	UNE, LNE, Eden Shhn	2.8 2.7 (E)	Updating of section 170 register, sites of state significance will also be listed.	<p>DEC The DEC began to use a new Historic Heritage Information Management System (HHIMS) in August 2002. The system was updated as necessary during the reporting year.</p> <p>FNSW Forests NSW Regions maintain a Section 170 Heritage and Conservation Register, using the State Heritage Inventory database developed by the NSW Heritage Office that identifies sites and objects of heritage significance for internal reference. Site details are also submitted to the NSW Heritage Office for inclusion on the State Heritage Register when required. All sites of non-indigenous exploration and settlement that are assessed and recognised to be of local or regional historical significance are also incorporated within Forests NSW GIS system. Potential buffers around significant sites are incorporated into the FvZ system.</p>
Places of Aboriginal cultural significance				
2001	1 April	UNE, LNE, Eden	2.8 2.7 (E)	<p>In progress NPWS to review indigenous cultural heritage management processes to provide a landscape-based system.</p> <p>DEC has produced a document, <i>Aboriginal Cultural Heritage Regional Studies: An Illustrative Approach</i>, under <i>Two Ways Together</i> and has convened an interagency group called the Aboriginal Heritage Assessment and Mapping group to integrate government data and use a uniform approach to regional assessment and mapping of Aboriginal heritage values.</p>
2005	31 August	Sthn	2.8	<p>In progress NPWS to review processes for Aboriginal cultural heritage management.</p> <p>Refer to milestone above.</p>
Ongoing	UNE, LNE	5.1.1		<p>Continuing There have been no preliminary assessments to date; however, DEC continues to proceed with the return to Aboriginal ownership of those reserves already listed on Schedule 14 and to respond to further nominations as they occur. One such nomination has been received for Tooloom, Toonumbar and Yabba National Parks in the UNE. A cultural significance assessment report of the lands commissioned by DEC was completed in May 2006. A NSW Government decision on the nomination is pending.</p>

Due date	Region	FA section*	Milestone	Progress
2006 31 December	Sthn	5.1.1	Assessment of all parks to determine if any could be added to Schedule 14 of the National Parks and Wildlife Act 1974.	In progress Guidelines have been developed for the assessment of all parks to determine whether they should be included in Schedule 14 of the National Parks and Wildlife Act 1974. No preliminary assessments have been made to date; however, DEC continues to proceed with the return to Aboriginal ownership of those reserves already listed on Schedule 14 (e.g. Biamanga and Gulaga National Parks) and to respond to further nominations as they occur. Lease negotiations for the return of Biamanga (in the Eden Region) and Gulaga National Parks to their Aboriginal owners is continuing. In the PWD South West Slopes region, there have been a number of systematic surveys for Aboriginal cultural heritage features. Numerous artefacts, sites and other structures were recorded as a consequence of these studies, all of which are logged on the DEC Aboriginal Heritage Information Management System (AHIMS). This information will assist in any future Schedule 14 assessments.
Ongoing	UNE, LNE, Eden	2.8	NPWS must continue to develop its information management system for indigenous heritage in consultation with Aboriginal communities and other stakeholders (Information submitted to the Aboriginal Sites Register).	Continuing DEC began to use a new AHIMS in June 2001 after two rounds of statewide consultation in December 2000 and June 2001.
Ongoing	Sthn	2.8	Preparation of an information management system for Aboriginal heritage, including maintenance of Aboriginal Sites Register.	Continuing Refer to milestone above.
2006 31 December	Sthn	5.1.4.3	Creation of a zone to protect Aboriginal cultural heritage, with adequate measures (including buffers) to protect against adverse impacts by forest activities, soil erosion and visitation to sensitive cultural areas.	In progress FNSW protects Aboriginal cultural heritage in accordance with legislative requirements, ESFM plans, and triggers within FNSW GIS system (based on records obtained from the AHIMS database and FNSW site database) and Operational Guidelines for Aboriginal Cultural Heritage Management.

ABORIGINAL INTERESTS					Progress
Due date	Region	FA section*	Milestone		
Aboriginal involvement in forest management					
				In progress	
				UNE/LNE	
				DEC is developing a policy for Aboriginal partnerships in park management and an Aboriginal Community Engagement Framework to assist the agency to more effectively engage with Aboriginal communities. The framework is expected to be completed in 2007 and the partnerships policy in 2008. (Existing joint management arrangements that provide for a participatory role for Aboriginal communities are noted on page 102 "SFNSW and NPWS must progressively negotiate joint management arrangements and joint ventures with local Aboriginal communities" milestone). Also, draft reserve plans of management are referred to relevant Aboriginal organisations and DEC Regional Advisory Committees, which include Aboriginal representatives, for comment. DEC also continue to engage Aboriginal traditional knowledge holders in the management of threatened species. Other local arrangements occur, e.g. DEC (Parks and Wildlife Division) Northern Branch has employed temporary Cultural Heritage Project Officers who can work with staff and the local Aboriginal communities to foster better partnerships in the management of Aboriginal cultural heritage of State forests.	
				Eden	
				SFNSW and NPWS each to prepare a strategy to ensure Aboriginal communities and stakeholders are given a greater participatory role in forest management.	A draft joint strategy has been prepared by DEC and SFNSW. It was anticipated this strategy would be finalised by December 2003, following consultation with the Aboriginal community. Delays have been due in part to a focusing of resources on the return of Bihamanga and Gulgaga National Parks to Aboriginal ownership. For parks in the Far South Coast, including Bihamanga and Gulgaga National Parks, the DEC continue to release "Coastal Custodians", a specialist Aboriginal newsletter designed to increase awareness and participation of Aboriginal people in the DEC estate. There are also two steering committees, mostly comprised of Aboriginal people, for the Beuga and Eurobodalla Aboriginal heritage studies (see "Ventures likely to generate mutual benefits to the Aboriginal, as well as the wider, community must also be considered" milestone on page 103).
					The Eden regional ESFM plan highlights FNSW's commitment to ensuring the involvement of Aboriginal communities in the management of State forests.
				In progress	
					Southern Branch (South West Slopes region), has established an Aboriginal Working Committee as a step towards cooperative involvement of the local Aboriginal community in park management issues. The South Coast and Tumut regional ESHM plans highlight FNSW's commitment to ensuring the involvement of Aboriginal communities in the management of State forests.
2003	30 June	Sthn	5.1.3	Preparation of a strategy to ensure that Aboriginal communities and stakeholders are given a greater participatory role in forest management.	

Due date	Region	FA section*	Milestone	Progress
2001	1 April	UNE, LNE, Eden	5.1.3 SFNSW to involve Aboriginal communities in the development and finalisation of its policy in relation to Aboriginal involvement in forest management that will form part of the NFMS.	In progress The Operational Guidelines for Aboriginal Cultural Heritage Management was developed in consultation with Aboriginal communities. These guidelines were finalised in May 2006.
2003	30 June	Shhn	5.1.3 SFNSW must involve Aboriginal communities in the development and finalisation of its policy in relation to Aboriginal involvement in forest management, which will form part of the EMS-NFMS.	In progress Refer to milestone above.
Co-management and joint venture arrangements				
				<p>Continuing</p> <p>DEC – UNE/LNE</p> <p>DEC has various joint management, access or hunting and gathering arrangements in place, including the first Indigenous Land Use Agreement (ILUA) in the State, at Atakwai. Negotiations to establish joint management arrangements with the Githabul people in north-east NSW (UNE) and the Worimi people at Stockton Bight near Newcastle (LNE) are expected to be completed in 2007. Further negotiations are ongoing for joint management of new reserves at Warrell Creek near Nambucca Heads (LNE).</p> <p>DEC – Eden</p> <p>Leases returning Biananga (in the Eden region) and Gulaga (in the Southern region) National Parks to their Aboriginal owners have been signed. Boards of Management are currently being established. DEC has established two permanent culture camps with basic infrastructure on park under joint management arrangements with local Aboriginal communities. In addition, DEC has negotiated a Statement of Joint Intent with the Eden Local Aboriginal Land Council to facilitate support for informal culture camping and cultural activities in other areas throughout the Eden Management Area. Relevant amendments to plans of management for Wadbilliga, Mimosa Rocks and Ben Boyd National Parks are being drafted.</p> <p>FNSW</p> <p>No new co-management or joint venture arrangements were finalised in 2005/2006. However, one co-management agreement with the Keep Keppa Elders was considered with the view to approval in 2007. In addition an MOU, signed between Forests NSW and the Anawau Aboriginal Corporation (AAC), in 2004, continues to be implemented for certain areas within Nowendoc and Riamukka State forests. Under the MOU, Forests NSW gains cooperation with pest and weed control, fire detection, fire control and building maintenance, while the Anawau elders will use the area for camping, caretaker accommodation and cultural heritage teaching.</p>
Ongoing		UNE, LNE, Eden	5.1.1 SFNSW and NPWS must progressively negotiate joint management arrangements and joint ventures with local Aboriginal communities.	In progress No progress to report.
2000	1 April	UNE, LNE	5.1.1 Examination of any State forest that could be considered for co-management and joint venture arrangements.	In progress No progress to report.

Due date	Region	FA section*	Milestone	Progress
Ongoing	UNE, LNE, Eden	5.1.1	Where further analysis indicates the feasibility of other ventures, project plan must be developed for implementation.	<p>Continuing Refer to milestone below.</p> <p>Continuing FNSW</p> <p>No new venture arrangements were considered in 2005/2006.</p> <p>DEC – UNE/LNE</p> <p>An Arakwal cultural centre has been supported and will be developed as budgetary requirements allow. There have also been surveys of cultural heritage in both the UNE and LNE areas. These initiatives have developed increased community awareness and understanding of the cultural heritage on DEC estate. From these initiatives the Aboriginal community have been able to make recommendations and provide valuable input into the planning and development of facilities, interpretation/education and also the development of increased awareness in the broader community of the cultural context of park areas.</p> <p>DEC – Eden</p> <p>Seven projects involving Aboriginal communities are in progress or have been completed: (i) Mapping of Aboriginal Pathways on the Far South Coast; (ii) Bega Oral History Stage 3, combining historical and oral history into one document; (iii) Bega Oral History Stage 4, presentation of information gathered in Stage 3 (started); (iv) Eurobodalla Stage 1 Aboriginal History, an annotated bibliography of cultural heritage research; (v) Eurobodalla Oral History Stage 2 Aboriginal History of Eurobodalla (completed); (vi) Eurobodalla Oral History Stage 3 (initiated); and (vii) CMA have funded a new project 'Indigenous links to the Potoroo'.</p>
Ongoing	UNE, LNE, Eden	5.1.1	Ventures likely to generate mutual benefits to the Aboriginal, as well as the wider, community must also be considered.	<p>In progress DEC</p> <p>Joint management of Jervis Bay National Park is being sought. Negotiations are still on hold while land claims are being processed. Lease negotiations for the return of Biamaanga (in the Eden region) and Gulaga (in the Southern region) National Parks to their Aboriginal owners continue. Additionally, DEC is a member of the Department of Lands project with Gundungurra Tribal Council to negotiate a non-native title Indigenous Land Use Agreement over parts of DEC estate, including Bangadilly National Park.</p> <p>FNSW</p> <p>No new co-management or joint venture arrangements were considered for 2005/2006.</p>
2006	31 December	Shn	5.1.1	

Due date	Region	FA section*	Milestone	Progress
Annually	Sthn	5.1.1	Annual reporting to RACD on the progress by NPWS and SFNSW on negotiating co-management and joint management arrangements with Aboriginal communities.	Continuing Refer to milestone above.
Ongoing	Sthn	5.1.1	Ventures likely to generate mutual benefits to the Aboriginal, as well as the wider, community must also be considered.	Continuing FNSW No new venture arrangements were considered in 2005/2006. DEC There were a number of ventures: established an Aboriginal Working Committee to work toward cooperative involvement of the local Aboriginal community in park management issues; Aboriginal Trainee Interpretive Assistant trainee worked in Tumut Region Visitor Centre, which is jointly funded by NPWS and Tumut Shire; organised Aboriginal discovery programs, NAIDOC week activities and assisted with culture camps.
Ongoing	Sthn	5.1.1	Where further analysis indicates the feasibility of other ventures, project plan must be developed for implementation.	Continuing No new ventures requiring project plans were initiated during 2005/2006.
2006	31 December	5.1.4.1	Where consideration has identified venture, project plans must be developed for their implementation.	In progress No new ventures requiring project plans were initiated during 2005/2006.
2004	31 December	5.1.1	SFNSW will examine any State forest that could be considered for co-management or joint venture arrangements.	In progress No progress to report.
Cooperative management arrangements				In progress The DEC Aboriginal Management Committee (PWD) will be considering joint management arrangements as part of its terms of reference and aims. FNSW regional ESFM plans identify Forests NSW commitment to co-management and joint management arrangements with Aboriginal communities. No new co-management or joint venture arrangements were considered in 2005/2006.
2006	31 December	5.1.4.1	SFNSW and NPWS must progressively negotiate separate cooperative management agreements with local Aboriginal communities that enable Aboriginal people to be involved in the management of State forests and national parks.	

Due date	Region	FA section*	Milestone	Progress
2006 31 December	SInn	5.1.4.1	Explore opportunities for joint ventures with SInnNSW and NPWS that promote recognition, awareness and respect for Aboriginal cultural heritage. Other ventures likely to generate mutual benefits to the Aboriginal community must also be considered.	In progress There are no new joint ventures to report for 2005/2006.
2006 31 December	SInn	5.1.4.5	NPWS should enter into a cooperative management agreement with the relevant Aboriginal communities to develop cooperative management and funding strategies to ensure the effective protection and management of Aboriginal cultural heritage on the NPWS estate, subject to funding.	In progress No further progress to report.
2006 31 December	SInn	5.1.4.5	Aboriginal communities consider it a NPWS responsibility to develop and implement a policy in relation to access to parks, nature reserves and other appropriate service estate for traditional purposes. The Aboriginal Management Committee will develop this framework.	In progress A Plan of Management for Kosciuszko National Park was completed in June 2006 in consultation with the Aboriginal Management Committee (for more detail on the Committee see the "An Aboriginal Management Committee will be established. . . " milestone at page 108). The plan includes management objectives, policies and actions that address cultural heritage issues and foster connection to country. As required by the plan, a memorandum of understanding (MOU) is being developed in consultation with the Aboriginal community. The detail of the MOU is still to be determined but will consider access to the park for traditional purposes. (See "Joint strategy on how Aboriginal communities can gain access to materials . . ." milestone on page 107 for details on other relevant work being undertaken.)
Access for traditional and cultural purposes				In progress No further progress to report this year. However, in 2004/2005, FNSW in cooperation with the Tumut/ Brungle Local Aboriginal Land Council (LALC) and the local Tumut Community Development Employment Project (CDEP) organised the construction of an outdoor natural amphitheatre in the Tumut sub-region. This venue can now be used by Aboriginal communities and the general Tumut community to promote cultural events in a natural setting.
2006 31 December	SInn	5.1.4.3	Areas of State forest to be identified and set aside for Aboriginal education and specific community activities in accordance with Aboriginal traditional practices. Such areas to be determined and agreed upon by the Aboriginal Management Committees.	
2006 31 December				

Due date	Region	FA section*	Milestone	Progress
				<p>A joint PWD and FNSW strategy has not been developed at this stage. In the meantime, DEC and FNSW continue to proceed with their own initiatives.</p> <p>DEC</p> <p>As part of the NSW whole-of-government <i>Two Ways Together</i> initiative for improving the economic, social and cultural wellbeing of Aboriginal communities, DEC is leading the development of a Cultural Resource Use Framework (formerly referred to as a Wild Resource Use Policy) to apply to all NSW Government lands. The framework has been drafted and is awaiting sign-off by the CEOs of relevant agencies. This work will also inform the development of a DEC policy and is linked to the development of an access policy under <i>Two Ways Together</i> (being led by the Department of Aboriginal Affairs). In the meantime, Aboriginal access to forest resources for traditional purposes is being facilitated by DEC on an "as needs" basis at regional level and includes informal arrangements for Aboriginal people to participate in cultural activities.</p> <p>Additionally, in the Eden region, DEC is involved in a regional heritage study that will identify areas and their scope for access for cultural resources, and which will include the scoping of planning mechanisms required to enable Aboriginal people to achieve their aspirations both on- and off-park.</p> <p>FNSW</p> <p>Regional ESFM plans identify Forests NSW's commitment to a strategy to allow local Aboriginal communities access to forest resources for traditional/cultural purposes. Forests NSW responds to specific requests from Aboriginal communities for access to forest resources.</p>
2000	UNE, LNE, Eden	5.1.1	Preparation of a joint strategy that will include how Aboriginal communities can gain access to materials for traditional cultural purposes (such as art and craft purposes, food sources and medicine, access to firewood).	<p>In the LNE region a hunting permit was issued to the Anaiwan Aboriginal Corporation (AAC) for a five-year period to allow for traditional hunting rights in Waiala state forests. In addition, Guwian Elders have also been issued with a permit for five years for traditional hunting in Waiala state forests. The Bhaitoo Corporation has been issued with a letter of authority that provides for the gathering of plants and materials in the Taree area for traditional use. Discussions are occurring in relation to the potential to gather commercial quantities of protected plants from harvesting operations, as a commercial venture within the Aboriginal community.</p>

Due date	Region	FA section*	Milestone	Progress
2003 31 December	Sthn	5.1.1	Joint strategy on how Aboriginal communities can gain access to materials for art and craft purposes, food sources and medicine; access to firewood and opportunities for traditional use and cultural activity.	In progress The strategy to provide access to Aboriginal people for traditional cultural purposes in the Southern region will be based on the strategy that is being developed for the Eden region that is not yet complete. (see "SFNSW and NPWS each to prepare a strategy to ensure Aboriginal communities and stakeholders are given a greater participatory role in forest" milestone on page 101). Also, as part of the NSW whole-of-government Two Ways Together initiative for improving the economic, social and cultural wellbeing of Aboriginal communities, DEC is leading the development of a Wild Resource Use Policy to apply to all NSW Government lands. This work will also inform the development of a DEC policy and is linked to the development of an access policy under Two Ways Together (being led by the Department of Aboriginal Affairs). In the meantime, Aboriginal access to forest resources for traditional purposes is being facilitated by DEC on an "as needs" basis at regional level and includes informal arrangements that provide for the waiver of fees for Aboriginal people to participate in cultural activities.
Employment and training opportunities				
2000 1 April	UNE, LNE	5.1.2	Preparation of a joint strategy to facilitate an employment and development program for Aboriginal people.	In progress A joint DEC and FNSW strategy has not been developed. DEC continued to proceed with its own initiatives, which include an Aboriginal Employment and Training Strategy to facilitate employment and development opportunities for Aboriginal people. Cross-agency approaches to training are being examined as part of this strategy, which could be used as the basis of future negotiations on a joint strategy.
2003 30 June	Sthn	5.1.2	Preparation of an employment and economic opportunities program with Aboriginal people.	In progress No progress to report on this issue for FNSW at a corporate strategic level. However, Regional ESFM plans show FNSW's commitment to Aboriginal employment opportunities. In addition, FNSW has provided input into the Commonwealth's National Indigenous Forestry Strategy (NIFS). The NIFS aim is to encourage indigenous participation in the forest industry. The NIFS was announced in July 2005 and is available at: www.daff.gov.au/forestry/policies/nifs . FNSW has a representative on the NIFS working group.
NSW FOREST AGREEMENTS AND INTEGRATED FORESTRY OPERATIONS APPROVALS				

Due date	Region	FA section*	Milestone	Progress
Ongoing	UNE, LNE, Eden	5.1.2	NPWS to offer permanent employment opportunities for Aboriginal people in operational management as part of the funding package for the management of additions to the reserve system.	Completed UNE/LNE Employment as part of the original funding package has been implemented. Additionally, during 2005/2006 seven permanent Aboriginal positions were created, comprising two field officers, two clerical officers, two rangers and one senior field officer. An additional existing position was newly identified as an Aboriginal position in 2005/2006, a field officer. It is anticipated that further positions will be created in 2007/2008 after the agreements with the Githabul and Wotimi peoples are finalised. Eden Five Aboriginal staff were appointed by DEC as a result of funding provided for management of additions to the reserve system. These were: a trainee field officer, two Aboriginal sites officers (one male and one female), one project officer to manage the hand back of Bihamanga and Gulaga National Parks and a cadet trainee field officer (who is now a ranger). Additional employment areas include the Discovery Ranger Program.
2005	31 December	Sthn	5.1.4.2	In progress Enterprise development with SFNSW has been identified as a major interest for Aboriginal communities. Some examples are provided in the forest agreement.
2005	31 December	Sthn	5.1.4.4	In progress SFNSW should initiate the specified employment opportunities to enable active Aboriginal participation in the management of forests, subject to funding.
2005	31 December	Sthn	5.1.4.6	In progress Specified employment opportunities in NPWS were identified as a major priority for Aboriginal communities in the Southern region, subject to external funding.
Aboriginal Management Committee for the Southern region				In progress – Forests NSW/Completed – PWD DEC (Parks and Wildlife Division) South West Slopes Region established an Aboriginal Management Committee in 2004/2005. The committee is working toward cooperative involvement of the local Aboriginal community in park management issues. An Aboriginal Management Committee for State forests is yet to be established
2003	31 December	Sthn	5.1.4.1	An Aboriginal Management Committee will be established for both State forests and national parks to represent and manage Aboriginal cultural heritage on State forests and national parks respectively.

Due date	Region	FA section*	Milestone	Progress
2003 31 December	Sthn	5.1.4.1	Terms of reference for the committees will be determined and developed by the committee members upon establishment. Terms of reference must include specified aspects.	In progress – Forests NSW/Completed – PWD Refer to milestone above
2003 31 December	Sthn	5.1.4.1	Development of a plan of management, which will address the management principles, guidelines and objectives of the Aboriginal Management Committee.	In progress – Forests NSW/Completed – PWD DEC – A Plan of Management for Kosciuszko National Park was completed in June 2006 in consultation with the Aboriginal Management Committee. The plan includes management objectives, policies and actions that address cultural heritage issues and foster connection to country.
2005 31 December	Sthn	5.1.4.5	Create a provision for two Aboriginal representatives to sit on the South West Slopes Regional Advisory Committee.	Completed Three Aboriginal representatives were appointed to the DEC (Parks and Wildlife Division) South West Slopes Regional Advisory Committee in 2003/2004.
MANAGING FOR OTHER FOREST VALUES AND USES				
Occupation permits in State forests				
1999 1 July	UE, LNE, Eden	2.3.3	Formation of Occupation Permit Taskforce. (The taskforce will also consider issues in the Eden region.)	Completed A taskforce of representatives from the NPWS, SFNSW and NSW Farmers was formed in November 2000.
2000 1 July	UNE, LNE	2.3.3	Phasing out of occupation permits.	In progress Phase out is still being considered.
2002 31 December	Sthn	2.3.3	Consideration of the Southern region by the Occupation Permit and Permissive Occupancy Taskforce.	Completed A steering group comprised of representatives from DLWC, NSW Farmers, SFNSW and NPWS met several times in 2001-02 to oversee the phase-out of occupation permits and permissive occupancies. The group was chaired by NPWS. The phase-out, which affected about 120 people, was completed over an 18-month period ending in June 2003.
Within 18 months of gazettal of new reserves	Sthn	2.3.3	Phasing out of occupation permits in State forests that currently exist in areas identified as formal reserves and informal reserves and permissive occupancies on Crown land identified as formal reserves and informal reserves.	Completed Refer to milestone above.

Due date	Region	FA section*	Milestone	Progress
Roads and trails				
2000	1 January	UNE, LNE, Eden	2.13.4 2.12.4 (E)	Preparation of a MOU on joint roads and trails maintenance and access arrangements. Completed – UNE and LNE regions NPWS and SFNSW entered into a MOU in January 2000.
				In progress – Eden region Joint roads, access and maintenance arrangements have been agreed to. A draft MOU has been prepared but will be reviewed before finalisation to ensure compatibility with a similar plan to be developed for the Southern FA region (see milestone below).
2002	31 December	Sthn	2.13.4	MOU on the usage of roads and trails maintenance and access arrangements. In progress There has been no further progress by FNSW and DEC on the development of the MOU for the Southern region. A set of actions has been developed, and operational protocols have been confirmed in some instances, but a formal MOU is yet to be drafted. In the meantime, local discussions between the two agencies are occurring as the need arises.
Fire management				
2001	1 April	UNE, LNE, Eden	2.10 2.9 (E)	Preparation of a joint arrangement with District Fire Committees for the prevention, detection and suppression of bush fires. Implemented FNSW and DEC continue to be represented on the District Fire Committees, formed under <i>Rural Fires Act 1997</i> , along with DLWC and the NSW Rural Fire Service. FNSW and DEC are recognised as two of four fire authorities under the <i>Rural/Fires Act</i> . FNSW and DEC are also members of the NSW Bush Fire Coordinating Committee. The Bush Fire Coordinating Committee is the statutory body responsible for the coordination of all state fire fighting agencies, including the NSW Rural Fire Service, NSW Fire Brigades, FNSW, DEC and various animal and environment agencies and land managers, and for planning in relation to bush fire prevention and coordinated fire fighting. The committee advises the Commissioner of the NSW Rural Fire Service about bush fire prevention, mitigation and coordinated bush fire suppression.
Ongoing		Sthn	2.10	Continuing participation in District Fire Management Committees for the prevention, detection and suppression of bush fires. Continuing Refer to milestone above.

Due date	Region	FA section*	Milestone	Progress
2007	30 April	Sohn	Incorporate into Regional ESM Plans and plans of management under the <i>National Parks and Wildlife Act 1974</i> provisions that address bush and other fires ensuring ecologically sustainable forest management of forests.	<p>In progress</p> <p>PWD and FNSW ensure an integrated approach to fire management (including prevention, mitigation and suppression) is achieved through their participation in the Bush Fire Coordinating Committee and District Bush Fire Management Committees. The PWD also addresses bush fire management through incorporating ESM principles into bush fire risk management plans and reserve fire management plans (prepared at the individual reserve level). These address the provisions outlined and are important for risk management, threatened species management and recovery planning. The PWD's reserve fire management plans are consistent with bush fire risk management plans but have a greater level of detail. These are prepared for reserves where such detail is necessary and a specific document is warranted. Where this level of detail is not required, provisions are incorporated directly in reserve plans of management.</p> <p>Revised regional ESM plans identify FNSW's fire management commitments. FNSW's corporate fuel management plan (or the Corporate Fire Management Strategy/Plan, as it is referred to in revised ESM plans) is in a draft form and is under review by FNSW senior management. This corporate plan will provide a strategic framework for integrated management of FNSW-managed forests and be supplemented by regional fuel management plans and fuel management programs.</p>
Recreation and tourism				
2001	1 April	UNE, LNE, Eden	2.13.1 2.12.1 (E)	<p>In progress</p> <p>Preparation of joint regional recreation and tourism plans.</p> <p>A joint DEC/FNSW plan has not been prepared for the UNE and LNE. However, a DEC statewide strategy for sustainable visitation (<i>Living Parks</i>) was completed in 2005 and publicly launched in early 2006 (see www.nationalparks.nsw.gov.au/npws.nsf/Content/living_parks). A specific action within <i>Living Parks</i> is the development of Branch Visitation Management Plans (BVMPS), which will guide regional recreation and tourism planning on DEC estate. A framework to develop these plans was completed in 2005/2006. BVMPS are due for completion in 2008.</p> <p>Eden</p> <p>A <i>Far South Coast Nature Tourism and Recreation Plan</i> was completed in May 2004, involving FNSW, DEC, Eurobodalla Tourism, Sapphire Coast Tourism, Umburra Aboriginal Cultural Heritage Tours and Department of Lands. This plan included the Eden region and some of the forests within the Southern region (see www.nationalparks.nsw.gov.au/npws.nsf/Content/fsc_escarpment_relatedinfo).</p>

Due date	Region	FA section*	Milestone	Progress
2003	31 August	Sthn	2.13.1 Preparation of joint regional recreation and tourism plans.	In progress Some areas within the Southern region are included in a <i>Far South Coast Nature Tourism and Recreation Plan</i> (refer to milestone above). Additionally, a draft inter-departmental Nature Tourism Strategy (<i>Nature and Tourism</i>) was prepared by the Southern Highlands and Illawarra Regional Tourism Task Force. PWD South Coast Region provided a leading role but the initiative also involved FNSW, NSW Department of Lands, local councils, tourism organisations and others. The strategy promotes integrated and ecologically sustainable nature tourism in the Southern Highlands, part Southern Tablelands and Shoalhaven areas. A revised document will be publicly exhibited at an unspecified time in the future. DECC has also developed a statewide strategy for sustainable visitation (<i>Living Parks</i>), which was completed in 2005 and publicly launched in early 2006 (see www.nationalparks.nsw.gov.au/npsw.nsf/Content/living_parks). A specific action within <i>Living Parks</i> is the development of Branch Visitation Management Plans, which will guide regional recreation and tourism planning on DECC estate. A framework to develop these plans was completed in 2005/2006. The plans are due for completion in 2008. DECC is discussing data exchange with FNSW and will consult with other agencies and regional tourism organisations during preparation of the Southern Branch plan.
Carbon sequestration opportunities				
2004	1 April	UNE	2.13.2 Undertaking a revegetation project that includes carbon sequestration opportunities.	Deferred No progress as legal constraints have been identified that will require legislative change to enable carbon sequestration opportunities on reserves to be realised. Other further work is also necessary (e.g. updating the schedule of potential sink establishment areas). Further work has therefore been deferred but is being considered for further action in 2008.
Plantation areas within national parks				
2001	30 June	UNE, LNE	3.3 Supply from logging associated with the rehabilitation of identified hardwood plantations remaining within the new reserve system and completion of harvesting of plantations in national parks.	No reporting required No areas of plantation in dedicated national park were logged or required rehabilitation.
Ongoing	Within six months of harvest	UNE, LNE	6.16.1 Rehabilitation works on plantation areas within national parks must be completed within six months of harvest completion.	No reporting required Refer to milestone above.
Ongoing		UNE, LNE	6.16.1 Works programs and rehabilitation plans to be jointly prepared and approved. Rehabilitation costs to be funded by sale royalties.	No reporting required Refer to milestone above.

Due date	Region	FA section*	Milestone	Progress
MANAGING TIMBER SUPPLY				
Supply arrangements				
1999	1 March	UNE, LNE	3.2	Amendment of wood supply agreement with Boral. Completed Amended wood supply agreement was signed on 5 March 1999.
1999	31 December	UE, LNE, Eden	Alt 8	Review legislation and policies relevant to the allocation and pricing of hardwood logs from State forest before the end of 1999. In progress The 1999 price review was completed in 2001. A subsequent review, the "Major Price Review" was initiated in 2006 and has not yet been finalised, but is anticipated during 2008.
2000	1 April	UNE, LNE	3.2	Wood supply agreement arrangements for processing thinnings. Completed No new agreements have been entered into.
2000	1 April	Eden	3.2	Amendment of wood supply agreement with Harris Daishowa Australia. Completed The wood supply agreement was signed on 5 March 1999 and amended on 29 September 1999.
2000	31 December	UNE, LNE	3.2	Additional volumes supplied under a transitional "top-up" arrangement over two years to assist industry adjustments to terminate by 31 December 2000. Completed SFNSW made arrangements for additional wood supply volumes over a two-year period. These arrangements were terminated on 31 December 2000.
Ongoing		UNE, LNE, Eden, Sthn	3.4	Consultation on timber supply arrangements must occur through the development of plans of operation. Continuing Consultation with industry is accepted practice as part of developing an annual plan of operations.
1999	30 June	UNE, LNE	6.16.2	The development of a process (before any purchases) of selecting land for purchase by SFNSW for timber supply must consider substantially unmet CAR conservation targets. A process for this and the key targets must be developed by SFNSW, including consultation with NPWS and PlanningNSW by the 30 June 1999. This is not to hinder the overall purpose of the Private Property Supplementation Program to supplement the SFNSW timber supply. In progress Discussions have occurred between FNSW and PWD on the development of a process for considering unmet CAR conservation targets when FNSW purchases land to supplement timber supply. Pending a further outcome, when purchasing new lands, FNSW is using an internal process that considers unmet CAR conservation targets.

Due date	Region	FA section*	Milestone	Progress
2002	30 June	Sthn	The process (before purchase) of selecting land for purchase by SFNSW for timber supply must address criteria to be agreed between SFNSW and NPWS. These criteria will consider: the key substantially unmet CAR conservation targets; whether there is any need for access through reserves; issues of reserve design; and proximity to national parks/reserves.	In progress Refer to the milestone above.
Resource availability and sustainable yield				
Ongoing	UNE, LNE, Eden	3.5	Results of resource inventory and annual monitoring must be used to review performance in achieving the implementation of sustainable yield of timber products in State forests.	In progress No progress to report.
Ongoing	Within next five years	UNE, LNE Alt 8	Refinement of resource availability by improving the inventory such as additional plot measurements (funding provided at \$500 000 pa for five years).	In progress Forests NSW have implemented a Forest Inventory Policy, which is designed to account for harvesting activity and maintain currency of its strategic resource data. Continuous replacement of FRAMES plots is part of this policy No new FRAMES inventory plots were established in 2005/2006. However within the Permanent Growth Plot (PGP) inventory program, nine new plots were established and 10 existing plots were remeasured in 2005. In 2006, another nine new and 11 existing plots have been or are being proposed to be established or remeasured. As part of remeasurement, PGP's have been converted to a new plot size (0.2 ha). All new PGP's will also be established at the new plot size. The larger plot size will result in a better capture of variability and improve mortality and recruitment modelling. When data becomes available, the current models will be reviewed and if necessary be updated and incorporated in FRAMES.
Ongoing	Eden	3.5 Alt 8	Refinement of resource availability by improving the inventory, such as additional plot measurements.	In progress Intensive inventory activities in regrowth forests in Eden continue. This inventory activity has resulted in improved site quality classification, at the regional level. Additionally, within the Permanent Growth Plot (PGP) inventory program three existing plots were remeasured in 2005. Another two existing plots are proposed to be remeasured in late 2006. As part of remeasurement, PGP's have been converted to a new plot size. The larger plot size will result in a better capture of variability and improve mortality and recruitment modelling.

Due date	Region	FA section*	Milestone	Progress
2007 Ongoing	30 April Sthn	3.5 Alt 6(6e)	Refinement of resource availability on native forests by additional inventory plot measurements to improve volume estimates at a regional level. The results of resource inventory and annual monitoring of actual and predicted timber volumes must be used to review the performance in achieving the implementation of sustainable yield of timber products.	In progress No new FRAMES inventory plots were established in 2005/2006. However, new FRAMES inventory plots, in areas harvested around Batemans Bay, are expected to begin establishment soon. Additionally, within the Permanent Growth Plot (PGP) inventory program eight new plots were established and 14 existing plots were remeasured in 2005. Another 16 existing and 10 new plots are proposed to be remeasured or established in 2006. As part of remeasurement, PGP's have been converted to a new plot size. All new PGP's will also be established at the new plot size. The larger plot size will result in a better capture of variability and improve mortality and recruitment modelling. When data becomes available, the current models will be reviewed and if necessary updated and incorporated in FRAMES.
				FRAMES improvement and review
Ongoing	Sthn	3.5		Continuing No progress to report.
				UNE/LNE
Ongoing	UNE, LNE, Eden	3.5	Inventory system used in FRAMES must be supplemented by progressive enhancement of modifier models, such as harvesting area exclusions and FRAMES parameters such as tree protection and tree availability modifier models.	Continuing In 2005/2006 a switch from MARVL to Atlas Cruiser for inventory analysis occurred. Atlas Cruiser provides a more objective assessment of stem quality and improved data quality. In addition the main focus of FRAMES development activity continues to be in the strategic wood modelling area. The introduction of Woodstock for yield scheduling analyses has brought improvements. This tool has spatial data linkages that will enable plans to be more readily displayed and interpreted. There have also been improvements in spatial data management and there is an ongoing program of improvement to the growth and yield modelling system. Eden – No further progress to report.
2006	31 December	Sthn	Alt 6(7)	In progress The majority of the effort on FRAMES development has been specifically focussed on the North East region. FRAMES development program in the Southern region is expected to start in the second quarter of 2007. FRAMES development for the Southern region is expected to proceed rapidly, as many of the improvements from the North East region will be applicable to the Southern region. In 2005/2006, the Atlas Cruiser inventory system was introduced to the Southern region. A switch to Atlas Cruiser (from MARVL) for inventory analysis is providing a more objective assessment of stem quality and improved data quality.

Due date	Region	FA section*	Milestone	Progress
2006 31 December	Sthn	3.5 Alt 6(7)	Enhancement of modifier models in FRAMES, including the refinement of harvesting area exclusions and FRAMES parameters (such as the tree defect and tree availability modifier models), using locally specific data to replace RFA regional average modifier models.	In progress Refer to milestones above.
Ongoing	UNE, LNE, Eden	3.5	SFNWS consultation with NPWS and PlanningNSW on the terms and conduct of the FRAMES assessment.	Continuing No formal consultation has taken place this year.
2002 30 September	Sthn	3.5 Alt 6(7)	SFNWS will consult with NPWS, EPA and DoP on the terms and conduct of the FRAMES review/development program.	In progress No formal consultation has taken place this year.
2007 1 March	UNE, LNE	3.2 3.5	Review of supply levels at year 8, after inventory is reviewed, to determine a supply level for years 9-20, with value adding criteria applied at year 5.	In progress No further progress to report this year.
FRAMES monitoring and processes				
2004	1 April	UNE, LNE	3.5	SFNWS, NPWS and PlanningNSW will consult on appropriate spatial scales for reporting actual yields against FRAMES estimates.
Ongoing	Eden, Sthn	3.5	SFNWS, NPWS and PlanningNSW will consult on appropriate spatial scales to reporting actual yields against FRAMES estimates.	Continuing Formal consultation in relation to this milestone is yet to take place.
Annually	UNE, LNE, Eden	3.5	Reporting on actual versus predicted volume at the scale determined by SFNSW, PlanningNSW and NPWS. To be included in the annual report to Parliament.	Continuing Actual timber harvest volumes against IFOA supply commitments are incorporated into this implementation report. However, there are a number of issues related to information on actual yields against FRAMES estimates that have hindered comprehensive reporting. NSW highlighted problems with 'actual versus predicted' methods in 2001/2002 that have prevented any meaningful comparison of FRAMES estimates with actual volumes harvested. These problems are to be tackled by further studies of yield regulation processes and the development of a systematic harvest event recording system built on geo-database technology.
Annually	Sthn	3.5 Alt 6(6d)	Information on actual yields against FRAMES estimates at the agreed scale to be provided to DoP and included in the annual report to the NSW Parliament (at the determined scale).	Continuing Refer to milestone above.

Due date	Region	FA section*	Milestone	Progress
Annually	UNE, LNE	3.5	Monitoring of FRAMES performance to include comparison of actual and predicted volume each 12-month period at the RFA region level. To be included in the annual report to Parliament.	Continuing Refer to milestone above.
Annually	Eden	3.5	Monitoring of FRAMES performance to include comparison of actual and predicted volume for the multi-aged forest resource each 12-month period. To be included in the annual report to Parliament.	Continuing Refer to milestone above.
Annually	Sthn	3.5 Att 6(6)	Monitoring and review of FRAMES performance to include comparison of actual versus predicted volumes for each financial year.	Continuing Refer to milestone above.
Annually	UNE, LNE, Eden	3.5	Monitoring of FRAMES performance will include an assessment of the progressive 20-year supply. To be included in the annual report to Parliament.	Continuing Refer to milestone above.
Annually	Sthn	3.5	Monitoring and review of FRAMES performance to include assessment of progressive 20-year supply.	Continuing Refer to milestone above.
2006	31 December	Sthn	Commission and publish an independent review of the enhanced systems and process, models, information base, and assumptions which contribute to the FRAMES system applying to both the South Coast and Tumut subregions of the Southern region.	In progress Improvements to FRAMES are yet to be finalised. Therefore, an independent review of enhanced FRAMES has not been commissioned.
2007	30 April and each 5 year review	Sthn	Review sustainable yield every five years using enhanced FRAMES systems and information bases. The results will inform the annual volume that may be harvested from the Southern region (or sub-region), being mindful of achieving long-term sustainable yield and optimising sustainable use objectives consistent with this agreement.	In progress No progress to report.
2007	30 April and each 5 year review	Sthn	Complete and publish independent audits of sustainable yield in time for each subsequent five-year review.	In progress No progress to report.

Due date	Region	FA section*	Milestone	Progress
2007 30 April	Sthn	Alt 6(6c) point 2	The FRAMES models will reflect the site-specific silvicultural regimes applied in the Southern Region.	In progress No progress to report.
Production of timber products				
Annually	UNE, LNE, Eden	3.5	Report on the annual production of timber products other than the production of quota sawlogs.	Continuing Information on the annual production of timber products other than quota sawlogs is contained within this report.
Annually	Sthn	3.5 Alt 6(6d)	A report to DoP, NPWS and EPA on the annual production of products other than production of quota sawlogs for each financial year.	Continuing Information on the annual production of timber products other than quota sawlogs is contained within this report.
Timber supply arrangements and management and charcoal production				
2002 30 September	Sthn	3.3.2	SFNNSW must make a baseline analysis of tree species mix, size, quality and quantity for each compartment within State forest (post-forest agreement) using existing data contained in harvesting records and other sources (i.e. sales data on sawlogs and higher value products). The results of this analysis must be provided to NPWS and DoP.	No reporting required Milestone no longer required.
Annually	Sthn	3.3.2	Each year SFNNSW must monitor and report, as part of the forest agreement annual report process, the amount of residual timber (tonnage) harvested from each compartment, and the amount of species, size, quality and quantity of trees harvested in each compartment from sales data on sawlogs and higher value products and compare this to the baseline data.	No reporting required Milestone no longer required.
Annually	Sthn	3.3.2	If monitoring each year indicates a change in these parameters (i.e. amount of species, size, quality and quantity of trees harvested), SFNNSW must consult DoP and NPWS to determine if remedial action is required and SFNNSW must implement appropriate actions agreed between the three agencies.	No reporting required Milestone no longer required.

Due date	Region	FA section*	Milestone	Progress
Annually	Sthn	3.3.2	Each year SFNSW must monitor and report, as part of the forest agreement annual reporting process, the total quantity (tonnes) of fluxwood (if this is sourced from either as part of the 200 000 tonnes of residue timber or thinnings) and the total quantity (tonnes) of thinnings.	No reporting required Milestone no longer required.
Silviculture practices				
1999	1 December	UNE, LNE	2.2.4 Preparation of eco field guides.	Completed Eco field guides for the Upper North East and Lower North East regions have been published and can be purchased through FNSW.
2002	31 August	Sthn	2.2.4 Prepare and publish eco field guides for the Southern region.	Completed – South Coast sub-region In progress – Tumut sub-region The eco field guide for the South Coast Sub-region, <i>Field Guide to Flora, Fauna and Heritage Features of Forest Management on the South Coast of NSW</i> , was printed in late 2005. The Tumut sub-region eco field guide is in preparation.
2000	1 April	UNE, LNE, Eden	2.2.4 Att 6 Preparation of SFNSW Forest Practices Code: Part 5 – Wildlife Management in Native Forests.	In progress No progress to report.
2002	30 June	Sthn	2.2.4 Att 4 SFNSW Forest Practices Code: Part 5 – Wildlife Management in Native Forests.	In progress No progress to report.
2001 Ongoing (Sthn)	1 April	UNE, LNE, Eden Sthn	2.2.8 Att 6(2c) (S) Native forests silvicultural regimes must be implemented in State forests.	Implemented FNSW has published a <i>Native Forests Silvicultural Manual</i> that complements its field guides and training programs and provides a description of silvicultural practices that are applied in State forests. In addition, two documents have been prepared – Circular 2002/02 <i>Implementing Silviculture in LNE AND UNE regions</i> and Circular 2002/03 <i>Implementation of IFOA Silviculture in the Southern Forest Agreement Region</i> , which provide further instruction on applying silviculture according to the IFOAs. Site-specific requirements are documented in each harvesting plan and the implementation and outcomes of each plan (including silviculture) are subject to monitoring and reporting, as required by Circular 2003/01 <i>Monitoring and Measuring Compliance of Operations</i> .

Due date	Region	FA section*	Milestone	Progress
2001 1 April	UNE, LNE, Eden	2.2.8	Preparation of arrangements for silvicultural practices including establishment of demonstration areas (UNE, LNE regions only), audit compliance, reporting and consultation.	In progress Silvicultural practices may be subject to auditing in accordance with Circular 2003/01 <i>Monitoring and Measuring Compliance of Operations</i> . Three silvicultural demonstration areas have been established in the Lower North East region. These sites are at Queens Lake (2001), Kiwarrak (2002) and Tuggerlo (2004) State forests. The three sites continued to be available throughout 2005/2006 to assist the training of forest operators. These sites cover a range of forest types and silvicultural regimes permissible under the IFOA. No formal silvicultural demonstration sites have been set up in the Eden region.
2003 30 September	Sthn	2.2.8 At 2(o) 4.2	Preparation of arrangements for silvicultural practices including demonstration areas (for silvicultural practices and suite of silvicultural regimes), auditing, report area harvested and silvicultural types and consult on ecosystem management.	In progress Silvicultural practices may be subject to auditing in accordance with Circular 2003/01 <i>Monitoring and Measuring Compliance of Operations</i> . No formal silvicultural demonstration areas have been set up in the Southern region.
Ongoing	UNE, LNE, Eden	2.2.5	SFNsw to employ internal audit system to ensure consistent application of standards across Crown timber lands.	Continuing Circular 2003/01 <i>Monitoring and Measuring Compliance of Operations</i> continued to define FNSW supervision, monitoring and audit requirements for forest operational activities within the regions and divisions. Forests NSW's internal audit system consists of a four-tiered approach (refer to chapter 3 for details and results). In addition, FNSW went through the first stage of an independent audit by an external ISO 14001 EMS certification company. FNSW aims to achieve its EMS certification to ISO 14001, the international standard for an EMS, by mid-2006 and it is hoped that this certification will apply to both the Plantation and Native Forest operational branches.
Ongoing	Sthn	2.2.5	SFNsw to employ an internal audit system to ensure consistent application of standards and monitor compliance with IFOA.	Continuing Refer to milestone above.
Ongoing	Sthn	2.2.5	The results of this monitoring and auditing should be reported using a mechanism determined by DoP, NPWS, SFNSW, NSW Fisheries and EPA.	Continuing Public reporting of Forests NSW compliance with IFOA conditions, including FNSW internal compliance results, is contained within this report (refer to chapter 3). FNSW's SEEing Report for 2005/06 contains details of compliance at a statewide level.
Ongoing	UNE, LNE, Eden	2.2.3	Harvesting plans to be prepared for all logging operations and forest products conducted under a timber licence.	Completed Harvesting plans are prepared for all logging operations conducted under a timber licence. A harvest planning manual detailing the requirements to ensure consistency and standards has been developed.

Due date	Region	FA section*	Milestone	Progress
Ongoing	Sthn	2.2.3	For activities regulated under Part 4 of the <i>Forestry and National Park Estate Act</i> , harvesting plans must be prepared for all logging operations conducted under a Timber Licence.	Completed Refer to milestone above.
	UNE, LNE, Eden	2.2.7	Notification by SFNSW on the location and nature of forestry operations to be done at least bi-monthly to Planning NSW, NPWS, EPA and NSW Fisheries as outlined in IFOA arrangements.	Implemented Forest operation locations are provided to regulatory agencies in the monthly IFOA report.
Ongoing	Sthn	2.2.6	Notification of the location and nature of forestry operations to NPWS, EPA, NSWF and DoP as outlined in IFOA arrangements.	Implemented Refer to milestone above.
	No less than two months before commencement of forest agreement	UNE LNE Eden	Liaison by SFNSW with DUAP, NPWS, and EPA for proposed forestry operations and activities not originally covered by forest agreement on IFOA. SFNSW must carry out an appropriate assessment of the impacts resulting from any proposed changes and each agency must consider the environmental consequences of any proposed changes in terms of their regulatory responsibility.	Continuing This process was not required during 2005/2006.
Ongoing	Two months before activities begin	Sthn		Continuing Refer to milestone above.
Ongoing			Liaise with DoP, NPWS and EPA on proposed forestry activities not covered by forest agreement and integrated forestry operations approval. Impacts from the proposed forestry activities must be assessed.	

Due date	Region	FA section*	Milestone	Progress					
31 December	Sohn	Att 6(2n)	Establish a process, including public reporting, for regular audits of compliance and reviews of codes of practice, eco field guides and regional prescriptions.	In progress FNSW has defined its audit procedure in Circular 2003/01 <i>Monitoring and Measuring Compliance of Operations</i> . FNSW publicly reports, at a statewide level, compliance and monitoring results in its <i>SE/Eing</i> report each year. As part of the implementation of FNSW EMS, all operational control documents will be regularly reviewed and updated in accordance with the required time frames within the final documents or as per FNSW standard operating procedures. In mid 2005, FNSW completed its review of Forest Practices Code 1 (Plantations Code 1995) <i>Timber Harvesting in Forests NSW Plantations</i> . This document has been printed.					
30 April and each five-year review	Sohn	Att 6(2n)	Undertaking audits of compliance at first and subsequent five-yearly reviews.	In progress EPRD (DEC) audits and enforces FNSW's compliance with the Threatened Species Licences (TSL) and Environment Protection Licence (EPL), which form part of the IFOAs. The audit program ensures that FNSW is taking the required measures to protect threatened species and the aquatic environment through responsible planning and operational activities. DPI Fisheries carry out opportunistic threatened species compliance activities in relation to forestry operations where they coincide with other fishery compliance duties. NSW Fisheries investigate complaints when received. Information on TSL, EPL and Fisheries Licence compliance is provided in chapter 3. FNSW internal compliance results are also provided in chapter 3.					
IMPLEMENTATION, REVIEW AND COMMUNITY AWARENESS									
STAFF TRAINING, EMPLOYMENT AND INDUSTRY INITIATIVES									
<p>Staff training</p> <table border="1"> <tr> <td>Ongoing</td> <td>UNE, LNE, Eden</td> <td>2.1.1 3.6 (E)</td> <td>SFNSW field staff and contractors must receive appropriate competency-based training. In Eden, establish timber industry training and accreditation program to assist workers in developing recognised competencies in soil and water, flora and fauna, indigenous and non-indigenous cultural heritage, log grading and log merchandising requirements.</td> <td>Continuing FNSW staff and contractors are continuing to receive appropriate competency-based training; the records of such training are maintained on the corporate Complete Human Resource Information System (CHRS) database. Records of contractor competencies are maintained on the FNSW Contractor and Operators Licensing and Permits system.</td> </tr> </table>					Ongoing	UNE, LNE, Eden	2.1.1 3.6 (E)	SFNSW field staff and contractors must receive appropriate competency-based training. In Eden, establish timber industry training and accreditation program to assist workers in developing recognised competencies in soil and water, flora and fauna, indigenous and non-indigenous cultural heritage, log grading and log merchandising requirements.	Continuing FNSW staff and contractors are continuing to receive appropriate competency-based training; the records of such training are maintained on the corporate Complete Human Resource Information System (CHRS) database. Records of contractor competencies are maintained on the FNSW Contractor and Operators Licensing and Permits system.
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Due date	Region	FA section*	Milestone	Progress
Ongoing	Sthn	2.1.1 Att 6(2k)	Field staff and contractors of SNSW must continue to receive appropriate competency-based training including training in biodiversity management, soil and water management, log grading, silviculture, harvest planning and cultural heritage.	Continuing DEC continues to provide staff training programs. These cover natural and cultural heritage management (including Aboriginal) and operational, technical and safety matters. Programs range from technical training related to occupational health and safety requirements to statewide capacity building initiatives targeted at particular staff classifications. In progress Most staff in the PWD South West Slopes, South Coast and Far South Coast regions have attended Aboriginal cultural awareness training. In the Snowy Mountains region some staff have been given one-on-one training via the indigenous education officer. A new cultural awareness training package is being developed and will be implemented in 2007. All DEC staff will be required to attend this training.
Ongoing	UNE, LNE, Eden	2.1.2	NPWS field staff and contractors must receive appropriate competency-based training.	Continuing UNE/LNE As a consequence of the forest agreements, 105 positions were filled to manage the additions to DEC estate in the UNE and LNE. In 2005/2006, an additional 21 positions were created within DEC to manage the estate in UNE and LNE. Employment in relation to Aboriginal cultural heritage is addressed in the "NPWS to offer permanent employment opportunities for Aboriginal people in operational management..." milestone on page 108.
2005	31 December	Sthn	5.1.4.5	Eden A total of 38 new permanent positions have been established since the south-east forest reform program began in 1994. This includes the 14 jobs required for managing the additions to DEC estate referred to in the forest agreement. Southern Funded initiatives included pest species management, fire management, asset maintenance, preparation of management plans, Aboriginal heritage management and neighbour relations. Capital works outsourced by DECC since the FA was signed include lookout and walking track construction, camping area development and interpretation facilities. As identified in the FA, 91 positions for conservation and Aboriginal heritage management were funded and included four Aboriginal Cultural Heritage Officers (of which one is a female position).
Ongoing	Subject to funding	UNE, LNE, Eden	3.6 Att 10 Att 8(S) Sthn	Employ a range of initiatives to facilitate employment, subject to funding.

Industry initiatives						Progress
Due date	Region	FA section*	Milestone			
2004	1 April	UNE, LNE, Eden	2.9.2 2.8.2 (E)	Private property supplementation program, involving the purchase of timber rights or private property to assist in supply arrangements to industry must apply controls in legislation.	In progress	In 2005/2006 no additional property purchases occurred.
Ongoing	Sthn	3.3.3		SFNNSW will undertake a private property supplementation program (such as purchase of timber rights or private property) and when any private land is purchased and dedicated as State forest, harvesting and road operations must be subject to forest agreement and conditions of the IFOA.	Continuing	No private property supplementation occurred during the reporting period.
					Continuing	UNE and LNE
						FISAP allocated \$7.5 million to the Private Property Timber Supplementation Program to assist SFNSW to purchase timbered property as a means of providing additional resources to the native timber industry in the UNE and LNE regions. Funding for this program was finalised in 2002/2003. No additional properties were purchased in 2005/2006. However, during the period of implementation, nine properties were purchased using allocated FISAP funds.
						The Log Haulage Assistance program continued to be implemented across the UNE and LNE regions. Funds of \$1 million per year over five years were allocated to assist native forest quota sawmilling companies meet additional log haulage costs incurred where they have to obtain quota sawlog supplies from outside their usual areas of supply. In March 2003, the Premier announced a two-year extension of the Log Haulage Assistance program, to 31 December 2005, with additional funding from SFNSW. To 30 June 2006, \$4,966,582 in FISAP funds had been expended on Log Haulage Assistance.
						Eden
Ongoing	Subject to funding		UNE, LNE, Eden	Extension of FISAP to fund various initiatives in the UNE, LNE and Eden regions.	3.6	\$1 million was allocated to the Commercial Regrowth Thinnings initiative to provide assistance to enable one or more of the existing integrated harvesting crews to expand the commercial thinnings operations already taking place. The initiative was to occur under existing FISAP programs. More than \$1 million has been expended to contractors in the Eden area to purchase mechanised harvesting equipment under the Industry Development Assistance (IDA) program of FISAP and there has been training under the FISAP Training Strategy to achieve the aims of the Commercial Regrowth Thinnings initiative.

Due date	Region	FA section*	Milestone	Progress
2006	30 June	Shhn	3.6	<p>Completed</p> <p>\$2.5 million of FISAP funds have been allocated towards the Sawlog Productivity Program – Silvicultural Program for the South East region. Both the NSW and Federal Governments contribute to this initiative.</p> <p>The initiative aims to improve the sawlog productivity of South Coast forests. Within the operational constraints of the RFA and IFOA, the strategy is to select and fell unsellable trees to restore productivity to degraded timber stands capable of improved sawlog growth, and to release young, potentially merchantable trees otherwise inhibited by the non-merchantable overstorey.</p> <p>To 30 June 2006, \$2,500,000 has been expended under this program and 6 260 hectares have been treated.</p> <p>FISAP payments under this initiative are expected to conclude in 2006/07.</p>
COMMUNITY PARTICIPATION, EDUCATION AND AWARENESS				
				Complaint handling
2000	1 January	UNE, LNE, Eden	6.15	<p>Implemented</p> <p>Devised and implemented a coordinated complaint handling and response system.</p> <p>A coordinated complaint handling protocol was developed and implemented in 2001.</p>
2002	30 June	Shhn	6.15	<p>Implemented</p> <p>Devised and implemented a coordinated complaint handling and response system for the IFOA.</p> <p>Refer to milestone above.</p>
Ongoing	When making an amendment	Shhn	6.2	<p>Continuing</p> <p>No amendments to the Southern Forest Agreement have occurred during 2005/2006.</p> <p>Public participation is required when making a forest agreement or when an amendment or revocation occurs.</p>

Due date	Region	FA section*	Milestone	Progress
Community awareness and education				
				Continuing
				DEC
				Forests are only one element of a much broader landscape managed by DEC, hence ESFM is indirectly addressed as part of the broader conservation awareness and understanding promoted by the agency, rather than being a specific component. DEC's public and educational programs include: guided walks and tag-along 4WD tours; ranger talks and on-site inspections; development of the Sustainable Schools Program in NSW; training, planning and control programs for pest species; and the Discovery program, which focuses on providing community education opportunities for the general public and interested groups on natural and cultural heritage.
				FNSW
Ongoing	UNE, LNE, Eden, Shn	Att 8 Att 6(2g) (S)	Providing ongoing formal participation to raise awareness and understanding of ESFM and how it can be achieved in New South Wales forests.	Forests NSW have continued to participate and provide awareness to the community regarding ESFM practices as a result of finalising Regional ESFM plans. At a strategic level, FNSW promotes its land management practices through the <i>Bush Telegraph</i> , produced quarterly, and the <i>SEEing</i> report, produced annually. Both can be obtained from the FNSW website or through local DPI offices. FNSW's public and educational programs include: ranger talks, education visits; development of the Sustainable Schools Program in NSW and inviting NSW science teachers to view FNSW operations as a way of promoting ESFM management practices. FNSW also annually attended community meetings that relate to ESFM, which include: catchment management, community bushfire management, community/school/education, conservation/environmental, cultural management, flora and fauna management, forestry practices, industry/stakeholder meetings, introduced predators/ feral animals, recreation/tourism and regional planning. FNSW staff attendance contributes to raising the public awareness and understanding of ESFM practices.
				Continuing
Ongoing	Shn	Att 6(2j)	Developing and implementing public education programs to deal with ecologically sustainable management issues, including management requirements for conservation and codes of forest practice governing activities in both public and private forests.	Refer to milestone above. In addition DNR is developing a code of practice for private native forestry, and has developed an education and training draft package. Following public display of the draft code in July and August 2006 and the public comments received, this will be refined before it is introduced.
				Continuing
Ongoing	UNE, LNE, Eden	Att 8	Continuing to develop the public consultation and public reporting mechanisms through the introduction of new partnerships (for example the International Model Forest Network).	No progress to report.

Due date	Region	FA section*	Milestone	Progress
Ongoing	UNE, LNE, Eden, Shhn	Att 8 Att 6(2) (S)	Improving cooperation and coordination between government agencies so as to achieve integrated management for conservation, wood production and other values in both public and private forests.	Continuing No progress to report.
Ongoing	Shhn	Att 6(2f)	Improving the coordination and effective use of resources allocated to research for ESFM in New South Wales.	Continuing No progress to report.
INFORMING THE PUBLIC				
Access to information				
1999	As soon as possible	UNE, LNE, Eden	1.6	Completed Granting of an IFOA on, or as soon as possible after, the making of the agreement.
2002	ASAP	Shhn	1.6.1 Att 6(1) & (2a)	Completed Granting of an IFOA for the Southern region.
1999	Within seven days of signing	UNE, LNE, Eden	6.10	Completed Furnishing of the Agreement (and IFOA) o the Presiding Officer of each House of Parliament and to be laid before Parliament within 15 sitting days of receipt.
2002	Within seven days of signing	Shhn	6.10 6.1	Completed A copy of the forest agreement including any amendment or termination of the agreement must be furnished to the Presiding Officer, so it can be laid before that House within 15 sitting days of that House after it is received by the Presiding Officer.
Ongoing	When making or amending	Shhn	6.2	Continuing Public participation is required when making a forest agreement or when an amendment or revocation occurs.

Due date	Region	FA section*	Milestone	Progress
1999 1 April	UNE, LNE, Eden	6.11	Public notice in newspaper circulating throughout the State and also in a newspaper circulating the region, about the Agreement and IFOA.	Completed Public notice of the making of the forest agreements was given in March 1999, and for the IFOA in December 1999.
2002 Within seven days after signing	Shn	6.11	Public notice in a newspaper circulating throughout the State and also in a newspaper circulating in the region, about the making of the forest agreement and IFOA or amendment.	Completed Public notice of the making of the forest agreement and IFOA has been given.
Access to information				
1999 1 December	UNE, LNE, Eden	2.11.3 2.10.3 (E)	Determining a method to provide all research reports to the public.	Completed Project reports can be viewed through a link on the RACAC website (www.racac.nsw.gov.au) and the Australian Government's RFA website (www.rfa.gov.au).
1999 1 April	UNE, LNE, Eden	6.11	Copies of documents to be made available for public inspection at the head office and other regional offices of PlanningNSW.	Completed Forest agreements were signed on 5 March 1999 and deposited at Planning NSW's head office in Sydney, regional offices in Newcastle, Queanbeyan and Grafton; State Forests of NSW (now FNSW) regional offices in Casino, Glen Innes, Grafton, Coffs Harbour, and Eden; NPWS regional offices in Port Macquarie, Armidale, Grafton, Glen Innes, Alstonville and Merimbula. IFOAs were signed on 21 December 1999 and deposited at Planning NSW's head office in Sydney, regional offices in Newcastle, Grafton and Queanbeyan; State Forests of NSW (now FNSW) regional offices in Walcha, Taree, Casino, Eden and Coffs Harbour; NPWS regional offices in Glen Innes, Alstonville, Merimbula, Armidale and Port Macquarie.
2002 Within seven days after signing	Shn	6.11	Copies of documents to be made available for public inspection at the head office and other regional offices of the Department of Planning.	Continuing The Southern Forest Agreement and IFOA were made available at various DIPNR, NPWS and State Forests of NSW (now FNSW) offices within Southern region. They were also made available for public inspection at DIPNR head office in Sydney.
1999 1 May	UNE, LNE, Eden	6.11	Copies of documents made available on the Internet by means of the website of the PlanningNSW.	Completed The NSW forest agreements and IFOAs were made available on the RACAC website (www.racac.nsw.gov.au) in March 1999 and April 2000 respectively. The site also has links to the Commonwealth Government's RFA website (www.rfa.gov.au), which contains project reports carried out as part of the CRA/RFAs for the UNE, LNE and Eden regions.

Due date	Region	FA section*	Milestone	Progress
2002	As soon as practical after documents made public	Sthn	Copies of documents made available on the Internet by means of the website of the Department of Planning.	Completed The NSW forest agreement and IFOA were made available on the RACAC website (www.racac.nsw.gov.au) in 2003. The site also has links to the Commonwealth Government's RFA website (www.rafa.gov.au), which contains project reports carried out as part of the CRA/RFAs for the Southern region.
2002	30 June	Sthn	2.11.3 All project reports relevant to the regional forest assessment must be made public.	Completed All CRA/RFA project reports have been published, and are publicly available via the Commonwealth Government's RFA website.
2002	Within six months of signing	Sthn	Alt 6(5) Publish all FRAMES CRA reports for Southern.	Completed All FRAMES CRA reports for the Southern region have been completed and are publicly available.
Additional reporting mechanisms				
2000	1 April	UNE, LNE, Eden	4.2 Additional reporting and consultative mechanisms for NPWS (e.g. <i>State of the Parks</i> report, NPWS Advisory Council, District Advisory Committee).	Continuing <i>State of the Parks</i> reporting is occurring (see 'Preparation of NPWS Environmental Management Systems' milestone on page 78), as is corporate level annual reporting. DEC Regional Committees continue to provide advice to the National Parks and Wildlife Advisory Council and DEC on a range of natural and cultural heritage conservation matters both on and off reserve. Membership of these committees includes Aboriginal communities, women, local government and farmer groups.
2002	31 August	Sthn	4.2 Additional reporting and consultative mechanisms for NPWS, such as the State of the Parks report.	Continuing Refer to milestone above.
2000	1 April	UNE, LNE, Eden	4.3 Additional reporting mechanisms for SFNSW (e.g. plan of operations, Regional ESFM plans).	In progress FNSW have regional/corporate reporting and consultative mechanisms for considering forest management, including the annual plan of operations (supplied to regulators), and publicly exhibited documents like the ESFM model/regional plans that have incorporated public comments. Other reporting mechanisms, such as the <i>Bush Telegraph</i> , also continued to be published every two months by FNSW, as well as its Research Division's annual report prepared each financial year.

Due date	Region	FA section*	Milestone	Progress
2002	31 August	Shhn	4.3 Att 2p Att 6(7c)	In progress Additional reporting and consultative mechanisms for SF NSW such as plan of operations, NFMS and any committees established to implement forest management at the landscape level. Document basis for silvicultural practices and publish Native Forest Silvicultural Manual.
Annually	UNE, LNE, Eden Shhn	2.2.6	SFNSW reporting at statewide level through Environmental and Social Values Report.	Continuing FNSW's SEEing report has been published for 2005/2006 and is available through the DPI website.
2000	1 April	UNE, LNE, Eden	4.5	In progress Additional reporting mechanisms, such as committees, by other agencies.
ESFM CRITERIA AND INDICATORS				
Monitoring				
Ongoing	UNE, LNE, Eden, Shhn	2.11.2 2.10.2 (E) Att 7 (S)	Monitoring of ESFM criteria and indicators.	Continuing DEC continues to monitor and report annually on its progress towards achieving ESFM through the criteria and indicators. FNSW has a dedicated officer who assists in the administration of the collection of data through an internal system, known as SEEDS. The data collected and entered into SEEDS is used to monitor and report on the ESFM criteria and indicators, as well as being used to assist FNSW to report in its <i>Seeing report: State of the Environment</i> report and other Federal government reports. FNSW continues to modify the system to allow for better ways to both collect, enter and present its data for the various reports that FNSW produces.
Reporting				
Annually	UNE, LNE, Eden Shhn	2.11.2 2.10.2 (E) Att 9	Reporting on indicators to contribute to annual report to Parliament.	Continuing Reporting of the ESFM criteria and indicators has been incorporated into the NSW forest agreement reporting process for the UNE, LNE and Eden regions since 1999/2000, and from 2002/2003 for the Southern region. See chapter 2 for information on the results of monitoring.

	Due date	Region	FA section*	Milestone	Progress
Trial and assessment					
					Completed
2000	1 April	UNE, LNE, Eden	2.11.2 2.10.2 (E)	Preparation of evaluation framework for the criteria and indicators, to provide basis for five-year review.	Planning NSW devised a draft evaluation framework in 2000/2001. The draft was accepted, in principle, as a final document by agencies involved in the collection of ESFM criteria and indicators monitoring data. The framework has since been applied.
					The purpose of the framework is to collect information on the appropriateness of each indicator, such as cost-effectiveness, ability to obtain data and ability to obtain data in specified format. The information obtained from the framework will be used to assist with the review of the criteria and indicators, as part of the first five-year review of the forest agreements.
					An assessment of the ESFM criteria and indicators will be part of the first five-year review of the forest agreements and IFOAs. The review will incorporate those for the Southern region to ensure consistency and compatibility between regions. However, the improvement and development of monitoring and reporting processes for the criteria and indicators by all participating agencies has been ongoing since 1999/2000.
2002	30 September	Sthn	2.11.2	Preparation of an evaluation framework for the criteria and indicators.	Completed Refer to milestone above.
2004	1 April	UNE, LNE, Eden	2.11.2 2.10.2 (E)	Trial and assessment of indicators to ensure they are practical, measurable, cost-effective and capable of being implemented at the regional level.	In progress The ESFM criteria and indicators will be assessed as part of the first five-year review.
2007	30 April	Sthn	2.11.2	Review of indicators.	In progress Refer to milestone above.
Data management					
1999	1 October	UNE, LNE, Eden	6.13	Lodgement of all archival copies of data.	Completed All archival copies of data for the UNE, LNE and Eden regions have been lodged.
2002	30 June	Sthn	6.13	Lodgement of all archival copies of data.	Completed Archival copies of data for the Southern region have been lodged.

Progress					
Due date	Region	FA section*	Milestone		
2000	1 April	UNE, LNE, Eden	6.13 Data management agreement.	Completed	Data management agreement finalised by State members of the CRA Data Management Group and endorsed by RACD of Planning NSW (now FRIP of DNR) in March 2000, applicable to the North East (UNE & LNE) and Eden regions. Agreement attached to North East RFA (Attachment 13). Eden RFA (Attachment 13).
2002	30 June	Sthn	6.13 Att 6(2h) Preparation of data management agreement.	Completed	Data management agreement attached to Southern RFA (attachment 12).
Ongoing	UNE, LNE, Eden, Sthn	Att 8 Att 6(2h)	Developing and implementing an information system to facilitate the sharing of data for use by all agencies, including local government, involved in the management of forested land.	Continuing	In March 2001, the NSW Government launched the CANRI website (www.canri.nsw.gov.au). The site was developed to improve the integration and coordination of data between government departments and increase public awareness of natural resource management. The site aims to integrate existing data and information systems and provide the community with access to a range of natural resource information. Of use to community groups, industry groups, landholders, government agencies and students, it provides easy access to maps and other natural resource information. It also allows stakeholders to contribute information to the site and as a source for data sharing. The CANRI framework provides a central access point to various natural resources data, such as vegetation mapping and data, soil profile information and water quality, storage and river flow. Further developments allowed for access to information on minerals and aquatic and terrestrial wildlife. The development of a biodiversity information system (BioNet) has occurred and allows users to search for records of specific species, or for all species across a specific area of the State. Maintenance of the CANRI website ceased in 2004, however, the CANRI group of products is still available through the NSW Natural Resource Atlas portal at www.nrAtlas.nsw.gov.au/wmc/sevedaps/nrlatlas
Research					
1999	1 December	UNE, LNE < Eden	2.11.3 2.10.3 (E)	Completed	Research projects that are in areas formerly on State forests and are now in national parks and nature reserves, SFNSW to provide NPWS with details of affected studies, location of sites and access requirements.
2002	30 June	Sthn	2.11.3	Completed	Only one research project area, situated in the Murramarang NP, has been identified on DEC tenure (previously State forest) requiring continued access by FNSW. Details of the location of the area where field plots are located have been provided by FNSW to PWD. PWD permits periodic access.

Due date	Region	FA section*	Milestone	Progress
2000 1 January	UNE, LNE, Eden	2.11.3 2.10.3 (E)	Preparation of strategy to outline all monitoring and research to be undertaken.	Deferred A strategy has not been prepared. However, some joint research occurs (e.g. on pests and weeds, threatened species and the Australian Research Committee project).
2003 30 June	Sthn	2.11.3 Att 7	A strategy for important research and monitoring (including ESFM indicators) must be prepared jointly by SFNSW and NPWS.	Deferred A strategy has not been prepared. However, some joint research occurs (e.g. on pests and weeds, threatened species and the Australian Research Committee project).
Ongoing	Sthn	Att 6(2f)	Improving the coordination and effective use of resources allocated to research for ESFM in New South Wales.	Continuing No further progress to report.
2004 1 March	UNE, LNE, Eden	2.11.3 2.10.3 (E)	Preparation of a compendium of forest research.	In progress A compendium of forest research is being compiled.
2007 30 April	Sthn	2.11.3	A compendium of New South Wales forest research must be prepared.	In progress Refer to milestone above.
Ongoing	Eden	3.1	An operational research trial within the Eden region is proposed to be conducted by SFNSW and EPA associated with selective harvesting from some filter strips.	Continuing Operational research trial not implemented during 2005/2006.
2010 31 December	Sthn	Att 6(6a)	Continue to develop a suite of computational tools to help manage NSW forests at operational scales for a range of values including wood yield, growth stage, water quality and quantity, natural and cultural heritage and wildlife habitat.	No reporting required The spatial forest event management system GeoMaster (NZ Forest Research) has been set up for evaluation and testing with native forest operations. Testing has been ongoing under various operating environments in 2005/2006.
2010 31 December	Sthn	Att 6 (6b)	Develop by the end of 2010, a model to predict recruitment and maintenance of habitat trees over time.	No reporting required No further work on this model has occurred during 2005/2006.
2007 30 April	Sthn	Att 6 (6c)	Determine, based on review, field-based sampling and principles of sustainability to determine the range of silvicultural regimes and prescriptions that can be appropriately applied to each strata of forest type.	In progress No progress to report.

	Due date	Region	FA section*	Milestone	Progress
REPORTING AND REVIEW					
Reporting on the forest agreements					
Annually	UNE, LNE, Eden	6.9	Preparation of an annual report on the forest agreement, which will include a discussion on the achievement of milestones for ESFM and compliance with any IFOA.	Continuing 2005/2006 is the seventh year that progress reports have been prepared for the NSW forest agreements and IFOAs for the UNE, LNE and Eden regions. Progress reporting is provided for each financial year for: the achievement of milestones in the forest agreements; monitoring data collected for the ESFM criteria and indicators; and compliance with the IFOAs.	
Annually	Sthn	6.9	The Minister administering the <i>Environmental Planning and Assessment Act 1979</i> must prepare an annual report on this agreement which will include ESFM and compliance with any IFOA for the region.	Continuing 2005/2006 is the fourth year that an annual report covering the implementation of the forest agreements for the Southern region has been prepared. Progress reporting is provided for: the achievement of milestones in the forest agreement; monitoring data collected for the ESFM criteria; and indicators and compliance with the IFOA.	
As soon as practical after it is prepared	UNE, LNE, Eden, Sthn	6.9	Each annual report on the agreements is to be tabled in each House of Parliament by the Minister for Urban Affairs and Planning as soon as practical after its prepared.	Continuing 1999/2000 Forest Agreement Annual Report – UNE, LNE and Eden regions was tabled in Parliament in February 2002. 2000/2001 Forest Agreement Annual Report – UNE, LNE and Eden regions (date of tabling to be advised). Forest Agreement Implementation Report 2001/2002 – UNE, LNE and Eden regions (date of tabling to be advised). Forest Agreement Implementation Report 2002/2003 – UNE, LNE, Eden and Southern regions (date of tabling to be advised). Forest Agreement Implementation Report 2003/2004 – UNE, LNE, Eden and Southern regions (date of tabling to be advised). Forest Agreement Implementation Report 2004/2005 – UNE, LNE, Eden and Southern regions (date of tabling to be advised).	
Review					
Ongoing	Every 5 year review	UNE, LNE, Eden	6.8	Ministers to review the performance of the forest agreements and IFOAs including their effectiveness and efficiency in meeting Government goals and policies.	Continuing Part of first five-year review.
2007	30 April 2007 and every 5 years	Sthn	6.8	Every five years after the agreement is signed, a review of the performance of the agreement must be undertaken by the Ministers to assess the effectiveness and efficiency of the agreement (and approval) in meeting the NSW Government's goals and policies.	Continuing Refer to milestone above

	Due date	Region	FA section*	Milestone	Progress
Ongoing	Every 5 year review	UNE, LNE, Eden	6.8	Parties to ensure the public are given an opportunity to participate in the review (public notification and inspection).	No reporting required Refer to milestone above.
	31 December and every 5 years	Shn	6.8	The public is to be given an opportunity to participate in the review of the agreement.	No reporting required Refer to milestone above.
Ongoing	12 months after each 5 year review	UNE, LNE, Eden	6.8	Report on the outcome of the Ministers' performance review to be tabled in each House of Parliament twelve months after the review.	No reporting required Not required until 12 months after the completion of the review.
	31 July and every 5 years	Shn	6.8	A report on the outcome of each review must be tabled in each House of Parliament within 12 months after the end of the relevant reporting period.	No reporting required Refer to milestone above.

* (E) – Reference in Eden Region Forest Agreement

(S) – Reference in Southern Region Forest Agreement

