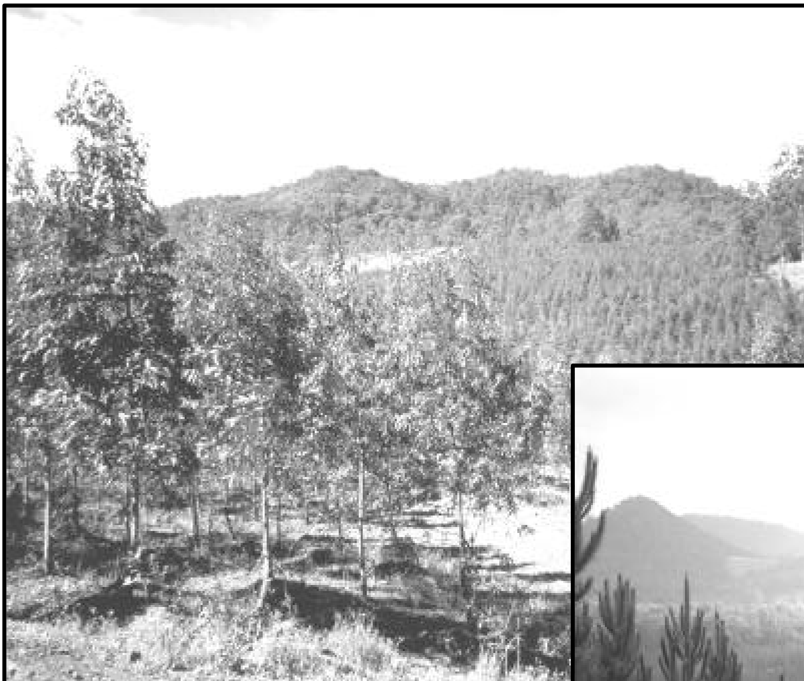
Department of
Infrastructure, Planning and Natural Resources

Review of the Plantations and Reafforestation Legislation

Discussion Paper

June 2005



Department of
Infrastructure, Planning and Natural Resources

Review of the Plantations and Reafforestation Act 1999 & Plantations and Reafforestation (Code) Regulation 2001

Discussion Paper

June 2005

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Acronyms and Abbreviations

CMA:	Catchment Management Authority
Code:	*Plantations and Reafforestation (Code) Regulation 2001*
DIPNR:	Department of Infrastructure, Planning and Natural Resources
EP&A Act:	*Environmental Planning and Assessment Act 1979*
LGA:	Local Government Area
NTC:	National Transport Commission
NV Act:	*Native Vegetation Act 2003*
NVC Act:	*Native Vegetation Conservation Act 1997*
PR Act:	*Plantations and Reafforestation Act 1999*
RF Act:	*Rural Fires Act 1997*
RFS:	Rural Fire Service
RVS:	Regional Vegetation Schedule
SEPP:	State Environmental Planning Policy

An invitation to comment

You are invited to comment on this discussion paper.

The NSW Government is committed to the sustainable development of the timber plantations sector, and has established a streamlined legislative framework that balances economic growth with the social interests of local and regional communities while protecting the environment.

To maintain this standard, the Department of Infrastructure, Planning and Natural Resources (DIPNR) has initiated a statutory five-year review of the *Plantations and Reafforestation Act 1999* (PR Act) and the *Plantations and Reafforestation (Code) Regulation 2001* (Code). This discussion paper is the first step in the review.

The discussion paper presents a number of issues and discusses options for addressing them, with a view to improving the effectiveness of the PR Act. DIPNR, other Government agencies, the plantations industry, local councils and the broader community have identified the issues presented here.

We need your help in the review process. We would like you to comment on the discussion paper and suggest how we can make the PR Act and Code work better for all. Comments do not have to be restricted to matters raised in this discussion paper.

To make it easy for you to send us your comments, we have developed a submission form, available on the DIPNR website, www.dipnr.nsw.gov.au. You can also obtain copies of the submission form from your Regional DIPNR office or the DIPNR Information Centre.

The closing date for submissions is Monday 1 August 2005. Further details about the submission process are provided in section 7. All submissions will be considered, and will help to shape the outcomes of the review.

Jennifer Westacott

Director General

Department of Infrastructure, Planning and Natural Resources

1.0 Background

1.1 History

In March 1999 the NSW Premier established a Plantations Task Force to recommend initiatives that would encourage increased private sector investment in forestry plantations in NSW. Among the recommendations subsequently approved by the Government was the introduction of legislation aimed at improving the regulatory framework for the plantation industry.

Before this initiative, the plantation industry had been regulated by multiple legislative requirements, administered by several different agencies. This was seen as a disincentive to investment in NSW, as it provided prospective investors with little certainty about the decision-making process in terms of the timing and outcome of development approvals. The desired outcome was to streamline processes to overcome these uncertainties, without compromising existing environmental standards.

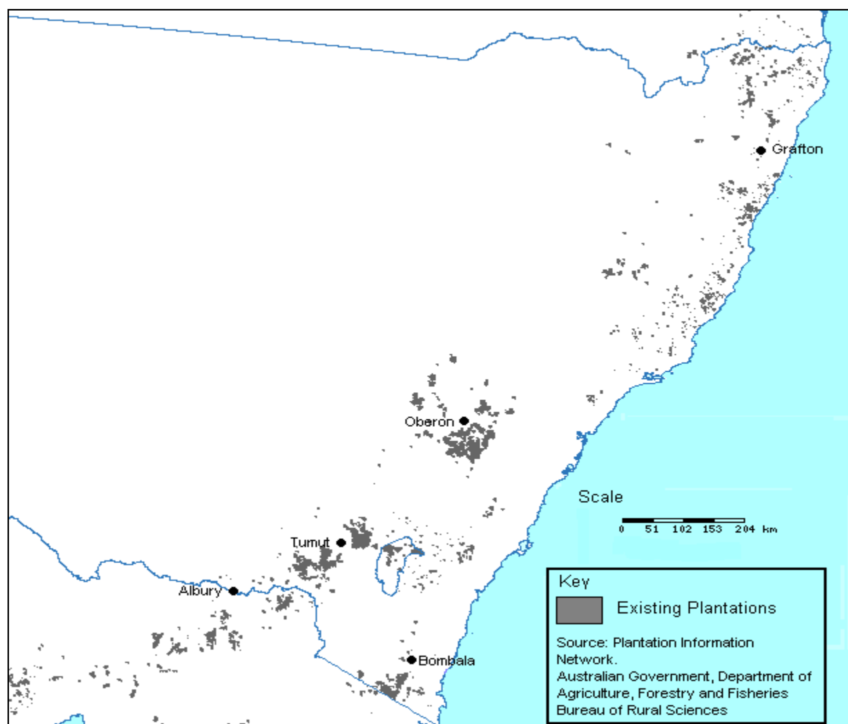
The PR Act and Code came into operation in December 2001.

1.2 NSW plantation estate

The NSW plantation estate exceeds 330 000 ha, of which most (>280 000 ha) are softwood plantations. In recent years there has been a modest increase in the hardwood estate, mostly comprising plantations established by Forests NSW (formerly State Forests). NSW has the largest softwood plantation estate in Australia, and the third largest overall plantation estate.

The key softwood growing areas are around Tumut and Albury in the Riverina region and Oberon in the Central West (Figure 1). Other significant softwood areas include the North Coast and the Bombala district in the south-east of the State. Most hardwood plantations are located on the North Coast.

Figure 1: *NSW plantation estate*



Source: Plantation Information Network, 11 January 2005.

1.3 Main provisions of the PR Act & Code

1.3.1 The PR Act

The PR Act provides an integrated framework for applications for plantation development for the purpose of timber production and environmental plantings. It supports the establishment of plantations on essentially cleared land, while safeguarding environmental values. It is stand-alone legislation, although permits are still required under some other legislation (such as the *National Parks and Wildlife Act 1974* for Aboriginal heritage items). Plantations are an allowable land use outside residential and commercial zones, in the same way as agricultural enterprises.

DIPNR assesses plantation proposals to ensure they meet the requirements of the PR Act and Code.

The PR Act establishes 3 categories of plantation:

Exempt farm forestry:

Plantations of 30 ha or less do not require authorisation under the PR Act, provided that certain criteria are met. However, owners of small plantations may still seek authorisation, particularly in order to obtain harvest guarantee.

Complying plantations:

These comply with all the standards in the Code.

Non-complying plantations:

These do not comply with all the standards in the Code, but may still be authorised under the PR Act, with conditions attached.

Different assessment processes apply for complying and non-complying applications. Complying plantation applications undergo a streamlined assessment process, where compliance with the Code and threatened species legislation are the only considerations. The PR Act requires authorisation of complying plantations to be completed within 14 days. Non-complying applications undergo detailed assessment of those aspects of the application that do not comply with the Code. The PR Act allows non-complying applications to take up to 40 days to process.

The PR Act also makes provision for:

- the protection of unique or special wildlife values on authorised plantations
- financial contribution by owners of timber plantations for expenditure on transport infrastructure
- a public register of plantation authorisations

The right to harvest authorised timber plantations is guaranteed, unless unique or special wildlife values are found to be present, in which case compensation may be payable in certain circumstances.

1.3.2 The Code

The Code contains clear and comprehensive standards for establishment, management and harvesting operations.

It includes requirements for:

- planning and approval processes (including a pre-application site inspection)
- establishment, management and harvesting operations
- protection of soil, water, cultural heritage and biodiversity assets
- construction and maintenance of roads, crossings and log dumps
- management of retained areas

1.4 Alignment with other policies

The NSW Government is committed to providing a streamlined regulatory environment for plantations, with a view to expanding the State's plantation estate.

While the PR Act and Code provide a single regulatory process for the authorisation of plantations and reafforestation activities, they do not operate in isolation from other policy initiatives. The 3 major policy areas that affect the plantations sector are:

- native vegetation management
- threatened species conservation
- strategic land use planning

The NSW Government has initiated significant reforms in these areas, and it is important that the outcomes of this review ensure consistency in landscape management across all industry sectors.

The policy reforms have seen a shift to the management of conservation and environmental protection issues at a landscape level. The PR Act's direction that plantations be developed on essentially cleared land ensures basic consistency. However, some specific issues remain, which are addressed in sections 5 and 6 of the discussion paper.

The PR Act and Code also need to be aligned with industry-specific policies. The *National Forest Policy Statement* (1992) and *Plantations for Australia: The 2020 Vision* (1997, revised 2002), which aim to achieve a substantial increase in the plantation area across Australia by 2020, provide the context. The streamlining of the regulatory process facilitates plantation development while environmental values are protected.

Other initiatives supporting the sustainable expansion of the plantation estate in NSW include the:

- development of a NSW Forestry and Timber Processing Industry Strategy
- review of certain forest agreements and Regional Forest Agreements
- report on Australian Forest Plantations prepared by the Senate Rural and Regional Affairs and Transport References Committee (Senate Committee Report)

The Forestry and Timber Processing Industry Strategy will examine all aspects of the forest industry sector, with the aim of expanding the plantation estate and achieving sustainable long-term management of the native forest estate in the context of projected industry demands.

Planning for the statutory five-year review of certain State forest agreements and Regional Forest Agreements is under way. The review process will consider the role of plantations in the broader industry context.

The Senate Committee Report reviewed *Plantations for Australia: The 2020 Vision.* The report was broadly supportive of this national policy framework but made a number of recommendations regarding planning, research and reporting.

1.5 Plantations in the physical and social environment

1.5.1 The physical environment

Plantations established primarily for the purpose of timber and fibre production have been shown to have a number of environmental benefits. These include the reduction of soil erosion and salinity, the creation of wildlife corridors, improvement of water quality and the creation of carbon sinks. Plantations also maintain hydrological systems and reduce peak run-off rates during flood-producing storms, thereby reducing flood damage, soil erosion and consequent siltation of waterways.

Benefits for biodiversity can occur in both hardwood and softwood plantations. Research by Lindenmayer (2002) around Tumut in south-east NSW has shown that retention of native

vegetation remnants within radiata pine plantations improves biodiversity. Plantations can also connect forest remnants and allow some species to move between patches of native vegetation. Retention of remnant patches of native vegetation and existing vegetation along creek lines is a requirement of the PR Act and Code that promotes biodiversity values.

The recent rate of plantation expansion has created some concerns in relation to landscape planning, water interception and fire protection in parts of the State. This is because plantation expansion creates landscape change, which may impact on local communities. It is important that this review should acknowledge these concerns, and address them where possible. Discussion of specific issues is included in sections 5 and 6 of the discussion paper.

1.5.2 Social environment

Plantation forests represent 1% of Australia's forests, yet they supply more than 50% of our domestic timber needs. With access to timber supplies from native forests diminishing, the plantation sector is becoming more significant in providing raw materials for industry. Plantations provide a wide range of forest products that support a vibrant and growing timber-processing sector. The establishment and management of timber plantations and the ancillary services associated with the industry provide the economic basis for many regional communities in NSW.

The Bureau of Rural Science has found that plantations have a greater gross value per unit area than many forms of agriculture typical in the same locality. For instance in the Green Triangle region (south-east South Australia and south-west Victoria), agriculture uses 10 times as much land as forestry and related industries, but the gross value of the agricultural production is $1.9 billion, compared with $1.5 billion for forestry and forest products (Keenan *et al.* 2004a).

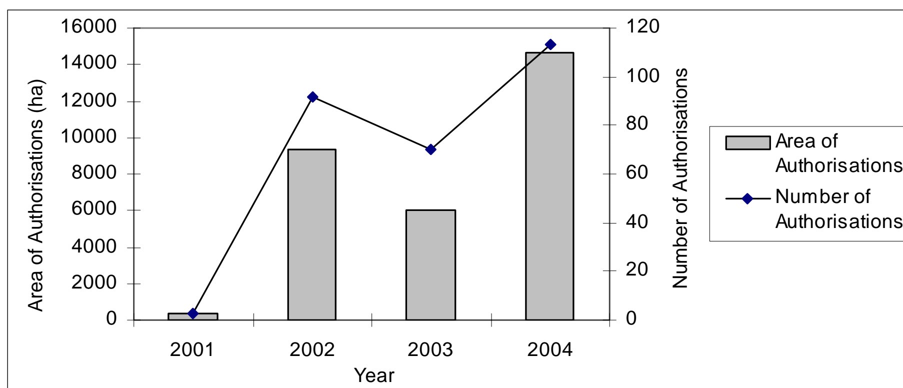
Nationwide, plantations and related industries generate more than $12 billion a year and employ more than 50 000 people (A3P 2004). With about 330 000 ha (20% of the total), NSW has the third largest plantation estate in Australia, and its plantations make a substantial contribution to this total. For example, in 2002/3 the plantation industries in the South-West Slopes region contributed about $1.1 billion to the State's economy and generated employment for over 3500 people (URS 2004).

1.6 Performance of the PR Act (data current to end December 2004)

1.6.1 New authorisations

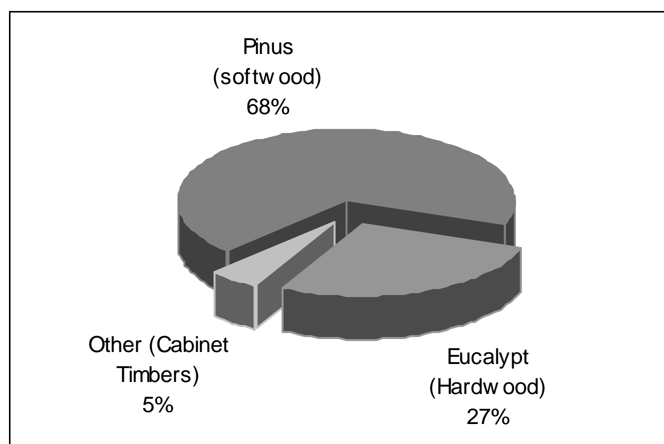
Since the PR Act and Code were implemented in December 2001, over 270 plantations have been authorised, covering an area of approximately 30 400 ha (Figure 2). These figures include some existing plantations for which owners have chosen to seek authorisation. The area authorised for new plantations is around 22 800 ha.

Figure 2: *Area and number of plantations authorised under the PR Act (as at the end of December 2004)*



Softwood plantations account for 68% of the total area authorised, with hardwood and speciality (cabinet timber) plantations accounting for the rest (Figure 3).

Figure 3: *Authorised plantation area, by plantation type (as at the end of December 2004)*



The North Coast and the Riverina region account for 70% of authorisations under the PR Act. However, smaller areas of plantations have been established in all regions except for the western part of the State.

1.6.2 Evaluation

The desired outcomes of the PR Act and Code were to streamline processes and encourage investment in plantations, while maintaining environmental standards. Since the PR Act and Code have been in operation for a relatively short time, it has not been possible to undertake a detailed evaluation of their performance. However, the following results provide an indication that the PR Act and Code are achieving the desired outcomes:

- guarantee of service time limits for assessment are met for 93% of applications
- 93% of applications for authorisation of new plantations comply with the Code
- feedback to DIPNR indicates that industry groups are generally satisfied with the PR Act and Code
- an area of around 6 400 ha of native vegetation (21% of the total authorised plantation area) has been retained and/or re-established on authorised plantations

Table 1 shows the improvement in service delivery (approval times) under the PR Act compared with when approvals were issued under the *Native Vegetation Conservation Act 1997* (NVC Act).

Table 1: *Comparison of approval times (average turnaround time in days)*

Pre-PR Act for plantations where consent was required for clearing under the NVC Act		**Post-PR Act for plantations authorised under the PR Act**		
Year		Year	Complying	Non-complying
1998	128	Dec 2001	2	N/A
1999	60	2002	8	55
2000	103	2003	8	17
Jan–Nov 2001	167	2004	5	46

In order to monitor compliance with the PR Act and Code, DIPNR is currently developing an audit strategy. Programs and procedures for auditing plantations, consistent with the international standard for auditing (ISO 19011), have been established. Regular audits are being performed by DIPNR plantation officers accredited as environmental auditors. Audits conducted by DIPNR indicate a high level of compliance with the PR Act and Code.

2.0 Purpose of the review

2.1 Review requirements

The PR Act provides that it must be reviewed after 5 years from the date of assent. The purpose of the review is to determine whether the policy objectives of the PR Act remain valid and whether the terms of the PR Act remain appropriate for securing those objectives. A report on the outcome of the review must be tabled in Parliament by 8 December 2005.

The Code is a regulation under the PR Act. Regulations must be reviewed after 5 years of operation. The purpose of the review of the Code is to determine whether the Code has furthered the objectives of the PR Act and dealt with the matters required by the PR Act.

The interdependence of the PR Act and Code means that it is appropriate that they are reviewed together.

2.2 Policy objectives of the PR Act

The policy objectives are reflected in the objects of the PR Act (section 3), which are:

(a) to facilitate the reafforestation of land,
(b) to promote and facilitate development for timber plantations on essentially cleared land,
(c) to codify environmental standards, and provide a streamlined and integrated scheme, for the establishment, management and harvesting of timber and other forest plantations, and
(d) to make provision relating to regional transport infrastructure expenditure in connection with timber plantations,

consistently with the principles of ecologically sustainable development (as described in section 6(2) of the *Protection of the Environment Administration Act 1991*).

2.3 Have the terms of the PR Act secured the policy objectives?

(a) To facilitate the reafforestation of land

The PR Act and Code facilitate the reafforestation of land by removing requirements for consents and approvals under most other legislation. The vast majority of authorisations under the PR Act have been for timber plantations.

Reafforestation, in the NSW context, means plantings intended to reduce salinity, enhance biodiversity, lower ground water and control erosion. Less than 100 ha has been authorised to date for this type of plantings. Possible reasons for this low figure are that:

- most environmental plantations are less than 30 ha, and so do not have to be authorised
- owners do not see any value in seeking authorisation, as they do not intend to harvest their plantings in the future
- owners may not be aware of the authorisation requirements
- drought conditions over the past few years have made planting unrealistic

The advantage for owners of having environmental plantings authorised under the PR Act is that this will remove the need to obtain consents and approvals that might otherwise be required, such as permits under the *Rivers and Foreshores Improvement Act 1948.*

(b) To promote and facilitate development for timber plantations on essentially cleared land

The PR Act and Code facilitate development for timber plantations by streamlining the assessment process and excluding requirements under most other legislation. Direct evidence of this is found in the area of plantations established, and the delivery of an effective assessment service to plantation developers, with 93% of all applications completed within guarantee of service time limits.

It is less clear whether the terms promote development, although the existence of an exclusive piece of legislation could be seen as doing so. In addition, the PR Act and Code provide confidence to organisations with an active role in promoting the expansion of the plantation estate, such as the Department of State and Regional Development.

This policy objective includes the requirement that plantations be established on essentially cleared land. The provisions of the Code prevent the authorisation of plantations on land that does not meet this criterion. The high level of complying applications indicates that this policy objective is being met.

Another indication is that only 560 ha of remnant native vegetation has been approved for clearing, which corresponds to approximately 3% of the total area of new plantation developments authorised under the PR Act.

(c) To codify environmental standards, and provide a streamlined and integrated scheme for the establishment, management and harvesting of timber and other forest plantations

The PR Act and Code bring into one regulatory instrument most of the requirements for the assessment of a plantation development. The PR Act streamlines the provisions of a number of environmental conservation and natural resource management Acts. The success of the PR Act in its delivery is evidenced by:

- meeting the guarantee of service time limits for authorisations for 93% of applications
- only 560 ha of remnant native vegetation having been approved for clearing through the authorisation process
- around 6 400 ha of native vegetation being retained and/or re-established on authorised plantations, to be maintained in perpetuity

(d) To make provision relating to regional transport infrastructure expenditure in connection with timber plantations

Part 5 of the PR Act provides for infrastructure contribution plans and a levy on plantations authorised under the PR Act. To date no infrastructure contribution plans have been finalised, and therefore no infrastructure levies are payable. This indicates that this objective has not been secured.

Consideration must be given to how to provide more effectively for infrastructure contributions in the future. For further discussion of this issue, see section 6.2.

2.4 Are the policy objectives still valid?

One purpose of the review is to determine whether the policy objectives of the PR Act are still valid. In the light of the discussion in section 2.3 and the issues raised in sections 5 and 6, please comment on whether the policy objectives are still valid.

2.5 Are additional policy objectives required?

Please comment on whether further and/or different policy objectives should be considered.

3.0 Scope of the review

The development of the PR Act and Code resulted in vastly improved service delivery for an important and expanding industry. This review will fine-tune the PR Act and Code and identify further improvements designed to build on past successes. This approach is in line with continual improvement and best practice principles for regulatory reform.

The review will focus on the following areas:

- administrative and operational outcomes
- environmental outcomes
- consistency with the *Native Vegetation Act 2003* (NV Act)
- impediments to industry resulting from the regulatory framework

4.0 Scope of the discussion paper

The topics included in this discussion paper have been identified by DIPNR, other Government agencies, the plantations industry, local councils and the broader community as significant issues relating to the operation of the PR Act and Code.

4.1 Issues that can be addressed in the review

These are significant issues that can be addressed within the review process, because they are specific to the plantations industry and the operation of the PR Act and Code.

These issues are presented in section 5.

4.2 Related issues

These are significant issues relating to plantations that require broader consideration rather than an industry-specific solution, and cannot be resolved within the review process. However, your comments will help DIPNR understand industry and community views, and determine the most appropriate way of tackling these issues.

These issues are presented in section 6.

4.3 Minor changes

A number of minor changes to specific provisions of the PR Act and Code are also required, for a variety of reasons. For example:

- it is necessary to change references to the former Department of Land and Water Conservation to DIPNR
- provisions in the Code for the size and stability of drainage feature crossings need to be updated to be consistent with Department of Primary Industry revised guidelines for fish passage

These minor changes are not included in the discussion paper. If you want to find out more about them, please contact DIPNR by email at treenet@dipnr.nsw.gov.au or telephone 02 6840 0900. In order to comment on these aspects you will need to be familiar with the PR Act and Code, which are available on the DIPNR website www.dipnr.nsw.gov.au

Please note that there will be a further chance to comment on these minor changes during the public exhibition period for any proposed amendments to the PR Act and Code.

5.0 Issues that can be addressed in the review

This section discusses each of the major issues, as identified by DIPNR, other State Government agencies and key stakeholders. The discussion is structured to give some background to the issue and then either a range of options or proposed direction is presented. Options are presented where an issue can be addressed in a number of ways. Proposed directions are offered where DIPNR's analysis concluded that there is a clearly preferred way to resolve the issue for legal or policy reasons. Whether options or proposed directions are given, your comments are invited.

5.1 Application fees

When the Code was exhibited in 2001, a sliding scale of fees was proposed in the Regulatory Impact Statement. When the PR Act and Code were implemented a one year moratorium on fees was granted. This was subsequently extended by a further 12 months. The situation regarding fees now requires review.

Application fees for plantation authorisation would be consistent with the Government’s policy of fee for service. Fees currently apply to the assessment and approval of development applications under the *Environmental Planning and Assessment Act 1979* (EP&A Act). Fees would also recognise the user-pays principle.

Fees can achieve full or partial cost recovery. Factors influencing methods of charging include the level of demand for the service and capacity to pay. A moderate approach would be appropriate having regard to the Government’s commitment to encouraging the plantation industry in order to increase plantation investment.

The fee scale proposed in 2001 aimed for partial, rather than full cost recovery. The scale was based on plantation area. There were to be higher fees for non-complying plantations, in response to a perception that non-complying applications would require greater levels of assessment. It was also thought that higher fees would act as an incentive to owners to submit complying proposals. No fees were proposed for environmental plantings or for complying plantations of 30 ha or less.

An estimate of the total costs involved in authorisation assessments (including operational and salary costs) indicates that the 2001 fee scale would have recovered only 9% of the total cost of services. The fees would not even have covered operational costs, and a moderate increase is required in order to do achieve this.

Only 11 authorisations for new plantations since the inception of the PR Act have been for non-complying plantations (7% of applications for new plantations). It therefore seems unnecessary to have a higher scale rate for these plantations.

150 authorisations have been for plantations of 30 ha or less (54% of total authorisations). In view of this it is appropriate to impose a fee for these smaller plantations.

The proposed schedule of fees in Table 2 would cover operational costs, while recovering around 18% of total costs.

Table 2: *Proposed fee scale*

Total plantation area (ha)	Environmental plantings	Timber plantations
Up to and including 30	Nil	Flat fee of $185
>30–100	Nil	$185 + $3/ha or part ha over 30 ha
>100–500	Nil	$395 + $0.50/ha or part ha over 100 ha
>500–1000	Nil	$595 + $0.30/ha or part ha over 500 ha
>1000	Nil	$745 + $0.10/ha or part ha over 1000 ha

Options:

- Adopt the fees set out in Table 2
- Adopt a different fee scale based on partial cost recovery
- Charge fees based on full cost recovery

5.2 Authorisation of existing plantations

Existing plantations are plantations that were established before the PR Act was implemented, and that were not accredited under the *Timber Plantations (Harvest Guarantee) Act 1995*.

Because the PR Act does not require existing plantations to be authorised, they effectively remain outside the regulatory framework and the PR Act and Code do not apply to them. The intent of the PR Act was to require authorisation at the time that existing plantations were re-established, and this was industry's expectation when the PR Act was drafted. However, section 9 of the PR Act does not reflect this requirement.

There is limited information on the extent of the existing plantation estate, but industry estimates indicate the area of existing plantations may be in the order of 50 000 ha.

DIPNR believes that it is desirable to progressively bring all plantations into the regulatory framework. It is therefore necessary to clarify the wording referring to authorisation of existing plantations for subsequent rotations. The aim would be to require existing plantation owners to seek authorisation at the time they are re-establishing their plantations.

Proposed direction:

- Require authorisation of existing plantations at the time of re-establishment

5.3 Fire protection

The perception by some members of the public that there is an increased fire risk from forested areas, including plantations, requires that fire protection issues be examined in the review process. The Code currently contains only minimal provisions for the protection of the public, such as standards for the creation of fire trails, but it could be modified to include further fire safety standards.

The fire protection measures discussed below are aimed at ensuring public safety, and do not include measures required to protect plantation assets, which remain the responsibility of plantation owners. Owners should contact local fire authorities for help with initial plantation design and information on fire protection measures.

Pre-planning the layout of plantations for fire protection provides for the highest level of safety when considering fire escape from plantations or fire intrusions from surrounding areas.

The fire protection measures envisaged include provisions for:

- setback distances from dwellings to protect private property
- standards for roading and firebreaks (including primary fire access roads, secondary fire access trails and internal breaks, and boundary firebreaks) to provide access for firefighting vehicles and equipment
- powerline setbacks
- access to water storages to service firefighting appliances.

If these fire protection standards are included in the Code, compliance could be assessed during audits and other routine inspections.

Another option could be for the Code to require compliance with fire protection guidelines produced by the Rural Fire Service (RFS). This option would ensure that as the RFS updates its provision for fire protection, any new or changed requirements would automatically flow on to plantation authorisations.

A third option is to retain the *status quo*, on the basis that fire protection should remain the responsibility of the RFS and any regulatory measures should be clearly set out in the *Rural Fires Act 1997* (RF Act), not in the PR Act or Code. If this approach were adopted, it would be possible for DIPNR and the RFS to produce advisory material for plantation owners outlining their fire protection responsibilities under the RF Act.

Options:

- Include standards in the Code
- Include a requirement to comply with RFS guidelines
- No change

5.4 Harvesting provisions

Part 6 of the Code establishes standards and requirements for harvesting operations. The current standards do not in all cases represent environmental best practice.

Table 3 summarises the proposed changes and additional conditions.

Table 3: *Proposed changes to harvesting provisions.*

Condition or activity	Proposed change
Operations during wet weather	Machinery must not operate in a harvesting area, log dump or landing if the soil on the site is saturated or if surface runoff is occurring.
Drainage feature crossings	Introduce requirements for use of slash crossings when conditions are dry and earthworks are not required.
Road maintenance (blading off)	Blading off should not be permitted.
Use of forwarders on steep grades	Reduce maximum grade for use of forwarders to 25°.
Skidding - clause 59(4)	Should refer to snigging.
Restoration of log dumps and landings	Upon completion of activities, log ramps and landings should be restored to a level surface, and logging debris should be removed to facilitate revegetation.
Track construction	Construction of new tracks should be minimised, and where practical, walkover extraction should be used and

	slash should be retained on track surfaces.
Track maintenance	Introduce a requirement to install crossbanks on snig tracks and extension tracks where bare soil is exposed.
Crossbanks	Provide definition and include detail of minimum effective heights, i.e. 25 cm consolidated.
Snigging activities	Introduce requirement for snigging and timber extraction activities to be uphill wherever practicable.
Snig tracks and extraction tracks	Grade of a snig or extraction track not to exceed 25°.

The proposed changes reflect current industry standards of best practice, and should not impose an additional burden on plantation owners or managers. A review of the effectiveness of the current slope limits for harvesting (clause 59) will also be undertaken.

Options:

- No change
- Introduce the provisions outlined

5.5 Hazard reduction burning in retained areas of native vegetation

'Retained areas' in plantations comprise native vegetation, including rainforest, wetland, habitat trees and replacement trees. The Code requires that retained areas be managed to conserve their biodiversity and ecological integrity, but it is not clear whether this requirement allows hazard reduction burning to be undertaken.

The RF Act obliges owners or occupiers of land to carry out hazard reduction works in accordance with a Bush Fire Risk Management Plan, or in accordance with 'Notified Steps for the Establishment and Maintenance of Planted Forests', issued by the Bush Fire Coordinating Committee in 2001. Although bush fire plans may include hazard reduction burning, the notified steps refer only to alternative hazard reduction methods such as grazing, mowing and slashing.

The lack of clarity in both the PR Act and Code and the RF Act means that inconsistent advice is being given regarding consent requirements for hazard reduction burning. In some districts owners are advised to obtain consent under the NVC Act, whereas in others they rely on provisions contained in bush fire plans.

It is important to maintain the biodiversity and ecological integrity of retained areas. Care needs to be taken that if any burning is allowed in these areas, it is for environmental management purposes or for hazard reduction, rather than for other purposes such as grazing management.

DIPNR believes that hazard reduction burning should be allowed as a management option in retained areas, provided that this will conserve biodiversity and ecological integrity. The aim is to minimise the hazard potential of these areas while not undermining their environmental purpose. It may therefore be necessary to include in the Regional Vegetation Schedule (RVS) any native vegetation communities for which hazard reduction burning is not appropriate.

Hazard reduction burning should be carried out according to any relevant best practice guidelines.

Options:

- Allow hazard reduction burning in retained areas
- Prohibit hazard reduction burning in retained areas

5.6 Native Vegetation Act 2003

Through the Code the PR Act contains a standardised system for the management of biodiversity that is applied across the landscapes of NSW. This provides a clear and transparent

operating environment for plantation investors, which is considered essential if the PR Act is to deliver its objectives. The Code is designed to maintain environmental standards for soil, land and biodiversity. In relation to biodiversity, it contains provisions for the protection of:

- native vegetation in riparian zones
- rainforest and wetlands
- high conservation value grasslands
- vegetation on rocky outcrops
- patches of native vegetation greater than 1 ha
- habitat trees
- patches of significant vegetation types between 0.5 and 1 ha in size as listed in the RVS

The Code seeks to protect remnant patches of vegetation, a key component identified by Lindenmayer (2002) if biodiversity conservation within plantations is to be achieved. Patches greater than 1 ha must be retained for complying plantations, which form 93% of new plantations authorised since 2001. Emphasis is also placed on the retention of smaller remnants down to 0.5 ha in highly fragmented landscapes. Under the Code, these kinds of community are generally protected by the RVS.

The small amount of native vegetation clearing authorised relative to the area of plantations established (560 ha, which is approximately 3% of the total area of new plantations) indicates that the provisions of the Code are allowing for expansion of the plantation estate without causing significant losses of native vegetation.

Although the PR Act has its own system for mitigating impacts on biodiversity, it does contain linkages to the NVC Act. The NVC Act is due to be replaced by the NV Act, which seeks to end broadscale clearing. The review of the PR Act should therefore take into consideration the intent of this new legislation, with a view to achieving consistency.

There are 4 main areas of inconsistency between the PR Act and the NV Act:

(a) The NV Act's process for assessing the clearing of native vegetation focuses on environmental outcomes. The PR Act, which is essentially development legislation, places equal emphasis on social and economic considerations.

(b) The PR Act and Code provide for offsets for clearing of habitat trees in the form of 'replant areas', whereas the NV Act may specify re-establishment of native vegetation and/or additional management actions such as removal or control of grazing, retention of fallen timber, fencing and weed control (depending on the negotiated outcome).

(c) Regrowth under the PR Act is defined as native vegetation less than 10 years of age, whereas in the NV Act it is any native vegetation that has regrown since 1 January 1990 (or 1 January 1983 in the Western Division).

(d) Under the PR Act, native woody vegetation or high conservation value grassland within drainage lines has a 10 m buffer, and wetlands have 20 m. Rivers attract 20 m buffers that exclude timber plantation establishment regardless of the vegetation within the buffer. The NV Act would require larger buffers on drainage features than is required under the PR Act. For coastal areas and tablelands the NV Act process will require the following buffers:

- 10 m on 1st and some 2nd order streams
- 20 m on some 2nd order and most 3rd order streams
- 30 m on some 3rd and 4th order streams
- 40 m on most 4th and higher order streams
- 30 m for wetlands.

Under the NV Act, clearing of native vegetation (except for clearing of regrowth and other permitted clearing) must improve or maintain environmental outcomes for water quality, land degradation, salinity and biodiversity. Applications for clearing are assessed via a computer-based tool, which evaluates impacts and possible offsets of the clearing to determine whether it meets the 'improve or maintain' test. The key difference between the NV Act and PR Act processes is that a plantation investor can largely determine outcomes under the PR Act before

making contact with DIPNR. The Code is readily available to the public. By contrast, outcomes under the NV Act process will differ depending on location and negotiation with the landholder.

The generic nature of the Code is possible because it attempts to regulate only one land use for which the types of activities that are undertaken are generally similar across NSW. It should be noted that the Code is designed to give regionalised protection to significant vegetation communities through the RVS. It is considered that the RVS provides a practical means by which consistency with the NV Act may be attained (this is discussed further in section 5.8).

It is acknowledged that the Code will not give exactly the same outcome as the NV Act process. However, the range of protection measures within the Code gives a high level of protection of biodiversity values. It is therefore considered that the 'improve or maintain' test is inappropriate for plantations that comply with the Code.

For non-complying applications, one option is that the biodiversity aspects could be assessed under the NV Act process. This would create a similar result to that proposed under the NV Act for private native forestry, where a proposal will be deemed to improve or maintain environmental outcomes if it complies with a Code of Practice, but will be subject to the 'improve or maintain' test if it does not.

Assessing non-complying plantations under the NV Act system would provide a consistent approach. However, social and economic factors are an important aspect of the PR Act, and these would need to be considered before incorporating the NV Act provisions for non-complying plantations. On this basis, it is proposed that complying plantations continue to be assessed by the Code (as modified by this review), and consideration be given to the introduction of the NV Act process for biodiversity aspects of non-complying plantations.

Options:

- Assess complying applications according to the Code, and biodiversity aspects of non-complying plantations through the NV Act assessment process
- Assess all applications using the NV Act assessment process

5.7 Privacy issues

5.7.1 Public register

The purpose of a public register is to provide information on past and current plantation authorisations and trends. The PR Act requires a public register to be available for inspection at DIPNR's head office, any relevant regional office and on the Internet. The current plantations register contains information on applicant name, plantation area, plantation species, identity of the plantation and/or a description of its location.

The public register provisions in the PR Act are not consistent with the *Privacy and Personal Information Protection Act 1998* (Privacy Act). The Privacy Act limits the disclosure of personal information, which is defined as information about an individual whose identity is apparent or can be ascertained from the information.

To ensure that the plantations register aligns with the provisions of the Privacy Act, it is proposed that the register be revised. An on-line plantations register will be developed. This will also provide access to conditions attached to plantation authorisations. The register will not include personal information, to ensure consistency with the Privacy Act.

The proposed register will include the following information:

- registration number (this would link to conditions of authorisation for non-complying plantations)
- DIPNR region
- Catchment Management Authority (CMA)

- Local Government Area (LGA)
- PR Act section (13, 14 or 17)
- type of plantation (hard or softwood)
- total area authorised (ha)
- plantable area (ha)
- native vegetation approved for clearing (ha)
- native vegetation to be retained (ha)
- native vegetation to be replanted (ha)

In addition, a Lot and Deposited Plan (DP) search facility will be developed. This will enable prospective purchasers to ascertain whether a plantation has been authorised on land they wish to buy.

5.7.2 Application form

Currently, the application form for plantation authorisations does not include any information about the Privacy Act. The inclusion of a privacy note on the application form would ensure that applicants are aware that personal information included in their application forms may, in certain circumstances, be used for a purpose other than that for which it was collected.

Proposed directions:

- Revise the plantations register in order to comply with the provisions of the Privacy Act
- Include in the revised register the information listed above
- Create a Lot and DP search facility
- Include a privacy note on the application form

5.8 Regional Vegetation Schedule

The RVS contained within the Code is designed to provide a higher level of protection for regionally significant vegetation. For listed vegetation communities, the maximum patch size that may be cleared is reduced to 0.5 ha instead of 1 ha.

The intent to protect significant regional vegetation communities is consistent with that being adopted in the NV Act. Under the NV Act, it is not permitted to clear native vegetation that is not in poor condition and is within vegetation types that have had more than 70% of their estimated pre-European distribution cleared.

The RVS was developed initially to cater for regions that had increasing areas of plantations that were not to have Regional Vegetation Management Plans under the NVC Act. This process was then expanded to include the rest of the State where plantations were thought to be commercially viable. It was envisaged that the RVS would eventually undergo further refinement.

The RVS was compiled initially on the basis of vegetation communities that:

- were greater than 85% cleared and had an extant area of less than 10 000 ha, or
- had an extant area of less than 1000 ha

The vegetation types between 70% and 85% cleared are the major difference between the PR Act and the NV Act. In order to achieve consistency, the 70% threshold could be adopted.

Since the commencement of the PR Act some additional studies have been conducted to further refine the types and areas of significant vegetation communities. Any additional vegetation communities defined through these studies will be protected under the NV Act criteria, and it follows that these vegetation communities should be treated similarly under the PR Act.

The present format of the RVS is designed to provide a simple and user-friendly means of identifying regionally significant vegetation communities. Generally, the RVS has been found to

achieve this. In highly cleared landscapes however, further review of the ground cover qualifiers needs to be undertaken to ensure that the RVS is not limiting the potential for conservation of rare vegetation communities.

Given the additional information that is now available on regionally significant vegetation and the differences evident between the PR Act and NV Act processes, it is proposed to review this data in order to determine whether:

- additional vegetation communities need to be placed on the RVS to achieve consistency
- any of the existing vegetation community descriptions require modification.

The process to review the RVS will involve other government agencies and appropriate independent experts.

Proposed direction:

- Review the RVS and add vegetation communities if appropriate

5.9 Subdivision and transfer of ownership of authorised plantations

The PR Act provides that any change in ownership or management of an authorised plantation does not affect an authorisation.

It is, however, unclear whether an authorisation will remain valid where land is subdivided, as the identifiers of the land (Lot and DP numbers) will change. Legal advice indicates that authorisations would continue to apply to subdivided parcels providing they remain under the same ownership or management. However, a problem would arise when subdivided parcels of land are sold and management arrangements change. In this case, assuming that the land is still a plantation, it would be necessary to issue new authorisations in respect of the subdivided parcels.

The PR Act does not require any notification in the case of a subdivision or change of ownership. Further, as plantation authorisations are not registered on the title deed of a property, it makes it difficult to maintain accurate information regarding changes in ownership in the absence of a formal requirement for notification. It would therefore be necessary to develop a mechanism for notification of subdivision and change of ownership.

Proposed direction:

- Require notification of subdivision, and new authorisations where land is subdivided

5.10 Third party accreditation

Third party accreditation would allow applications for plantation authorisation to be assessed and approved by people other than DIPNR staff. The PR Act provides for third party accreditation, in that the Minister's functions under the Act may be delegated to 'any person, or any person of a class, authorised by the regulations'.

When the PR Act was drafted, it was envisaged that a third party accreditation system would be established, and some initial training was provided to industry participants during 2001, with a view to this happening. Feedback from industry indicates that some members are keen to move towards accreditation and self-assessment. It is therefore timely to consider this issue further.

Advantages of using accredited certifiers include a reduction in the assessment role for DIPNR staff, which would allow staff to focus on auditing, reporting and policy functions.

Third party accreditation carries with it a risk that a conflict of interest could arise for consultants or employees of plantation owners. A robust accreditation system, supported by effective auditing of resulting authorisations, would be required to avoid this risk and ensure that standards are maintained.

Establishing a third party accreditation scheme would initially be resource-hungry, in terms of developing competency standards and delivering the necessary training. Depending on the number of authorisations, there might be a need for a high level of DIPNR staff resources for auditing.

A number of problems have been identified in the processes for the certification of development applications under Parts 4A and 4B of the EP&A Act, and the accreditation and certification provisions under the *Contaminated Land Management Act 1997*. Third party accreditation for plantations in Tasmania appears to have worked reasonably well, although the Tasmanian system still requires oversight of individual authorisations by a Forest Practices Board.

On the basis of the experience of third party accreditation systems under other legislation, any system established for plantation authorisation would need to include the following features:

- clear requirements and expectations for accredited persons
- ongoing review of training requirements
- maintenance of current skills for accredited persons, e.g. by having regular professional development requirements
- consistent application of accreditation processes statewide
- regular auditing of the accreditation process and of resulting authorisations
- responsiveness to stakeholder feedback on the processes
- accreditation to be renewed at regular intervals
- the ability to suspend or revoke the status of accredited persons who are failing to meet standards

The benefits to be gained by introducing third party accreditation need to be considered in the context of the likely level of resources required to establish and support the system, and the current performance of DIPNR staff in processing authorisations.

Options:

- No change
- Introduce third party accreditation for both complying and non-complying plantations (at the same time, or by phased introduction)
- Introduce third party accreditation for complying applications only

6.0 Related issues

These are significant issues relating to plantations that require broader consideration rather than an industry-specific solution, and cannot be resolved within the review process. However, your comments will help DIPNR understand industry and community views, and determine the most appropriate way of tackling these issues.

6.1 Landscape planning

The landscape planning approach is concerned with the broadscale allocation of resources. This might involve determining appropriate areas for plantations establishment based on infrastructure, land availability, location in the catchment and the availability of processing facilities. However, there would still be a need for assessment and authorisation of individual plantations.

Currently, plantations can be established on any essentially cleared land zoned for agriculture. In the south-east of the State concerns have recently been expressed regarding the location of plantations in the landscape, competition for land, and associated issues including water use and fire protection. In response to these concerns the Government is developing a regional landscape plan for the Monaro region. Some industry members also favour a landscape approach to plantation establishment rather than the current property-based approach.

The PR Act does not provide for the development of strategic landscape plans for plantations. It focuses on the assessment and authorisation of individual plantation proposals and the regulation of plantations once they are authorised.

An advantage of the current property-based approach is the certainty provided to applicants if they comply with the Code, regardless of where their proposed plantation is situated in the landscape. Any change to this approach would represent an interference with the operation of market forces in respect of land values, which could have adverse effects on the level of plantation investment.

Outcomes of introducing a landscape planning approach could include:

- consistency with the standards and targets contained in catchment action plans
- a reduction in the footprint of plantations across the landscape, by concentrating plantations in designated areas
- a change to the requirement that plantations can be established only on land that is essentially cleared, which would represent a fundamental change to one of the policy objectives of the PR Act
- the development of a mechanism for linking the individual authorisation assessment and the landscape planning requirements

The question, however, is whether it is appropriate to seek to provide for landscape planning for plantations by including provisions in the PR Act, or whether this should be achieved by other means.

DIPNR's view is that the role of the PR Act is to regulate individual access to land, while the planning for the allocation of land resources should be directed by policies and strategies and implemented through the planning provisions of the EP&A Act. The EP&A Act provides for the creation of environmental planning instruments, including State Environmental Planning Policies (SEPPs).

The Government has recently announced a new State Strategic Planning Framework, which will see a shift in emphasis to sector strategies and SEPPs for priority industries. The framework also provides for regional strategies that will identify constraints and opportunities in economic development, infrastructure and natural resource management. The sector strategies will inform the regional planning approach. It could be appropriate to consider using the Monaro landscape plan as a pilot for an industry-based regional strategy.

DIPNR believes that if a landscape planning approach for plantations is to be considered, this should be in the context of the new State Strategic Planning Framework, rather than using the PR Act. Therefore, DIPNR is not proposing any provisions for landscape planning as part of the review process.

6.2 Transport infrastructure

The need to provide for road infrastructure to support an expanding plantation sector was recognised when the PR Act was developed. It was envisaged that owners of plantations authorised under the PR Act would participate in a contribution scheme to support the maintenance of roads and bridges. Regional transport infrastructure committees were established to develop contribution plans and administer the funds raised according to regional priorities. The aim was for a regional equivalent to the EP&A Act section 94 contributions, providing a balance between the development and its impact at local level within a regional framework.

The mechanisms established in the PR Act have so far failed to produce a workable contribution scheme. The main reasons for this include:

- no objective basis for determining a levy
- differentiation between private land tenures and public forests

- existing arrangements between Forests NSW (formerly State Forests) and local councils for the maintenance of essential roads
- differences in views on how infrastructure needs should be funded
- the focus on a levy rather than on the overall planning framework

The approach did not allow a levy to be applied to plantations established prior to the PR Act, which represent more than 90% of the current plantation estate. Further, even if a contribution scheme had been developed and approved within this framework, the monies raised:

- would not be available to local councils for many years
- depending on the location of new developments with respect to existing plantations, may provide only a small percentage of existing and projected infrastructure needs

Plantation developments in other states are not levied for road infrastructure. Some investors see an undetermined levy as a disincentive for investment in new plantations in NSW.

It is universally acknowledged that funds need to be allocated for road infrastructure across a range of industry sectors. The issue is who should pay. An industry-specific approach applicable only to new plantation developments may not lead to an effective outcome. Over the longer term the National Transport Commission (NTC) supports a pricing system whereby all heavy vehicle road users would pay according to actual road usage (NTC 2004). However, there are a number of major political, institutional and technological impediments to this in the medium term.

Under a full user-pays system, funds collected would be directed back to the relevant road managers. A number of options have been considered, including the establishment of an infrastructure fund to be distributed to local councils according to priorities established by regional committees. The user-pays principle and equity issues remain the focus of these approaches.

The NSW Government is developing a number of industry strategies, including the Forestry and Timber Processing Industry Strategy. These strategies will provide an opportunity to examine infrastructure needs across a number of industry sectors with a view to establishing a holistic and equitable approach.

It may therefore be necessary to abandon the industry-focused approach to funding in the PR Act, and to develop a transport-focused approach based on the principles of equity and user-pays and on the infrastructure needs of different industry sectors. The review of the PR Act is not the appropriate process in which to develop such a new approach.

6.3 Water interception

Within NSW, the plantation estate has increased from 318 898 ha in 2000 to 331 228 ha in 2003, a 4% increase (Wood *et al.* 2001, Parson *et al.* 2004). In some localities, the rate of plantation expansion on agricultural land is causing community concern about the possible impact on water availability and the environment. Recent Government initiatives to reform water allocation arrangements and environmental flow allocations have highlighted the potential for conflict between the benefits of plantations and their potential to reduce stream flow and groundwater (Keenan *et al.* 2004a).

In NSW, there are currently no regulatory controls on water use for plantations. The PR Act and Code contain provisions for soil, water quality and biodiversity protection, but do not include controls on plantation water use (i.e. water quantity).

It is generally accepted that plantation forests intercept and use more rainfall than many agricultural land uses based on annual crops and pastures. A change of land use to plantation forest can reduce the surface water yield from catchments, leading to reduced stream flow and the creation of changes and pressures on water-dependent ecosystems and other water users.

Studies have shown, however, that it is difficult to detect a significant effect on stream flow in catchments smaller than 1000 ha where less than 20% is planted and where rainfall is uniform across the catchment (Keenan *et al.* 2004a). Furthermore, Keenan *et al.* (2004a) have found that plantations contribute positively to regional economies and can provide environmental benefits. With appropriate location in the catchment, and plantation planning and management, plantations can be a viable and positive part of the rural economy with minimal impacts on stream flow.

Plantation water impacts should not be examined in isolation from other agricultural land uses. Agriculture is the largest user of land and water in Australia, and in 1996–1997 used some 15 500 gigalitres of water, 70% of total water usage (ABS 2003).

In August 2003, the Council of Australian Governments agreed to develop a National Water Initiative to improve the security of water access entitlements, protect ecosystem health and ensure that over-allocated water systems are returned to sustainable levels, with substantial progress to be achieved by 2010.

NSW is committed to the outcomes of the National Water Initiative. The agreement recognises that a number of land use change activities have the potential to intercept significant volumes of surface or ground water. The impact of these activities needs to be addressed at the development assessment stage. Large-scale plantation forestry, farm dams and bores, and intercepting and storing of overland flows fall into this category. The agreement does not define large-scale plantation forestry.

The agreement outlines rules for water interception. For water systems that are fully allocated, over-allocated or approaching full allocation, all interception activities that are assessed as being significant should be recorded, and any proposals for additional interception activities above an agreed threshold will require a water access entitlement. For water systems that are not yet fully allocated or approaching full allocation, significant interception activities must be identified, and estimates of likely interception must be made over the life of the relevant water plan. A threshold level will also be calculated that allows for a certain level of interception without requiring a water access entitlement across the entire water system covered by the plan.

NSW has agreed to implement water interception measures on a priority basis in accordance with water plans no later than 2011.

The implementation of water interception measures is dependent on further research being undertaken to determine all significant water requirements, including those of plantations. Research should focus on long-term monitoring of stream flows at various scales, and on comparative studies of water use and impact on runoff and stream flow of different land uses and land covers.

The issue of water interception is broader than the scope of the PR Act and Code, as it affects sectors other than plantations. If, following appropriate scientific evaluation, water interception is identified as a major concern in catchment hydrology, measures to manage the impact of plantation developments could be introduced in a number of ways, including:

- through the *Water Management Act 2000*, which would require legal amendment
- using the strategic landscape planning approach, which would be reliant on improved knowledge of water requirements in catchments

7.0 Submissions

7.1 How to make a submission

Submissions must be made on the submission form that accompanies the discussion paper, and may be submitted by mail, email or via the DIPNR website.

Submissions must identify the person or enterprise making the submission. Anonymous submissions cannot be accepted. Comments should be clear and concise.

Please record your comments and suggestions in the spaces provided. You do not have to comment on every issue in the discussion paper - you can comment on as many or as few as you like. You can also comment on issues not raised in the discussion paper, in the space provided at the end of the form.

Please note that multiple copies of submissions in the style of form letters will be considered as one submission.

The closing date for submissions is Monday 1 August 2005.

7.2 How to obtain a copy of the submission form

Additional copies of the submission form are available from the DIPNR Information Centre (tel:1300 305 695) or from Regional DIPNR offices. The form can also be downloaded from DIPNR's website at www.dipnr.nsw.gov.au. Go to What's New.

7.3 How to submit your form

By mail

Submissions by mail should be sent to:

The Convenor, PR Act Review

DIPNR

PO Box 123

WELLINGTON NSW 2820

By email

Email submissions using a Word template of the submission form should be sent to:

treenet@dipnr.nsw.gov.au

Via the DIPNR website

Visit www.dipnr.nsw.gov.au and go to What's New to access the on-line submission form.

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