



2013-14  
*stewardship report*





*Eucalyptus nitens* plantation, Sideling Range, north east Tasmania.

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Front cover: Senior Forest Officer Gareth Tempest at a *Eucalyptus nitens* plantation on the Sideling Range, near Scottsdale in north east Tasmania. Forestry Tasmania established the plantation in 1989, and it has been pruned and thinned so that it will produce high-quality sawlogs. This area will be harvested within the next 10 years and replanted.

The appendices to this report may be accessed by clicking below.

**Appendix 1**

Financial Statements

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/financial\\_statements\\_2014.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/financial_statements_2014.pdf)

**Appendix 2**

Sustainable Forest Management – data tables

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/sustainable\\_forest\\_management\\_appendix\\_2014.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/sustainable_forest_management_appendix_2014.pdf)

**Appendix 3**

Research and Development Branch Annual Report

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/rd\\_annual\\_report\\_2014.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/rd_annual_report_2014.pdf)

# report card 2013/14

## Sustaining biodiversity and habitat

- ✓ In accordance with revised legislative requirements, we assisted in the transfer of management control for about 300,000 hectares of former State forest to the Department of Primary Industries, Parks, Water and Environment.
- ✓ Our operations, and our Three Year Plan, met our ecological targets for native forest retained in long-term retention, and for dispersed harvesting as prescribed by our newly deployed Landscape Context Planning system.
- We made significant progress on a High Conservation Value assessment, issuing a consultation draft for public comment in May 2014.
- ✓ We identified and protected an additional seven giant trees. Most of these were found using our innovative LiDAR technology.

## Sustaining jobs for current and future generations

- ✗ We incurred a loss (after tax) of \$43.1 million, which included \$41.5 million in significant non-cash items comprising forest valuation adjustments, de-recognition of deferred tax assets, and increases in liability and interest costs associated with the defined benefits superannuation scheme.
- The State Government provided significant funding to assist us in meeting our financial obligations.
- ✓ We made a significant economic and social contribution through the payment of \$125 million to 1,346 companies for goods and services. This included payments of \$110 million to 1,062 Tasmanian companies, many of which were in regional areas. We also paid \$22 million in salaries.

- ✓ We produced 1.39 million tonnes of forest products, supplying 28 customers. The gross value of processed wood products when sold by these customers was estimated to be \$211 million.

— Despite the challenges facing the Tasmanian forest industry, we met most contracted customer commitments.

- ✓ We published our five-yearly sustainable yield calculation, confirming our ability to make available at least 137,000 cubic metres per year of high-quality eucalypt sawlogs.

- ✓ We significantly reduced transport costs associated with operations in the north west of the State by commencing our own woodchip export operations at the Port of Burnie.

- ✓ Our industry partner, Oak Industries, secured a grant to establish a Hardlam manufacturing plant in southern Tasmania.

- ✓ 97 per cent of the 7,414 hectares of regenerated native forest that reached reporting age met at least the minimum prescribed standard.

- ✓ 73 per cent of the 2,834 hectares of artificially sown regenerated native forest met our seed provenance quality standard. Only one per cent of the 2,680 kilograms of seed sown was from non-preferred sources.

- ✗ 83 per cent of artificially sown regenerated native forest was sown within 21 days of site preparation. This was significantly below our five-year average of 91 per cent.

- ✓ The average amount of useable timber (merchantable residues) left after harvesting more than halved compared with 2012/13, reducing below our target levels for the first time in three years.

- ✓ We pruned 3,796 hectares of our plantation estate, with 88 per cent of this area meeting our quality standard benchmark.

- ✗ We thinned 2,200 hectares of plantation. However, only 68 per cent of the area assessed met the quality standard. This was due to retained stem damage and stocking issues.

## Sustaining carbon stores, clean air, water and healthy forests

- ✓ We remodelled our standing tree carbon stocks, concluding that reductions in stored carbon associated with harvesting are offset by growth in the forest as a whole. Under our current management regime, we predict that in 2050 our forests will contain more carbon than today.

- ✓ We reduced fossil fuel carbon emissions from electricity use and our internal vehicle fleet by 26 per cent compared with 2012/2013. We also used 250,000 litres less fuel than in the previous financial year.

- ✓ About 80,000 tonnes of logs were transported from Brighton to Bell Bay by rail, taking the equivalent of 2,500 truck movements off the Midland Highway.

- ✓ We conducted 177 planned regeneration and fuel reduction burns, which covered 9,720 hectares.

### Sustaining carbon stores, clean air, water and healthy forests (cont.)

- Only one of 45 indicative air quality exceedances recorded by the Environmental Protection Authority during the planned burn season was partially attributable to us. The Environmental Protection Authority only recorded 11 smoke complaints for the year, six of which were at least partially attributable to our burns.
- ✓ We significantly decreased our chemical use compared with last year. The decrease was associated with a small plantation re-establishment program and low pest insect populations detected during monitoring.
- ✓ All of the chemical application operations that we were required to model using the CSIRO-developed Pesticides Impact Rating Index were modelled as posing low or very low environmental risks.
- ✓ No chemicals were detected in stream water samples from the nine chemical application operations that we sampled.
- ✗ We had one chemical overspray event for the year, whereby a non-target plantation was treated for leaf beetles. No environmental damage occurred as a result of the operation.
- ✗ We had one minor hydrocarbon spill involving 200 litres of gelled petrol. The spill was managed on site and caused no significant environmental damage.
- ✓ Staff spent 12,682 hours firefighting. This included a significant contribution to the October 2013 Blue Mountains bushfire campaign in New South Wales.

### Sustaining safety, community access and heritage

- ✓ We maintained our staff's strong culture of safety, with all nine performance targets being met. Staff had only three lost time injuries, translating to 5.1 lost time injuries per million hours worked.
- ✗ Our harvest and haulage contractors recorded 10 lost time injuries for the year, resulting in 14.3 lost time injuries per million hours worked exceeding our target of < 9.
- ✗ We were issued one improvement notice and one prohibition notice under the *Workplace Health and Safety Act 2012*, both of which related to one of our mechanical workshops.
- ✓ We had almost 70,000 visitors to the Tahune AirWalk.
- ✓ We maintained 553 access agreements for appropriate third party use of Permanent Timber Production Zone land and conducted 74 assessments to check that proposed third party activities were appropriate.
- ✓ We significantly improved our stakeholder engagement processes, developing a stakeholder engagement strategy that will be fully implemented in 2014/15.
- ✓ We adopted stakeholder engagement software to help ensure that issues raised by stakeholders were managed appropriately. From October 2013, we recorded 799 stakeholder interactions involving 1,670 individuals.
- ✓ We launched an online interactive map viewer, enabling stakeholders to access spatial information about the land Forestry Tasmania manages, as well as our planned forest operations.

### Sustaining science-based stewardship

- ✓ We maintained our certification to AS 4801 (Occupational Health and Safety), AS 4708 (Australian Forestry Standard) and ISO 14001 (Environmental Management System). The regular surveillance audit did not identify any non-conformances.
- ✓ We made significant progress towards applying for Forest Stewardship Council certification, with our certifying body conducting a pre-assessment in April 2014.
- ✓ We progressed the development of our new Forest Management Plan, issuing a consultation draft for stakeholder comment in March 2014.
- ✓ Our research staff authored 17 technical reports and 14 peer-reviewed papers, contributed two book chapters, delivered 12 conference presentations, maintained the Warra Long-Term Ecological Research site and led six field days.
- We reduced our staff head count by 16 per cent, from 351 to 295, to better align with our increased commercial focus and reflecting the transfer of some land management responsibilities to the Department of Primary Industries, Parks, Water and Environment.
- ✓ Audits of our operations by the Forest Practices Authority continued to show that our forest practices planning and operations rated 'above sound' on all eleven criteria examined.
- ✗ We received a \$500 fine from the Forest Practices Authority for thinning a small section of plantation outside the certified forest practices plan.
- ✗ Our staff issued two Section 41 notices under the *Forest Practices Act 1985*, relating to environmental breaches by our harvesting contractors.
- ✓ Our Registered Training Organisation issued 69 nationally recognised qualifications.

# the year AT A GLANCE

## Year at a glance 2014

	2011/12	2012/13	2013/14
<b>Forest estate ('000 hectares) at 30 June</b>			
Permanent Timber Production Zone (PTPZ) land <sup>1</sup>	1,490	1,490	1,172
Land available for wood production <sup>1</sup>	658	489	485
Plantation Estate <sup>2</sup>	108	109	111
Softwood plantation	52	53	53
Hardwood plantation	55	56	58
Managed for reservation <sup>1,3,6</sup>	512	798	482
<b>Native forest area harvested ('000 hectares) <sup>2,4,5</sup></b>			
Native forest (clearfell, selective harvesting and thinning) <sup>5</sup>	2.6	4.2	3.9
Plantation (clearfell and thinning) <sup>2,5</sup>	1.4	1.4	2.4
<b>Forest areas re-established ('000 hectares) <sup>2,4</sup></b>			
Native forest treated for regeneration	4.4	3.5	4.8
Plantation hardwood established <sup>2</sup>	0.9	0.4	0.2
Plantation softwood established <sup>2</sup>	1.1	0.9	0.4
<b>Wood production</b>			
Total production (m <sup>3</sup> and tonnes)	1,383,775	1,059,673	1,386,010
High quality sawlog (m <sup>3</sup> )	109,946	120,932	128,259
Native forest Sawlog Cat. 2 & 8 (m <sup>3</sup> )	42,011	37,531	39,936
Native forest Posts & poles (m <sup>3</sup> )	4,339	2,302	4,584
Native forest high grade domestic peeler (m <sup>3</sup> )	372,466	142,722	163,147
Native forest low grade export peeler (tonnes)	157,321	89,156	17,470
Native forest pulpwood (tonnes)	315,037	363,409	643,175
Hardwood plantation pulpwood (tonnes)	61,303	144,106	261,874
Softwoods (sawlog and pulpwood) (tonnes)	292,091	119,414	96,356
Special species and craftwood (m <sup>3</sup> )	12,953	10,712	9,199
<b>Fire management services</b>			
Number of fires attended	51	55	34
Area of State forest burnt (hectares)	447	19,127	2,911
Cost of suppression (current values \$'000)	304	5,100	2,988
<b>Roads</b>			
New road construction (km)	55.8	65.1	92.9
Major road upgrades or realignments (km)	3.1	1.6	-
Road maintained/resheeted km	684	2,494	1,830
<b>Finance (\$'000) <sup>7</sup></b>			
Total revenue	112,669	168,836	157,173
Total expenses	(214,152)	(200,107)	(185,245)
<b>Profit (loss) after tax</b>	<b>(70,929)</b>	<b>(14,190)</b>	<b>(43,118)</b>

	2011/12	2012/13	2013/14
<b>Employment</b>			
Number of staff (head count)	383	351	295
Number of staff (full time equivalents: FTE)	349	326	252
Payments to Tasmanian businesses (\$ Million)	98	129.5	110.38
Tasmanian businesses paid	1,268	1,216	1,062
Lost Time Injury frequency rate	5.68	4.46	5.1
Wood production per FTE (tonnes)	7,393	3,152	4,921
Profit (loss) per FTE (\$,000)	(203)	(44)	(171)
Total revenue per FTE (\$,000)	323	518	624

### Notes:

1. Permanent Timber Production Zone land as defined under the *Forest Management Act, 2013*. This includes approximately 400,000 hectares of Future Reserve land (see Land Use chart opposite). (2011–13 figures are for State forest).
2. Plantation figures may include plantations over which FT has no management control. Excludes plantations harvested but not yet replanted.
3. PTPZ land managed by Forestry Tasmania for conservation values as part of the Tasmanian CAR reserve system (Informal reserves).
4. 2013/14 figures are for operations that were completed during the 2013/14 financial year.
5. Thinning includes both commercial and non-commercial thinning.
6. During 2013, Forest Reserves were legislated to become other Nature Conservation Reserves, and State forest tenure was revoked over these reserves.
7. Change in presentation of accounts in 2012/13 and 2013/14.



# OUR ORGANISATION

As at 30 June 2014, Forestry Tasmania managed 1.172 million hectares of which about 0.4 million hectares was Future Reserve Land intended for transfer to another land manager. Hence the area of land under Forestry Tasmania's long-term management control is about 0.8 million hectares, of which only about 41 per cent is available for actual wood production, with the remainder set aside in informal reserves or other non-production areas.

At 30 June 2014, we employed 295 staff and engaged a significant number of contractors, through our Head Office in Hobart and four district offices around the State.

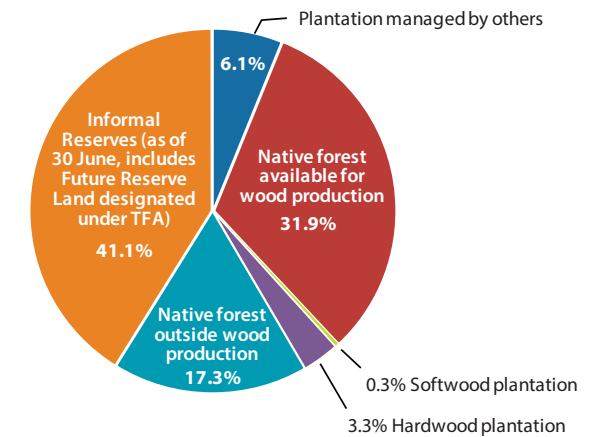
In 2013/14, 1.39 million tonnes of products such as sawlog, peeler log and pulpwood were harvested from the Permanent Timber Protection Zone land for processing

into sawn timber, rotary peeled veneer, and pulp and paper products. The estimated final value to the Tasmanian economy of wood products produced from Tasmanian timber was \$211 million.

On 6 November 2013, the *Forest Management Act 2013* received Royal Assent, repealing and replacing the *Forestry Act 1920*. Under this new Act, Forestry Tasmania has management control of all Permanent Timber Production Zone land and undertakes forest operations on this land for the purpose of selling forest products. The Act also confirmed the high-quality sawlog supply volume of at least 137,000 cubic metres per year that was established by the *Tasmanian Forests Agreement Act 2013*, and transferred formal management responsibility for approximately 220,000 hectares of formal forest reserves to the Tasmanian Parks and

Wildlife Service. In addition, approximately 80,000 hectares of unreserved State forest was made into reserves under the Nature Conservation Act to reflect its inclusion in the 2013 Tasmanian Wilderness World Heritage Area extension.

## Land use on Permanent Timber Production Zone land



# OUR PURPOSE

## Our vision

Forestry Tasmania will be a trusted source of certified timber and other forest products for this and future generations.

## Our mission

Forestry Tasmania is professional, consultative and innovative in responsibly managing Tasmania's public production forests for the benefit of current and future generations, and in providing the foundation for a strong, competitive and sustainable Tasmanian forestry industry.

## Our values

- We care for people and their environment
- We get things done
- We do what we say we will do
- We are proud of who we are and what we do
- We think before we act

## Our sustainability objectives

- Sustaining biodiversity and habitat
- Sustaining jobs for current and future generations
- Sustaining carbon stores, clean air, water and healthy forests
- Sustaining safety, community access and heritage
- Sustaining science-based stewardship

\*These objectives are presently under review. Revised objectives will be published in Forestry Tasmania's new Forest Management Plan, which is scheduled for release in November 2014.

# Business OVERVIEW

Forestry Tasmania is a Tasmanian Government Business Enterprise responsible for sustainably managing approximately 800,000 hectares of public production forest (Permanent Timber Production Zone land) for the benefit of current and future generations; for undertaking forest operations for the production and sale of forest products from these forests (including at least 137,000 cubic metres of high-quality sawlogs per annum); and for providing the foundation for a strong, competitive and sustainable Tasmanian forest industry.

Forestry Tasmania's key activities include:

- Native forest and plantation harvesting and re-establishment
- Sale of high-quality sawlogs, peeler billets, specialty timbers and log residues to domestic and/or international customers
- Land and native forest management (including research, forest inventory, resource mapping and modelling)
- Plantation establishment and management
- Firefighting and fuel reduction burning
- Road construction and maintenance
- Industry and market development
- Forest tourism

Forestry Tasmania also provides professional and technical services to other landowners and forest managers in Australia and overseas.

Forestry Tasmania sustainably manages Tasmania's public production forests while maximising the commercial recovery, utilisation and value of harvested wood. Forestry Tasmania manages these forests to maintain or enhance significant natural, cultural and economic values, informed by science and in accordance with accredited third-party certification and relevant legislation. Forestry Tasmania aims to be a trusted source of certified timber and other forest products for this and future generations.

In accordance with its Ministered Charter, Forestry Tasmania also performs a range of non-commercial and community service activities. These include contributing to statewide fuel reduction burning and fire management, maintaining roads for public access and firefighting, forest education and research activities, agreed recreation and tourism activities, and non-commercial harvesting and management of special species timbers.

Please refer to the financial statements in Appendix 1 for the organisation's Statement of Corporate Intent, which is a legislative requirement for Tasmanian Government Business Enterprises.





# corporate GOVERNANCE

The Board of Directors of Forestry Tasmania comprises six independent non-executive directors. It is responsible for the overall corporate governance of the organisation.

This includes setting strategic direction, overseeing financial performance and business affairs, setting management goals and monitoring management's performance.

As a fully State-owned Government Business Enterprise, the Board of Directors is directly responsible to the Minister for Resources for its operations.

Directors are appointed in accordance with the *Government Business Enterprises Act 1995*. Remuneration fees for non-executive directors are set by Government.

The Board aspires to a high degree of ethical behaviour and accountability and has developed a set of policies and procedures to govern its operations in accordance with these principles.

Monthly reports on Forestry Tasmania's operations and financial performance are supplied to the Board. These are reviewed with senior managers, who also regularly contribute advice on strategic issues to the Board and to the Board's sub-committees that focus on safety, financial and audit matters, major projects, stakeholder engagement and Forest Stewardship Council certification.

The Board visits operating sites and major customers as part of its corporate governance role. The Chairman of the Board

has regular meetings with the Minister for Resources and reports quarterly financial performance to the Treasurer.

## Board of Directors

Robert Annells <sup>PSM</sup>, DipVal, GradDipUP

Geoff Coffey FCPA, ACIS, AGIA, GAICD, DipFP

Robert Smith BscFor (Hons), MSc (ResEcon), PhD, MBA

Ross Bunyon <sup>AM</sup> BComm, Comp. Eng

Christine Mucha BAgSc (Hons), PhD, DipAgEc, FAICD, ComplEng

Robert Woolley BEc, FICA, MAICD

*Secretary to the Board*

Sue Shoobridge BComm FCPA, FAICD

The following is also noted in respect to the Board:

- All the Directors are soundly experienced in corporate law and governance issues.
- The combined skills of the Directors include international, corporate management, stakeholder engagement, marketing, finance and forest management.
- The Directors adhere to the Forestry Tasmania Corporate Governance Policy and Human Resources Policies and Procedures.

The Directors have fully reviewed the set of *Guidelines for Tasmanian Government Businesses* produced by the Department of Treasury and Finance in October 2008, and revisions and updates since that time. They have considered their application to the governance of Forestry Tasmania.

Refer to the financial statements in Appendix 1 for further details on corporate governance.



Forestry Tasmania Board of Directors. L–R Geoff Coffey, Ross Bunyon <sup>AM</sup>, Rob Woolley, Christine Mucha, Bob Annells <sup>PSM</sup>, Bob Smith.

# reporting STRUCTURE AND SCOPE

This *Stewardship Report* provides a summary of Forestry Tasmania's performance against our Sustainability Charter objectives and aims for the 2013/14 year.

Our *Sustainability Charter*, released in November 2008 after three rounds of stakeholder input, provided a 10-year framework for the sustainable management of what was then Tasmania's State forest, and which is now known as Permanent Timber Production Zone land. The *Sustainability Charter* identified a set of economic, environmental and social objectives to guide Forestry Tasmania in Permanent Timber Production Zone land management. These objectives provide the structure for this *Stewardship Report*.

The *Stewardship Report* covers all processes and activities involved in the management of Permanent Timber Production Zone land during the reporting period. This includes forest land management, road establishment and maintenance, plantation and native forest establishment and maintenance, timber harvesting and sales, and tourism and recreation management and development.

The *Year at a glance section* (page 4) provides a quick reference to some of this year's statistics. The *Report card section* (page 2) provides a snapshot of our overall performance, showing the areas where we have been successful in improving our performance and acknowledging those areas where more focus and improvement is required. Also included is a *Where to from here?* section (page 56) that identifies our main priorities for the coming year.

The main *Stewardship Report* provides only a summary of the organisation's financial performance for the year. As a Government Business Enterprise, we are required to provide an extensive set of financial statements annually to the Tasmanian Parliament. These may be found in Appendix 1.

In addition to the statistics and tables provided in the main section of the *Stewardship Report*, we have also provided a set of supplementary tables in Appendix 2. The tables provide the data from which many of the graphs in the main text are compiled. They also provide historical data that allow for benchmarking our present performance. Any corrections to information provided in earlier reports are noted in the footnotes to the relevant tables.

Forestry Tasmania also prepares an annual report on its research and development activities, which is provided in Appendix 3.

The majority of the data used in the *Stewardship Report* have been obtained through internal data sources such as our forest operations database (an in-house asset management system) and through the overlaying of spatial information using our geographical information systems. The remaining data have been obtained from external sources such as the Forest Practices Authority and the Department of Primary Industries, Parks, Water and Environment.

The financial statements, data tables and Research and Development annual report may be viewed via the following links:

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/financial\\_statements\\_2014.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/financial_statements_2014.pdf)

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/sustainable\\_forest\\_management\\_appendix\\_2014.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/sustainable_forest_management_appendix_2014.pdf)

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/rd\\_annual\\_report\\_2014.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/rd_annual_report_2014.pdf)

They may also be downloaded as pdf files from [forestrytas.com.au](http://forestrytas.com.au)

In addition to reporting against the Sustainability Charter, we have again chosen to report against the G3 Global Reporting Initiative sustainability reporting guidelines (v 3.1) (pages 58–60).

These voluntary guidelines are recognised throughout the world. Through the self-assessment process, this report fulfils application level 'C' of the Global Reporting Initiative guidelines. The Global Reporting Initiative content index is available at the end of this report and shows the Global Reporting Initiative indicators against which we have reported, and where relevant information can be found.

Read more about the Global Reporting Initiative at:  
[globalreporting.org](http://globalreporting.org)



# message FROM THE CHAIRMAN AND CHIEF EXECUTIVE OFFICER

The 2013/14 financial year was another very challenging year for Forestry Tasmania, with the continuation of very difficult trading conditions for the business. Significant change also continued in our operating environment as a result of major policy and legislative developments.

While these changes have certainly created some challenges, they have also created opportunities that Forestry Tasmania is determined to embrace.

## Ongoing change

As noted in last year's report, the *Tasmanian Forests Agreement Act 2013* came into force in June 2013 and significantly reduced the area of available public production forest, reclassified it as Permanent Timber Production Zone land, and also significantly reduced the volumes of high quality sawlogs and peeler logs that Forestry Tasmania was required to make available.

These changes were confirmed in the *Forest Management Act 2013*, which came into effect in November 2013 to replace the Forestry Act that dated back to 1920. Most significantly, this new Act also implemented the former Government's response to the URS business review by providing legislative clarity that Forestry Tasmania was to focus on its core commercial functions of sustainably managing the Permanent Timber Production Zone land and producing and selling timber.

The Board and management of Forestry Tasmania support this change as it will allow Forestry Tasmania to concentrate its attention and resources on its core business. Consistent with this approach, the new Act transferred responsibility for ongoing management of about 220,000 hectares of formal forest reserves to the Tasmanian Parks and Wildlife Service.

This change resulted in the transfer of more than 40 staff to the Parks and Wildlife Service. We were sorry to see so many of our colleagues leave and would like to take this opportunity to acknowledge and thank them for their many years of dedicated and professional service to Forestry Tasmania.

The election of a new Government in March 2014 has brought further policy change, including in particular a clear decision not to proceed with the creation of the new reserves envisaged under the *Tasmanian Forests Agreement Act 2013*. However, the new Government has also provided much-needed certainty for Forestry Tasmania by retaining the area of the Permanent Timber Production Zone land under our control, and also retaining the minimum high quality sawlog and peeler volumes that we are required to make available.

## Forest Stewardship Council certification

Importantly, the new Government has also been very clear that it strongly supports Forestry Tasmania efforts to achieve Forest Stewardship Council certification in response to increasing market and consumer demand for Forest Stewardship Council certified wood products. While we have for many years held certification under the Australian Forestry Standard, we recognise it is essential that we continue to respond to the needs of our customers and the expectations of our stakeholders, and have therefore made the attainment of Forest Stewardship Council certification a key corporate priority.

We recognise this is not a simple task. While our systems and processes are underpinned by very good science, and our operations are professionally planned and undertaken, we know that we need to continue to review and refine what we do.

As part of this work, good progress has been made during the year in preparing and releasing for public consultation a draft Forest Management Plan and a draft High Conservation Values Assessment and Management Plan. These are important guiding documents for Forestry Tasmania, so we have been pleased to receive significant stakeholder feedback which will be very useful as we continue to develop and finalise these plans.

# *message* FROM THE CHAIRMAN AND CHIEF EXECUTIVE OFFICER

## **Stakeholder engagement**

Forestry Tasmania recognises that to do our job well we need to engage more actively, transparently and effectively with our stakeholders. We need to do more 'listening' and less 'telling'. We need to better understand the expectations of our customers, neighbours and the wider community, not only so that we can better manage issues of concern, but also to gain valuable insights that will assist in meeting our business objectives.

In addition to undertaking surveys to better understand how our stakeholders view us, we are now actively seeking stakeholder input to inform our planning and decision making. This includes seeking comment on everything from our draft Forest Management Plan to the development of Forest Practices Plans for operations in individual coupes. We have also adopted a new Stakeholder Engagement Strategy to guide and improve this engagement.

We recognise that we will be judged by our actions more than our words and therefore Forestry Tasmania is getting on with implementing these and other changes required by our new operating environment. By necessity, this will be an ongoing journey, not a once-off effort – and therefore we are genuinely committed to a process of continual improvement.

## **Financial results**

Forestry Tasmania is committed to operating efficiently and in accordance with sound commercial practice with the clear intention of achieving a sustainable commercial rate of return. We have therefore continued to focus our efforts on achieving efficiencies, increasing revenue and reducing costs. However, our trading position in 2013/14 continued to be negatively affected by external factors including the high exchange rate and restricted access to critical processing and export sites, including chip mills and port facilities in the south and north west of the state.

Sales of high-quality eucalypt sawlog increased by six per cent and associated native forest pulpwood tonnages were up by more than 43 per cent. Revenue from total forest sales also increased to \$95.8 million from \$56.3 million. \$6.5 million was received for the sale of softwood plantation forestry rights.

Our net result for 2013/14 was a loss after tax of \$43.1 million, after deficit funding from the Government of \$23 million and Tasmanian Forest Agreement implementation funding of \$14.5 million was brought to account. This disappointing result is primarily driven by an \$18.9 million reduction in the valuation of the production forest available to Forestry Tasmania (reflecting the reduced area); a net tax expense of \$13.3 million arising from de-recognition of a deferred tax asset as an expense; and a \$8.2 million increase in superannuation-defined benefit costs.

In light of these significant financial challenges, the Directors have reviewed the appropriateness of continuing to prepare the financial statements on the basis that Forestry Tasmania is a going concern. The Board has resolved that this is appropriate while Forestry Tasmania continues to work with the Government to transition its business model to a more profitable and sustainable footing.

In this regard, the Board wishes to acknowledge the support it has received from the Government, including its confirmation that it will meet its legal obligations as owner of Forestry Tasmania, including financial obligations if required.

The Board also welcomes the Government's statement that it is committed to working with Forestry Tasmania to ensure that the business is sustainable over the longer term. We are pleased that Forestry Tasmania will be part of the steering committee overseeing a new review that has been tasked with producing a clear transition path to a long-term financially sustainable model for the management and commercial operation of Tasmania's public production forests.

**Looking ahead**

Despite its current financial difficulties, Forestry Tasmania continues to have a very important job to do on behalf of all Tasmanians. In addition to professionally and sustainably managing the Permanent Timber Production Zone for the long term for the benefit of current and future generations, Forestry Tasmania continues to provide the essential foundation for the Tasmanian forestry industry.

This includes making available legislatively required volumes of sustainably managed timber to Tasmanian businesses, and working with Government to ensure that appropriate arrangements and facilities are in place to obtain maximum value from harvesting residues. In this regard, we were pleased to work with TasPorts during the year to put in place new arrangements at Burnie to provide access to markets for harvesting and processing residues from the north west of the State.

An important focus for 2014/15 will be to investigate and implement appropriate and cost-effective short- and longer- term arrangements for achieving increased value from the harvesting and sawmill residues generated in the south of the State.

We welcome the new Tasmanian Government’s announcement that it will be working with industry to develop and implement a comprehensive and coherent strategy to guide and secure the long-term future of the Tasmanian forestry industry. Forestry Tasmania looks forward to contributing to this much-needed industry strategy.

**Safety**

On a final but very important note, Forestry Tasmania met all nine of its safety and workers compensation performance measures for its staff for the second year in a row. This is a great achievement as it goes against the usual trends where accident rates can become higher when organisations are going through periods of change. It is also a testament to the quality of our staff, who have continued to do their jobs professionally and safely through challenging times.



Bob Annells  
Chairman



Steve Whiteley  
Chief Executive Officer

## Forest legislation and policy

The 2013/14 year saw several significant shifts in forest legislation and policy.

In June 2013, the *Tasmanian Forests Agreement Act 2013* received Royal Assent. This Act provided legislative backing to the 2012 Tasmanian Forest Agreement between key environmental, community, union and industry groups. Despite concerns about a smaller commercial public forest estate, the lower level of wood supply, and resulting challenges to our short-term commercial viability, Forestry Tasmania accepted the Tasmanian Forest Agreement. In particular, Forestry Tasmania supported the Tasmanian Forest Agreement's vision for a *strong, competitive forest sector based on sustainably managed publicly and privately owned native forests and plantations, profitable production and infrastructure and capable of innovation and investment*.

In November 2013, the *Forest Management Act 2013* received Royal Assent and replaced the *Forestry Act 1920*. The 2013 Act provides that the Forestry Corporation (that is, Forestry Tasmania) is the Forest Manager, with two specific functions:

1. to manage and control all Permanent Timber Production Zone land; and
2. to undertake forest operations on that land for the purpose of selling forest products.

The Act includes a wood production policy that requires Forestry Tasmania to make available a minimum aggregate quantity of high-quality eucalypt sawlogs of 137,000 cubic metres per year. The Act also transferred about 220,000 hectares of forest reserves to the Department of Primary Industries, Parks, Water and Environment.

The Act requires Forestry Tasmania to focus primarily on commercial outcomes, while also contributing to the sustainable management of Tasmania's forest estate. In this regard, all forestry operations must continue to be done in accordance with regulatory requirements,

such as the Forest Practices Code. The Act recognises Forestry Tasmania's commitment to third party certification, which requires us to implement high environmental and stakeholder engagement standards.

Under the *Tasmanian Forests Agreement Act 2013* and the *Forest Management Act 2013* the area of land managed by Forestry Tasmania over the long term reduced from 1.5 million hectares in July 2013 to approximately 0.8 million hectares (excluding Future Reserve Land). Management of all formal reserves on public land transferred to the Department of Primary Industries, Parks, Water and Environment.

In December 2013, the first tranche of new reserves specified in the *Tasmanian Forests Agreement Act 2013*, amounting to 95,000 hectares, was proclaimed under the *Nature Conservation Act 2002*. These reserves were primarily within the 2013 addition to the Tasmanian Wilderness World Heritage Area.

In March 2014, a new Tasmanian Government was elected on a policy platform that included the repeal of the *Tasmanian Forests Agreement Act 2013*. In accordance with this policy, in May 2014 it introduced the Forestry (Rebuilding the Forest Industry) Bill 2014, which was passed by Parliament in September 2014.

The key elements of the legislation of most relevance to Forestry Tasmania are as follows:

- the legislated minimum annual quantity of high quality sawlogs and veneer logs that Forestry Tasmania is required to make available remains at 137,000 cubic metres;
- the area of public production forest available for harvesting by Forestry Tasmania (the Permanent Timber Production Zone land) will remain at about 800,000 hectares for at least the next six years;
- 370,000 hectares of land that was previously designated as Future Reserve Land on Permanent Timber Production Zone land will now be designated as Future Potential Production Forest land;

- Future Potential Production Forest land will now be administered by the Crown Lands Minister and therefore Forestry Tasmania will cease to have management responsibility for this land;
- with the exception of a small number of previously agreed transitional coupes, Forestry Tasmania is not permitted to undertake any harvesting on Future Potential Production Forest land, including for special species timber, while the land remains as Future Potential Production Forest land;
- any harvesting of special species timbers on Future Potential Production Forest land would need to be done by other organisations – and this harvesting could only occur at least three years after the legislation comes into force, and only if the required wood cannot be supplied at that time from the Permanent Timber Production Zone land;
- after April 2020, areas of Future Potential Production Forest land could potentially be converted to Permanent Timber Production Zone land to enable native forest harvesting, subject to the approval of Parliament – but harvesting could not occur unless it was in accordance with the forest management certification that Forestry Tasmania holds at that time; and
- while there is a possibility that areas of Future Potential Production Forest land could be exchanged for areas of Permanent Timber Production Zone land prior to this time, subject to approval of Parliament, the circumstances in which this could potentially occur have not yet been determined.

The Board carefully reviewed these and other provisions in the legislation and was satisfied that future actions taken in accordance with the legislation should not result in destruction of high conservation values and should also not impede Forestry Tasmania's efforts to achieve and retain Forest Stewardship Council certification. On this basis, the Board supported the legislation.

# sustaining BIODIVERSITY AND HABITAT



The brown goshawk, one of many species that rely on Tasmania's forest habitats.

Land managed by Forestry Tasmania forms an important component of Tasmania's reserve system, and managing biodiversity remains a key part of our role. We ensure that old growth forest, rare and threatened vegetation communities, habitats and threatened species are maintained both inside and outside reserves.

Science informs us that not all values can be represented in any one part of the forest estate at a particular time. Our aim, therefore, is to ensure that these values are maintained across the landscape and across various age classes of forest.

## Reserve system

The 1997 Regional Forest Agreement established the Comprehensive, Adequate and Representative reserve system to:

- include the full range of vegetation communities;
- ensure the level of reservation is large enough to maintain species diversity, as well as community interaction and evolution; and
- conserve the diversity within each vegetation community, including genetic diversity.

Comprehensive, Adequate and Representative reserves provide security for species that might otherwise be disadvantaged by production forestry. They provide continuity of habitat and, for many plants and animals, re-colonisation sources. In this sense, Comprehensive, Adequate and Representative reserves have ecological 'influence' over the surrounding production forest, with the level of influence proportional to the distance from the reserve to the production forest.

2013/14 saw the transfer of approximately 300,000 hectares of former State forest, the majority of which were forest reserves, to the Department of Primary Industries, Parks, Water and Environment. These areas either remain or have been added to the State's Comprehensive, Adequate and Representative reserve system.

Of the remaining Permanent Timber Production Zone land, nearly 41 per cent (482,000 hectares) is part of the Comprehensive, Adequate and Representative Reserve system. At 30 June 2014, the Permanent Timber Production Zone included approximately 400,000 hectares of land identified for reservation under the *Tasmanian Forests Agreement Act 2013*. It is expected that much of this land will not be managed by Forestry Tasmania over the long term, and as such, it is expected that Forestry Tasmania's contribution to the Comprehensive, Adequate and Representative reserve system will reduce.

With the transfer of Forestry Tasmania's original legislated forest reserves to the Department of Primary Industries, Parks, Water and Environment, the majority of Forestry Tasmania's contribution to the Comprehensive, Adequate and Representative reserves is now delivered through informal reserves. While informal reserves are used to maintain Comprehensive, Adequate and Representative values, their physical configuration may be adjusted to meet forest management requirements, provided the overall level of protection is maintained. Eleven adjustments were made to the Comprehensive, Adequate and Representative reserve system on Permanent Timber Production Zone land in 2014.

# *sustaining* BIODIVERSITY AND HABITAT

In addition to informal Comprehensive, Adequate and Representative reserves, there are substantial areas of Permanent Timber Production Zone land that are either not available for wood production, or which will never be harvested due to various constraints. Although not formally recognised in the Comprehensive, Adequate and Representative reserve system, these non-production areas make a significant contribution to maintaining environmental values on Permanent Timber Production Zone land. We presently manage 205,000 hectares of non-production area. Although it is possible that these areas could be used for wood production in the future, the majority is likely to remain unharvested.

Together, the Comprehensive, Adequate and Representative reserve system and non-production areas account for 58 per cent of Permanent Timber Production Zone land.

## **Biodiversity**

One of our key stewardship roles is to sustain biodiversity across Tasmania's public production forests. We do this in the context of current policy settings and by continuously improving our forest planning and practices.

Forestry Tasmania manages biodiversity by maintaining our contribution to Tasmania's Comprehensive, Adequate and Representative reserve network, and managing wood production areas in accordance with the Forest Practices Code and our conservation planning systems.

The Forest Practices Code provides for biodiversity conservation through detailed planning requirements, for example, riparian buffers for stream protection and habitat retention.

We also continue to implement forest management strategies that sustain biodiversity, such as using fire as a forest regeneration tool, employing variable retention silviculture in many wet eucalypt coupes, and applying our Landscape Context Planning system.

## **Landscape Context Planning**

Forestry Tasmania has continued to progress and develop the Landscape Context Planning System, its new approach to managing biodiversity values in native forests during clearfall or aggregated retention harvesting operations.

The Landscape Context Planning system sets two main objectives for public forest in a one-kilometre radius around the centre of any clearfell or aggregated retention coupe:

- at least 20 per cent of native forest be retained for the long term (long-term retention target); and
- less than 50 per cent of native forest is younger than five years of age (dispersal target).

Forestry Tasmania presently aims to meet these targets for at least 90 per cent of the coupes that are subject to the landscape context system.

Forestry Tasmania has developed a set of analytical tools to assist planners in adjusting the location and extent of harvest operations in order to meet these objectives.



One of Forestry Tasmania's key roles is to sustain biodiversity in production forests. We achieve this through the reserve system, the Forest Practices Code, and through our own planning systems.



When combined with the existing Comprehensive, Adequate and Representative reserve system, and implemented on all relevant coupes in the managed landscape, the system should provide sufficient habitat for species to persist, and to recolonise areas after harvest disturbance.

2013/14 was the first year for which we were able to report on the outcomes of implementation of the Landscape Context Planning System.

Of the 65 coupes harvested in the year, 90 per cent met or exceeded the long-term retention target and 100 per cent met the dispersal target. We therefore met our Landscape Context Planning System targets. The median amount of forest retained for the long term in the one-kilometre radius around harvested coupes in 2013/14 was 28 per cent.

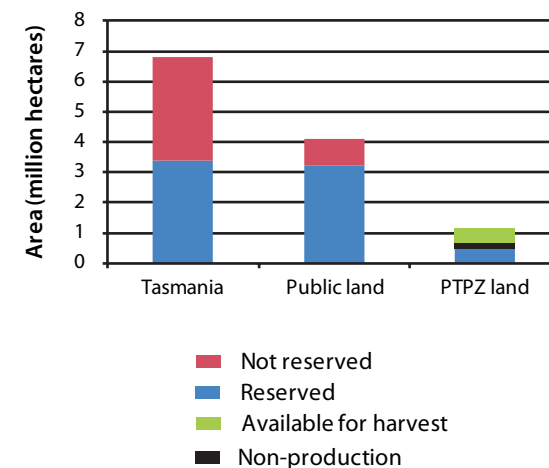
The system also predicts that our harvesting program planned for the 2014/15 financial year will also meet our retention and dispersal targets.

We are continuing to develop, refine and improve the Landscape Context Planning System, with the aim of streamlining and fully integrating it into our planning processes.

### Threatened species, communities and habitats

Tasmania’s flora and fauna is highly endemic, and the State is free from some of the threatening processes present on mainland Australia. Tasmania has 135 listed forest-dwelling threatened animals, ranging from tiny freshwater snails, to the majestic Tasmanian wedge-tailed eagle, Australia’s largest raptor. Tasmania also has 310 threatened terrestrial plant species, 15 threatened forest communities, three threatened ecological communities, and 17 threatened non-forest communities. Our trained forest planners and Forest Practices Officers develop detailed, coupe-specific plans that include the identification of areas with threatened species values. These areas are either excluded from harvesting or have special prescriptions applied that aim to retain the identified habitat values for the long term. In 2013/14, a total of 40,000 hectares of native forest outside reserves was designated as biodiversity special management zones under our Management Decision Classification zoning system. This area includes threatened forest communities, and specific flora and fauna values that require special management considerations.

Summary of Tasmanian reserve system



# *sustaining* BIODIVERSITY AND HABITAT

## **Wedge-tailed eagle protection measures research**

A forest industry-sponsored research project undertaken during 2013/14 gathered information that can be used to assess the effectiveness of forest management prescriptions designed to protect one of Tasmania's most majestic species, the wedge-tailed eagle.

The Tasmanian wedge-tailed eagle is a threatened species that is sensitive to human disturbance during the breeding season. Intrusions into breeding areas can cause adult birds to fly away from nests (a behaviour known as flushing), which leaves eggs and chicks vulnerable to predation and the elements.

Consequently, the forest industry has implemented measures to protect eagle nests and reduce the detrimental effects of human disturbance on breeding success.

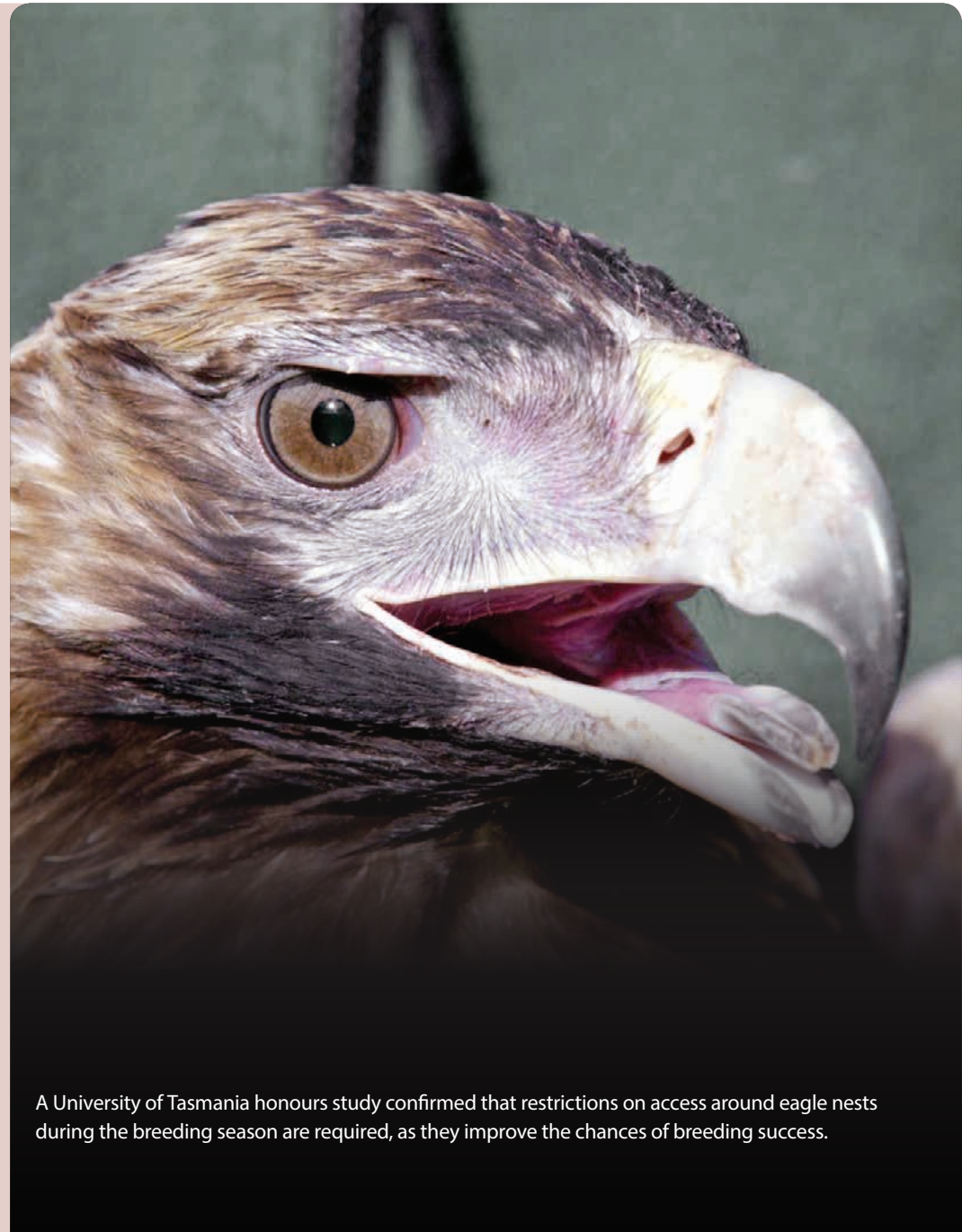
Tierney O'Sullivan, a University of Tasmania student, aimed to evaluate the effectiveness of these measures as part of her Honours research.

Tierney used historical data to determine if the timing of the breeding season, and breeding success, were influenced by climate, prey availability or road density. She found that breeding seasons tended to be later following colder winters or wet springs. Breeding success was also lower following wetter springs, and where nest density was high. However, the probability of any one nest being used decreased with increasing nest density, and it was unclear whether lower breeding success at nests in higher densities contributed to this finding.

Tierney also monitored breeding bird behaviours at 12 active nests. Adult birds commonly flew off nests when the observers approached. Flushing and time off nest increased with repeated human approaches, which indicated the birds sensitised rather than habituated to disturbance.

The observed nests had a high failure rate, which is consistent with other studies of the sensitivity of wedge-tailed eagles to disturbance while breeding.

This study provides some evidence that the present access restrictions placed around known nest sites during the eagle breeding season are required to improve the chances of breeding success. Forestry Tasmania will continue to apply these prescriptions, as required by the Forest Practices System.



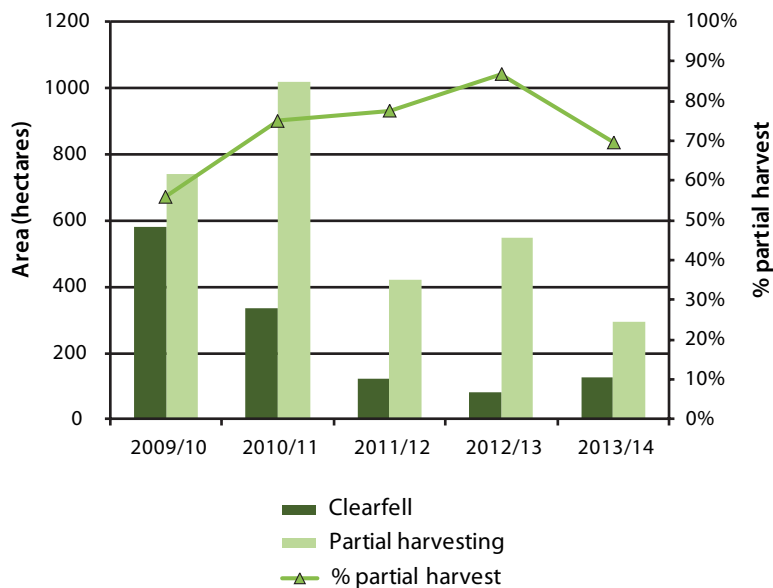
A University of Tasmania honours study confirmed that restrictions on access around eagle nests during the breeding season are required, as they improve the chances of breeding success.

## Old growth forests

Old growth forests are mature forests in which the effects of disturbance are now negligible. They are important environmentally, socially and economically to Tasmania. In Tasmania, old growth forest occurs across all land tenures. Well over one million hectares of old growth forest is protected across all land tenures in Tasmania.

A small proportion (only three per cent) of Tasmania's old growth is available for timber harvesting and contributes to sustaining the supply of high-quality sawlogs. The total area of old growth harvested in 2013/14 was 422 hectares, which is less than last year, and significantly less than in preceding years. Of this area, 294 hectares (70 per cent) was harvested using non-clearfell techniques and 128 hectares (30 per cent) was clearfelled.

### Old growth harvesting (clearfell and partial)



## Giant trees

Forestry Tasmania's Giant Tree Policy requires all trees over 85 metres in height or 280 cubic metres in volume to be protected. This policy is implemented by pro-actively searching for giant trees using LiDAR and on-the-ground surveys, and by protecting all discovered giant trees in reserves of at least 100 metres in radius.

In 2013/2014, we found and protected seven additional giant trees. We also identified that two former giant trees had died, with one burnt in a wildfire and the other falling over.

Of the 147 giant trees now on our register, 79 are on land managed by Forestry Tasmania.



The Centurion Tree, located near the Tahune AirWalk in the southern forests, is protected under Forestry Tasmania's giant tree policy. At 99.6 metres in height, it is the tallest flowering tree in the world.

# sustaining JOBS FOR CURRENT AND FUTURE GENERATIONS



In 2013/14, the gross value of wood products from Tasmanian-based primary processors was estimated to be \$211 million.

## Financial performance

We recorded a loss (after tax) of \$43.1 million, which includes significant non-cash items of \$41.5 million, as follows:

- A reduction in the valuation of the forest itself of \$18.9 million before tax, in addition to a net reduction of \$1.6 million in the valuation of roads and non-commercial zones, as detailed below in the *Forest assets valuation* section.
- A net tax expense of \$13.3 million, made up of de-recognition of deferred tax assets of \$21.1 million accrued in prior years offset by a net tax credit on the current year of \$7.8 million.
- An increase of \$3.4 million in the historical defined benefits superannuation liability.
- Employee benefit superannuation interest cost of \$6 million.

This result reflected the continuing difficult economic circumstances surrounding our business.

The State Government provided \$23 million in funding to enable Forestry Tasmania to meet its obligations during the 2013/14 financial year. This funding supported Forestry Tasmania's operations and enabled it to reduce end of year borrowings by \$0.8 million and remain cash positive at year end.

The Government also provided funding under the Tasmanian Forest Agreement and World Heritage Implementation arrangements, of which Forestry Tasmania received \$14.5 million for residue transport assistance, cable harvesting, plantation thinning, plantation establishment, and for work towards Forest Stewardship Council certification.

The financial statements for 2013/14 (Appendix 1) provide full details of the financial performance of Forestry Tasmania for the 2013/14 financial year, and provide specific details of the assistance provided by Government.

## 2013/14 financial statements

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/financial\\_statements\\_2014.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/financial_statements_2014.pdf)

## Forest assets valuation

Forestry Tasmania engaged James W Sewall Company (Sewall) to establish a valuation for its entire forest estate, inclusive of land, roads and obligations. Sewall is a United States-based company with international (including Australasian) experience in valuing forest estates. Forestry Tasmania has used Sewall for this purpose since 2010.

The net valuation of the forest estate is \$163.4 million. This compares with \$183.9 million for 2012/13, with the reduction reflecting the reduced wood quantities that can now be sustainably harvested from the managed area. The valuation comprises the standing biological asset (\$86.1 million) and roads (\$85.2 million), less obligations for non-commercial forest areas (\$7.9 million).



In 2013/14, Forestry Tasmania supplied forest products to 28 wood processing customers.

## Contribution to the economy

Forestry Tasmania's operations and the forest products it generates make significant economic and social contributions. These benefits are both direct and indirect. Direct benefits include the engagement and payment of service providers, contractors and staff. Indirect benefits include the provision of products to industry for value adding, and the economic activity in communities generated by businesses that service and support Forestry Tasmania's business, customers and suppliers.

In 2013/14 Forestry Tasmania made the following measurable socio-economic contributions:

- Payment of \$125 million to 1,346 companies for goods and services provided to Forestry Tasmania. Of these payments, 88 per cent (\$110 million) were made to 1,062 Tasmanian-based companies.
- Payment of \$22 million in wages to more than 295 staff.
- Provision of forest products to 28 wood processing customers, the majority of which have Tasmanian-based sawmilling operations.
- The gross value of wood products when leaving Tasmanian-based primary processors (for example, sawmills, and woodchip export terminals) was estimated to be \$211 million.

## Sustainable yield

The sustainable yield of a forest is the level of commercial timber (or product mix) extraction that can be maintained under a given management regime, without reducing the long-term productive capacity of the forest. Sustainable yield is a vital prerequisite of sustainable forest management.

For Forestry Tasmania, sustainable yield is most relevant to high-quality eucalypt sawlog supply, which includes sliced veneer log supply. The legislation Forestry Tasmania operates under has always mandated that we make available a minimum amount of these products annually. We therefore model and monitor this supply to ensure our forest management is consistent with this requirement.

To estimate supply from the forest, we use inventory, future growth estimates and historical harvest records. Supply from both eucalypt native forest and eucalypt plantation is considered in this calculation.

Forestry Tasmania reviews its sustainable yield calculation for high-quality eucalypt sawlog supply every five years. The review is required by the Regional Forest Agreement and ensures the calculation accounts for changed conditions such as land management decisions, new technologies, forest growth and market priorities. The latest review, which was the fourth, was published in March 2014 and reflects the outcomes of the *Tasmanian Forests Agreement Act 2013* and the *Forest Management Act 2013*.

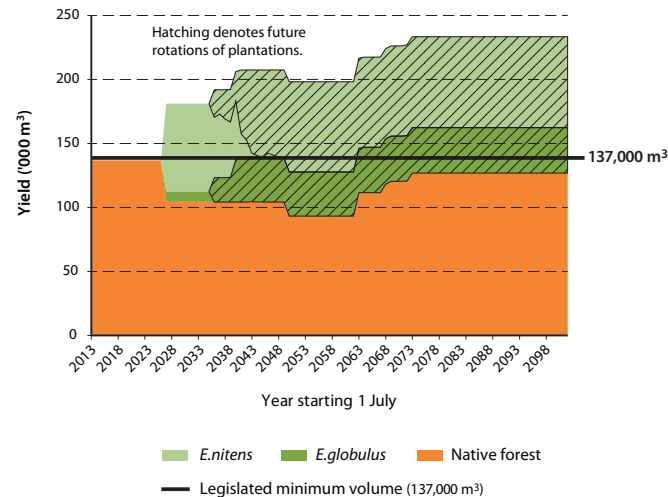
# sustaining JOBS FOR CURRENT AND FUTURE GENERATIONS



Forestry Tasmania regularly reviews its sustainable yield calculations to ensure that we can continue to supply high-quality eucalypt sawlogs over the long term.

This latest wood review confirms our ability to supply the volume legislated in the *Forest Management Act 2013* of at least 137,000 cubic metres per year of high-quality eucalypt sawlogs from the Permanent Timber Production Zone land for the next 90 years.

## Predicted yield of high-quality eucalypt sawlogs from Permanent Timber Production Zone land



In managing and harvesting the forest for high-quality sawlog production, it is inevitable that significant amounts of other products are produced. These products are collectively considered as arisings and are generally, though not always, of a lower quality than high-quality sawlogs. Forestry Tasmania does not calculate a sustainable yield figure for these products. Instead, the sustainable yield calculation provides a prediction of the amount of arisings that we expect to produce while harvesting high-quality eucalypt sawlog.

The 2014 wood review also predicted that the total 'standing' quantity of merchantable wood within eucalypt forest areas available for wood production after 90 years (that is, in 2102), will be greater than the current volume. This outcome meets a fundamental principle of sustainable yield, which is that the forecast forest productive capacity at the end of a planning period is at least equivalent to, and preferably better than, the actual productive capacity at the start of the planning period.

## Sustainable yield review

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/sustainable\\_yield\\_report\\_4\\_270314.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/sustainable_yield_report_4_270314.pdf)

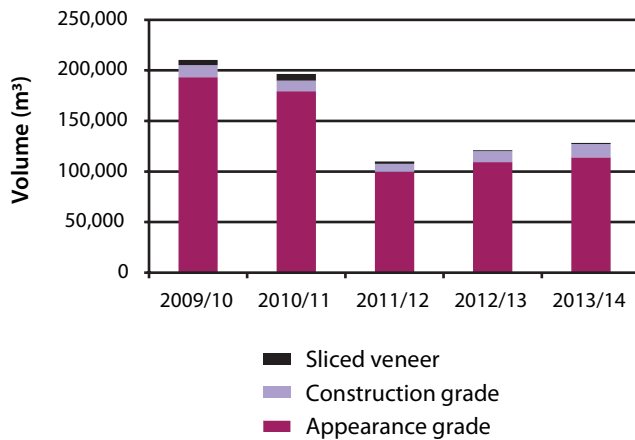
## Wood production

2013/14 saw Forestry Tasmania produce a total of 1.39 million tonnes of wood products. This was a 362,000-tonne increase on 2012/13 levels, reflecting increased contractor harvesting capacity as well as improved market conditions for lower-grade products.

In 2013/14 we produced a total of 128,260 cubic metres of high-quality eucalypt sawlog, which is about 9,000 cubic metres below our sustainable yield figure. The high-quality sawlog was sourced entirely from native forest and represented 10 per cent of Forestry Tasmania's hardwood log production.

The high-quality sawlog comprised approximately 1,000 cubic metres (one per cent) of logs suitable for sliced veneer production, 114,000 cubic metres (89 per cent) appearance-grade logs, and 13,000 cubic metres (10 per cent) construction-grade logs. The proportions of product grades generated were consistent with long-term production trends.

**High-quality sawlog production**



Native forest operations also produced the following arising products:

- 4,584 cubic metres of posts and poles, the majority of which were destined for use as electricity poles;
- 39,936 cubic metres of lower-quality sawlog that was suitable for uses similar to those of high-quality sawlogs, but which were expected to have lower product recoveries and primarily produce structural timber;
- 163,147 tonnes of higher-grade peeler logs, suitable for domestic rotary peeling into veneer;

- 17,470 tonnes of lower-grade peeler logs that were suitable for exporting to international markets;
- 643,175 tonnes of pulp logs that were suitable for local processing into export woodchips (this represented an increase of 77 per cent on 2012/13 production levels); and
- 9,685 cubic metres of fuel/firewood.

Forestry Tasmania’s hardwood plantations operations produced 262,000 tonnes of pulpwood. This represented an 82 per cent increase on 2012/13 production levels, and reflected both the improved woodchip market and the increased level of thinning activity associated with the

management of mid-age stands. The focus on thinning activities resulted in no other products being generated from the hardwood plantation estate.

Softwood operations produced approximately 26,000 cubic metres of sawlog and 70,000 tonnes of pulpwood. The majority of this production was associated with the activity of private plantation growers on Permanent Timber Production Zone land, where Forestry Tasmania receives stumpage royalties.

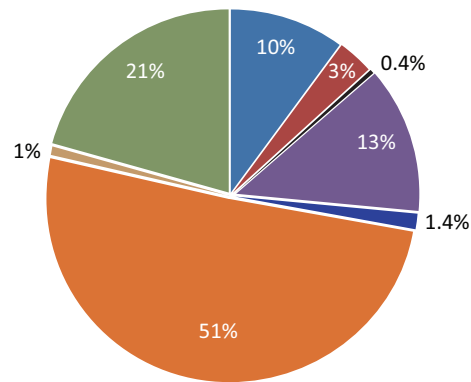
Refer to Appendix 2 for comprehensive statistics on the products that Forestry Tasmania produced in the financial year, and page 26 for details on special timbers production.



In 2013/14, Forestry Tasmania produced 128,260 cubic metres of high-quality eucalypt sawlog. This was well within our sustainability targets, being about 9,000 cubic metres below our sustainable yield figure.

# sustaining JOBS FOR CURRENT AND FUTURE GENERATIONS

## Hardwood production summary



## Product (2013/14 production)

- High-quality sawlog (presently 100% native forest) (128,259 m<sup>3</sup>)
- Native forest category 2 & 8 sawlog (39,936 m<sup>3</sup>)
- Native forest posts & poles (4,584 m<sup>3</sup>)
- Native forest high-grade domestic peeler (163,147 tonnes)
- Native forest low-grade export peeler (17,470 tonnes)
- Native forest pulpwood (643,175 tonnes)
- Firewood (9,686 m<sup>3</sup>)
- Plantation pulpwood (261,874 tonnes)

## Product segregation and recovery

We maximise the use of felled trees from harvested areas through the selection of craftwood, special timbers, high-quality sawlogs and sliced veneer logs, with the remainder being available as peeler logs, pulpwood and fuelwood. Harvesting contractors are trained and accredited as log classification officers, and are responsible for the appropriate segregation of products.

We have three further processes in place in order to maximise the recovery of wood volume and value:

- Segregation inspections carried out by our staff to determine the presence of any logs that may have been misclassified as a lower-grade product. These inspections take place on coupe landings, at mills and on log trucks. This year, we conducted approximately 700 such inspections.
- A feedback docket system that enables purchasers of logs and our staff to record any log grading issues.
- Post-logging residue assessments, to ensure the efficient removal of forest products and to quantify merchantable wood being left on the forest floor after harvesting operations.

In 2013/14, we conducted logging residue assessments in 39 harvested areas. The average amount of remaining timber that we assessed as merchantable was 4.4 cubic metres per hectare. This result is below our target level of less than five cubic metres per hectare. This is a significant improvement, being less than half of last year's figure and the first time in three years that we have met our target level. The improvement is directly attributable to our increased ability to sell into lower-value product markets.

## Establishment of Burnie woodchip operations

April 2014 saw the commencement of Forestry Tasmania's own woodchip export capabilities at the Port of Burnie. Importantly, this included the resumption of native forest woodchip exports from the facility after an extended four-year absence. This operation was made possible with the sale of the Burnie Chip Export Terminal by its previous owner to the Tasmanian Ports Corporation (Tasports).

The resumption of port operations in Burnie has improved Forestry Tasmania's ability to obtain economic returns for low-grade forest products arising from harvest operations in the north west of the State. During the period that Forestry Tasmania did not have access to this facility, we were forced to either leave residue on the forest floor, conduct low-margin log export operations, or cart the product an additional 150 kilometres to Bell Bay for chipping.

Forestry Tasmania's chipping operations at Burnie involve working closely with Australian Marshalling Services and Tasports, which provide contracted management services. The wood, which is sourced from both plantations and native forest, is delivered by our haulage contractors to the Australian Marshalling Services-managed Massey Greene facility located close to the Burnie port. Logs are then chipped and loaded directly onto trucks and transported to the port. The chips are subsequently unloaded via a truck dump system and stacked onto Forestry Tasmania's dedicated stockpile. The stockpile and associated vessel loading operations are managed by Tasports.

The operation is capable of processing approximately 3,500 tonnes per week. Forestry Tasmania expects to export approximately 165,000 tonnes of product from the Burnie facility annually.



### Wood product purchases

We purchase wood products from other organisations when supply from Forestry Tasmania-managed operations is insufficient to meet identified customer requirements. Purchased products include the standard suite of forest products from harvesting operations that occur on private land, as well as sawmill residues produced during the processing of sawlogs. Forestry Tasmania has diligence systems in place to ensure that any procured timber is sourced from legal sources and complies with certification requirements.

In 2013/14, Forestry Tasmania purchased and on-sold 109,000 cubic metres of timber from other sources. This volume was predominantly sawmill residue and hardwood plantation pulpwood.

### Meeting customer requirements

Despite the challenges facing the Tasmanian forest industry, our production and purchasing levels enabled us to meet most contracted customer commitments. There were only three instances (one high-quality sawlog customer, one plantation pulp log customer and one pole customer) where supply was slightly short of requirements. The main reasons for these shortfalls were the unavailability of a market for lower-grade products from coupes that were scheduled to supply customers, and the temporary unavailability of private plantation resource due to delays in resolving ownership issues.

### Hardlam

Over the last few years, we have been developing Hardlam, a veneer-based engineered wood product manufactured from lower-grade logs that would otherwise be converted to woodchips. The product will be a practical and affordable alternative to solid lumber.



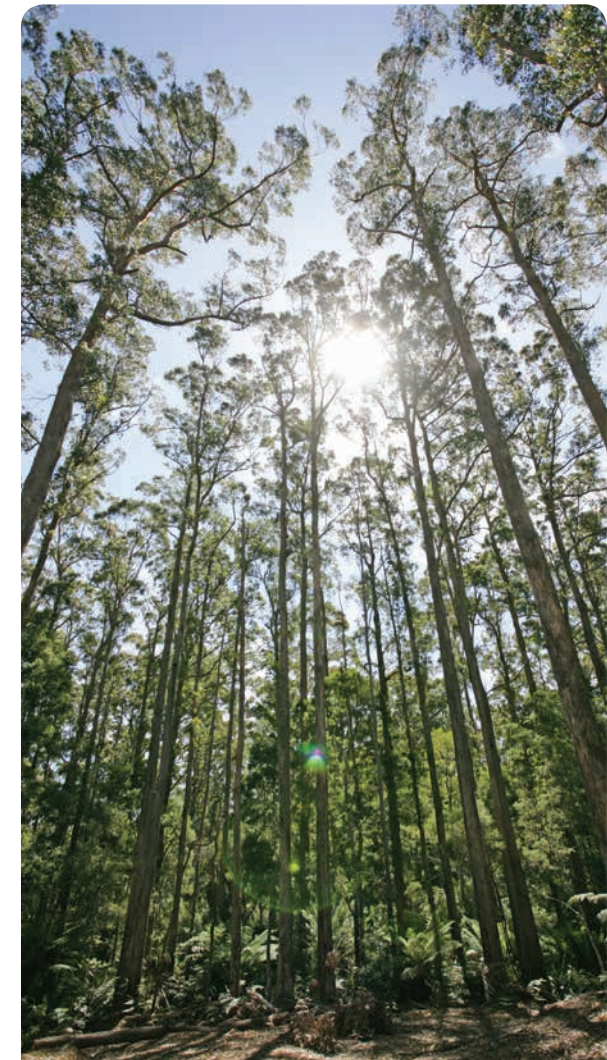
2013/14 was a milestone year in our quest to see commercial quantities of Hardlam manufactured locally. Our industry partner, Oak Tasmania, was successful in securing an Australian Government grant to build a production plant in southern Tasmania. As a result, we are now finalising both site and plant selection and entering the capital investment stage of the project. Based on the current schedule, we expect pre-production of Hardlam in Tasmania to commence towards the end of the 2014/15 financial year, increasing to full production over the following two to three years.

Hardlam has continued to receive positive reviews, most recently winning the Innovative Product of the Year category at the Australian Timber Flooring Association Annual Awards. We also ran successful promotions at two national flooring and furniture industry exhibitions.

We have continued to collaborate with partners and customers to both refine the product, conduct market trials and extend the range of applications. To support this work, we have commissioned a small local test facility, and engaged a consultant to oversee the interim production of Hardlam in China.

### Native forests

The majority of the area available for wood production on the Permanent Timber Production Zone land is native forest. This native forest provides high-quality eucalypt sawlogs and veneer logs, peeler logs and pulpwood as well as special timbers from non-eucalypt species.



# *sustaining* JOBS FOR CURRENT AND FUTURE GENERATIONS

## **Eucalypt forest regeneration**

We aim to ensure that productivity in Permanent Timber Production Zone land forests is maintained. In order to achieve this, forest regeneration practices are constantly monitored and reviewed. Successful eucalypt regeneration generally requires:

- effective site preparation by fire or by mechanical disturbance to create receptive seedbeds;
- an adequate supply of high-quality seed; and
- freedom from heavy frosts, drought and excessive damage by insects and browsing animals.

To ensure high-quality native forest regeneration, we maintain a native forest quality standards process. This process enables the timely, effective and accurate monitoring and reporting of silvicultural operations in native forests. The process uses goals, targets, standards and performance indicators to determine the success of regeneration operations. An annual quality standards review is held to discuss issues of concern relating to silvicultural operations, to ensure a constructive approach to improving practices, and to provide a forum for exchange of information and ideas. The following is a summary of the results collated from this process.

### **Site preparation**

Site preparation has a significant effect on the success of regeneration. Site preparation techniques include high- or low-intensity burning, mechanical loosening of the soil, or excavator heaping and subsequent burning of logging slash. In some cases, the disturbance caused by harvesting produces sufficient seedbed for adequate regeneration and no further treatment is required.

The quality standard for clearfelled areas is that receptive seedbed is created over at least two-thirds of the area to be regenerated. In partially-harvested areas, the quality standard is that receptive seedbed is created over at least one-third of the area to be regenerated, with less than 10 per cent scorching of retained stems, and the achievement of an acceptable level of fire protection.

In 2013/14, we assessed 3,923 hectares of native forest (2,621 hectares of clearfelled area and 1,570 hectares of partially-harvested area) against these standards. 91 per cent of clearfelled areas and 95 per cent of partially harvested areas respectively achieved the site preparation quality standard. This compares with the five-year average of 87 per cent and 88 per cent for clearfell and partial harvest respectively. Five clearfelled areas did not meet the site preparation standard as a result of poor burns. Three partially harvested coupes did not meet the standard because insufficient seedbed was created or an acceptable level of fuel management was not reached.

### **Seed and sowing**

Forestry Tasmania classifies the source of seed sown onto harvested native areas into three categories:

- **On-site seed** is collected from the harvested area or from a similar area within one kilometre.
- **In-zone seed** is from the same seed zone as the nominated harvesting area. The seed zones are detailed in Native Forest Silviculture Technical Bulletin No. 1 *Eucalypt seed and sowing*. For the purposes of quality standards, in-zone seed does not include the on-site seed component.

- **Out-of-zone** seed is collected from outside the seed zone of the nominated harvesting area. This is the least preferred seed source.

The seed provenance quality standard is that each harvested area should be regenerated with at least 10 per cent on-site seed, with the remainder being in-zone seed matched to forest type.

In 2013/14, we sowed 2,834 hectares with eucalypt seed. A total of 2,066 hectares (73 per cent) of this area achieved the seed provenance quality standard, right on the five-year average of 73 per cent. A shortage of on-site seed was the main reason for not achieving the desired standard. We sowed 2,680 kilograms of eucalypt seed, of which 40 per cent was on-site, and 59 per cent in-zone with just one per cent out-of-zone seed used.

The quality standard for sowing operations requires that the delay between site preparation completion and artificial sowing be less than 21 days. This ensures the best chance of successful regeneration. In 2012/13, we achieved this standard in 83 per cent of the artificially sown area. This is below our five-year average of 91 per cent.

### **Regeneration success**

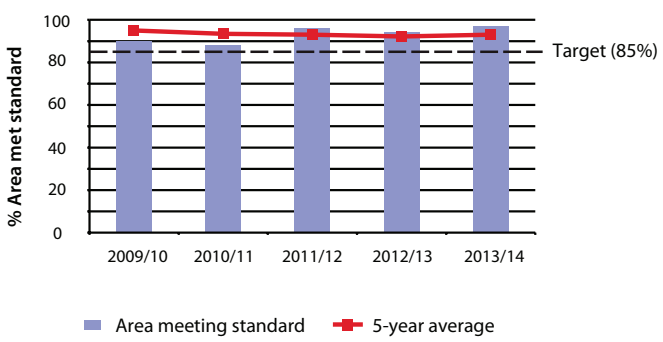
Regeneration success of eucalypt areas is reported when they are three years old. Swamp blackwood, rainforest and Huon pine forest coupes are reported when they are five years old. Regeneration success is determined by undertaking surveys. For each forest type, there is a set minimum stocking standard that needs to be achieved. This approach complies with the recommended national methodology for regeneration success monitoring.

In 2013/14, 7,414 hectares of native forest regeneration reached the relevant reporting age for regeneration success, and we achieved the required stocking standard in 97 per cent of this area. This is above the five-year average of 92 per cent, and exceeds our target of 85 per cent of the harvested area being regenerated to standard.

We did not meet the stocking standard in eight coupes, totalling 187 hectares. There were numerous reasons for understocking including poor regeneration burns, insufficient natural seedfall, adverse soil disturbance and browsing by native mammals. All these areas contained sufficient regeneration or retained trees to be considered as ecologically stocked and useful for wood production at a reduced rate.

Under this year's native forests quality standards program, we awarded the Gilbert-Cunningham trophy, which recognises the achievement of excellence in regrowing native forests following harvesting, to Huon District. Huon District was commended for the high quality of its overall performance, and for the staff's great attitude to their work.

**Native forest regeneration success summary**



**Regenerating the World Heritage Area addition**

In 2013 Forestry Tasmania contributed, as a service provider, to the restoration of harvested but un-regenerated coupes in areas of former State forest that were included in the 2013 addition to the Tasmanian Wilderness World Heritage Area.

The project is part of the Tasmanian Forest Landscape Restoration Project – a Federally-funded project that is being managed by Environment Tasmania, and which brings together collaborators from the Parks and Wildlife Service (the new land manager), the University of Tasmania and community groups such as the Understorey Network.

The project seeks to restore coupes in the World Heritage Area to their original state of tall wet eucalypt forests with an understorey of myrtle, sassafras, celery top pine and leatherwood.

Forestry Tasmania's Derwent District forest manager David White managed the burns at the three coupes that were identified for treatment in the 2013/14 year.

“Fundamentally, the burns create an ash bed and get rid of residue here to make room for seeding,” he said.

The collaborators have recognised Forestry Tasmania's skill and experience in burning, seed selection, sowing, and monitoring the regenerating wet eucalypt forests, which have been developed over 50 years.

University of Tasmania Associate Professor Mark Hovenden, a plant ecologist, is on board with the project to assist with advice on regeneration methodologies and to determine the most suitable plants and seeding techniques.

Stringent environmental guidelines will prevent the introduction of weeds and diseases.

Community groups will be responsible for follow-up revegetation monitoring, weeding and planting, with help from the Understorey Network and a Wildcare group.

Another five to seven coupes (all harvested prior to the transfer of lands to reserves) are scheduled for regeneration in the coming year.



Environment Tasmania's Annette Dean and Forestry Tasmania's John Hickey discuss restoration plans at coupe Counsel 10B, which is now located in the 2013 addition to the Tasmanian Wilderness World Heritage Area.

# sustaining JOBS FOR CURRENT AND FUTURE GENERATIONS

## Special timbers

Special timbers are an integral part of the Tasmanian brand. They are used to produce high-value furniture and craftwood products, and include blackwood, blackheart sassafras, myrtle, silver wattle and celery top pine. With the exception of blackwood and silver wattle, special timbers are mostly derived from old growth forests.

Our Special Timbers Strategy has provided for the ongoing long-term supply of these timbers to the Tasmanian craft and design industries. However, the implementation of the *Tasmanian Forests Agreement Act 2013* and the *Forestry (Rebuilding the Forest Industry) Bill 2014* will require us to review our supply strategy in future years. A review of the special timbers resource on Permanent Timber Production Zone land is currently underway.



Tiger myrtle sawn boards. Our special timbers management provides for the ongoing long-term supply of these timbers to the Tasmanian craft and design industries. A review of the special timbers resource on Permanent Timber Production Zone Land is currently underway.

In December 2013, as an initial step in reviewing the special timbers resource, we completed our latest review of sustainable millable log supply (category 4 and utility logs) from our Blackwood Management Zone in north west Tasmania, which largely comprises swamp forests. The designated Blackwood Management Zone is an area of 8,500 hectares, of which 6,900 hectares are available for harvesting. The blackwood forests are sustainably managed on a rotation length of about 70 years. This review modelled the sustainable millable log supply from the blackwood management zone as 3,000 cubic metres per year.

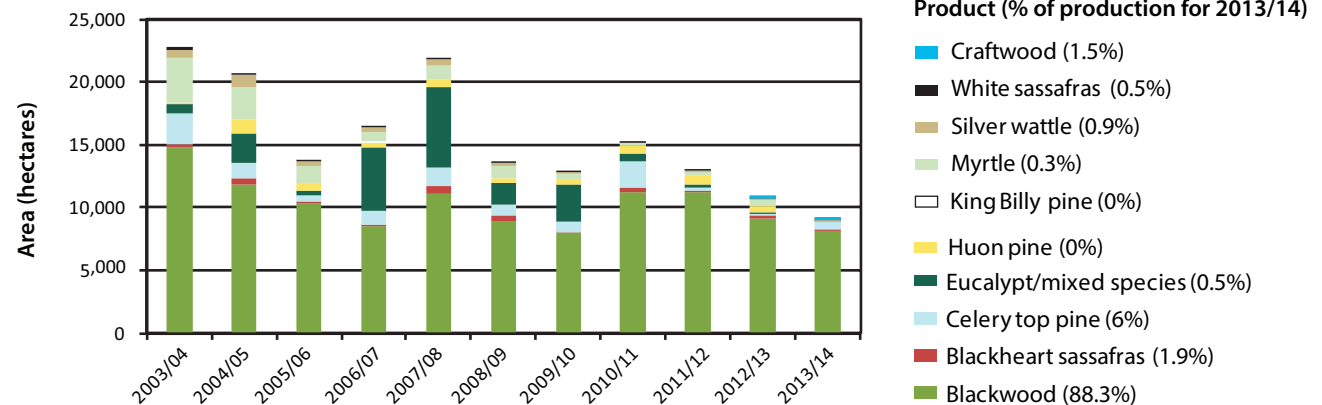
During 2013/14, we produced a total of 9,199 cubic metres of special timbers from Permanent Timber Production Zone land. This comprised 3,450 cubic metres of millable logs, with the remainder being 'out of specification' sawlog and craftwood. The volume of millable logs produced represents 28 per cent of the annual supply targets outlined in our 2010 *Special Timbers Strategy*. Blackwood made up 90 per cent of the total volume produced, with the rest comprising species

such as Huon pine, myrtle, sassafras, celery top pine and eucalypts with attractive craft features such as burls.

Blackwood from the north west forests constituted 88 per cent of the blackwood supply, and of this, 42 per cent came from swamp forests. The swamp-grown timber is sought after for its grain uniformity and depth of colour. These swamp forests are harvested during the drier period of the year. Unfortunately, significant rainfall events continued into January, which delayed the start of the blackwood logging season. In addition, the patches of blackwood forest harvested did not yield as much high-grade sawlog as in previous years. Of the swamp blackwood delivered to sawmills, 48 per cent was higher-grade sawlog destined for high-end furniture, veneer or cabinetry.

Forestry Tasmania is the only legal supplier of sawlogs of the famed Huon pine timber. The timber is salvaged from the historically cut-over Teepookana Plateau, as well as from the river banks and beaches around Macquarie Harbour after

## Special species production



flood events. Access to Teepookana Plateau is via the West Coast Wilderness Railway; however, its rail operations were under review this year, which prevented contractor access for most of the dry weather harvest season. Only 70 cubic metres of Huon pine craftwood was recovered from Teepookana during the year. However, Forestry Tasmania was able to supply customers from existing Huon pine stockpiles.

The supply of celery top pine was 40 per cent of the target supply for the year, as harvest operations on regrowth coupes delivered low proportions of this species.

There was limited harvesting of other areas within the Special Timbers Zone, reflecting the commitments made by Forestry Tasmania during the Tasmanian Forests Agreement process.

Forestry Tasmania continues to provide users of specialty timber products with access to the resource through the Island Specialty Timbers business. During 2013/14, Island Specialty Timbers sold 1,531 cubic metres of product from its three outlets based at Geeveston, Strahan and Smithton. This included selling 136 cubic metres of high-quality products through an online tendering process, to ensure that the best possible prices were obtained. The tendering program continued to receive strong interest, with the highlight for the year being an 87-centimetre diameter blackheart sassafras log that sold for \$5,000 per cubic metre.

### Blackwood Review

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/review\\_sustainable\\_blackwood\\_supply\\_2013.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/review_sustainable_blackwood_supply_2013.pdf)

### Bushcraft to aid of shingled shelter

A historic picnic shelter at Mole Creek received a makeover in 2014 through the generosity of a couple of retired locals and some help from Forestry Tasmania.

Neville Howe and Rob Harris were looking for a retirement project to intersperse with their regular highlands fishing trips when the dilapidated state of the shelter at the local camping ground was brought to their attention.

Built and named for a renowned local bushman, the Alf Walters Lodge was opened 42 years ago by footballing great and then State Works Minister Darrel Baldock.

The repairers wanted to ensure their work was a faithful restoration, and so had to find a King Billy pine tree to produce shingles for the re-cladding.

Neville knew of one such dead specimen and an application to have it donated to the cause was approved through Forestry Tasmania.



Neville Howe and Rob Harris get on with the job of re-shingling the shelter at the Mole Creek camp ground.

Senior forest officer Col Leary said the tree's status as a special species meant policy guidelines had to be adhered to for any harvesting.

"This tree was out on its own and already dead, so an assessment found there would be minimal impact in removing it for this purpose."

Mr Howe said procuring the tree was barely the start of the project.

"We had to do a fair bit to correct the frame of the building. It was a like a camel's back along the ridge."

When that job was done, the two mates set into cladding the building with the new shingles they had laboured to split.

Despite having split plenty of shingles over their time, neither had fixed them before.

"So we picked it up as went along. Dismantling the old roof also helped show us how they were supposed to go on," Mr Harris said.



Forestry Tasmania's Col Leary acknowledges Neville and Rob's work.

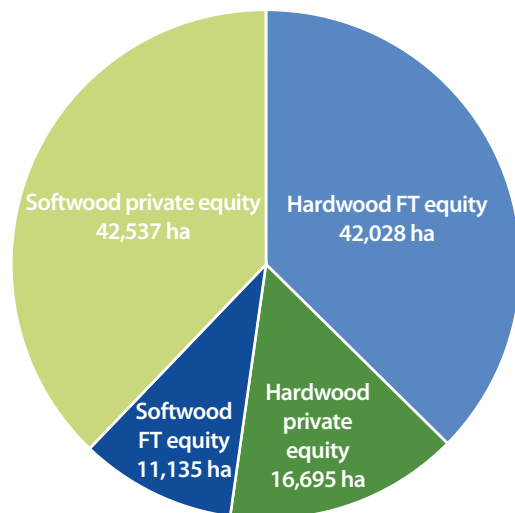
# sustaining JOBS FOR CURRENT AND FUTURE GENERATIONS

## Plantations

Forestry Tasmania's eucalypt plantations will play an increasingly important role in the future production of wood products from Permanent Timber Production Zone land. The majority of these plantations have been developed over the last two decades, and to date some 58,000 hectares have been planted. Approximately 70 per cent (41,000 hectares) is under full or partial Forestry Tasmania ownership, while the ownership of the remaining 30 per cent, which is currently controlled by external parties, will be reviewed at the end of the respective rotations.

Forestry Tasmania also has a long history in softwood (*Pinus radiata*) plantation management, and some 53,000 hectares have been established on Permanent Timber Production Zone land. Equity in this resource has now been largely divested and the estate is owned and managed by external parties. However, approximately 2,800 hectares is still

### Plantation type and ownership



managed by Forestry Tasmania. Further details on plantation ownership are provided in the data tables in Appendix 2.

The management objective for the eucalypt plantation estate is the sustainable supply of high-value, large-diameter, pruned logs for the production of solid timber and sliced veneer products, primarily for local industry, but also for interstate and overseas markets. Secondary products include unpruned logs for sawing and peeling, pulpwood for paper, and posts and poles. There are also increasing opportunities to develop engineered wood products from plantation logs.

The two main plantation eucalyptus species are *Eucalyptus globulus* (Tasmanian blue gum) and *E. nitens* (shining gum). Both species are fast growing and are suited to Tasmanian conditions. *E. nitens* is favoured on colder, higher elevation sites due to its frost tolerance and *E. globulus* is favoured on frost-free sites. The wood properties of *E. globulus* are superior to *E. nitens* in terms of pulp yield, density and

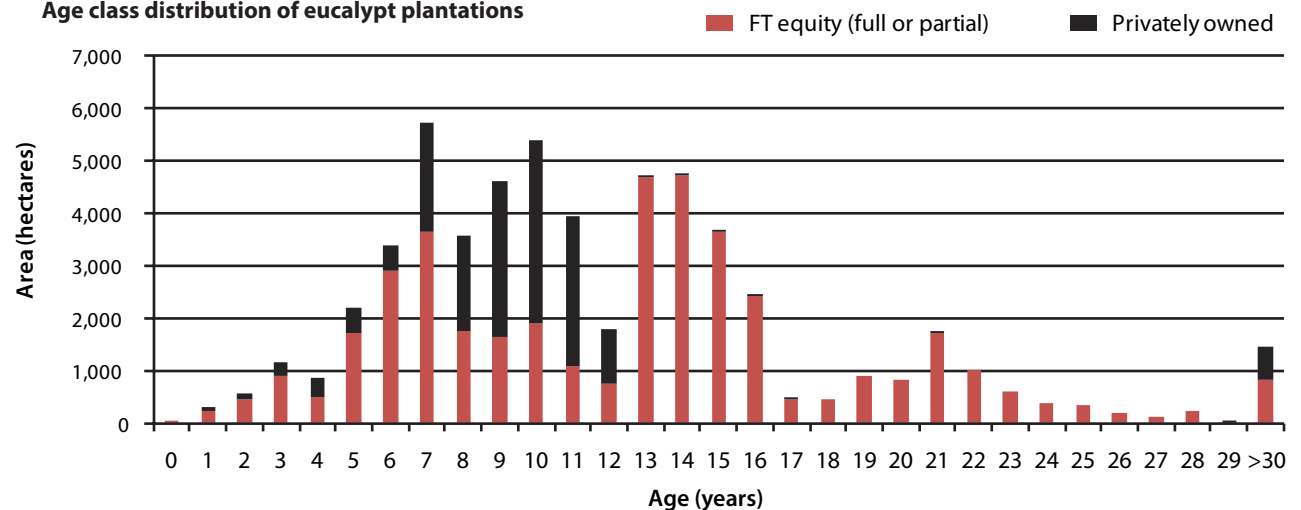
strength; however, both species can suffer from internal defects (tension wood in *E. globulus* and checking in *E. nitens*), which are managed through appropriate silviculture, processing and utilisation practices. Tree breeding will also play a long-term role in improving the quality of the wood.

Currently, approximately 80 per cent of the plantation estate is *E. nitens*, and 20 per cent, *E. globulus*.

The *E. globulus* planting program was significantly reduced in the 1990s following damage caused by severe episodes of *Mycosphaerella*, a leaf fungal disease. However, a review and risk analysis of the planting strategy found that over the course of a rotation, the losses due to pests and diseases such as *Mycosphaerella* are manageable.

The current intention is to extend plantings of *E. globulus* more widely, with the long-term goal being to establish about 50 per cent of the plantation estate as *E. globulus*.

### Age class distribution of eucalypt plantations



The production of high-value, large-diameter, pruned logs is achieved through intensive silviculture, particularly pruning and thinning, with planned rotation lengths of approximately 25 years. Pruning promotes the development of clear, defect-free wood (clearwood) on the pruned section of the trees and is usually undertaken in three pruning lifts, from age three years, to a height of 6.4 metres. Thinning occurs after pruning is completed, and harvests lower-value trees from the stand in order to reduce competition and promote growth on the retained, pruned crop trees. This increases the production and quality of the pruned logs for harvest at the end of the rotation, and also provides a mid-rotation financial return from the thinned logs.

The age class distribution of our hardwood resource reflects the establishment history of our plantations. Of a total of 41,000 hectares, some 13,900 hectares (33 per cent) is 10 years old or younger, while only 6,300 hectares (15 per cent) is 20 years or older. Currently, the total standing volume of the plantations under full or partial Forestry Tasmania management is approximately six million cubic metres, or about 149 cubic metres per hectare. This reflects the relatively young age of the estate with an area weighted average age of 13 years. A large program of production thinning is now underway in stands older than 10 years to optimise the subsequent production of pruned logs.

The annual planting program has declined over the past seven years, and in 2013/14 only 231 hectares was planted, plus an additional 132 hectares of infill planting. This follows a downward trend since 2007, when approximately 2,000 hectares were established, and reflects the consolidation of the plantation estate with the end of native forest

conversion and the small areas of second rotation sites becoming available for replanting. Second rotation establishment will increase significantly in the future as the plantation estate matures.

**Growth characteristics, silviculture and annual operations in the eucalypt plantation estate (full or partial Forestry Tasmania equity)**

Growth characteristics	
Standing volume (000 m <sup>3</sup> )	6,000
Average standing volume (m <sup>3</sup> /ha)	149
Area-weighted average age (years)	13
Area by silviculture	
High pruned and thinned (high-quality, pruned logs) (ha)	26,000
Low pruned and thinned (unpruned logs) (ha)	2,000
Unpruned and unthinned (pulpwood production) (ha)	13,000
Thinned only (ha)	600
Annual operations by area (ha) in 2013/14	
Planting	231
Infill planting	132
Fertilising (secondary)	808
Pruning	3,796
Thinning	2,200
Final harvest	303

**Tree improvement through genetics**

Our Tree Improvement Program aims to apply the best breeding techniques available to maximise the economic, environmental and social benefits from the plantation estate. This is achieved through testing, identifying and capturing genetic material that has the right balance of growth rate and wood quality.

A major evaluation of the *E. nitens* genetic resource was completed this year, allowing us to select the best trees for our breeding and seed production programs. This joint analysis of information from Forestry Tasmania, Hancock Victorian Plantations and ex-Gunns estate, comprised data from 185,000 trees. In 2010, similar analysis of the breeding program indicated that using the then-known best trees, instead of unimproved native forest seed, for seed production and subsequent plantation establishment would significantly increase the net present value of the crop over the life of the planned rotation. To some extent this improvement has already been achieved, particularly in more recent plantings.

The 2013/14 highlight of the tree improvement program was the commencement of the Kamona wood quality trial (see next page), which will provide valuable information for our breeding program.

# sustaining JOBS FOR CURRENT AND FUTURE GENERATIONS

## Wood quality research

In March 2014, we commenced a study to evaluate the quality of wood from 30-year-old *E. nitens* trees sourced from a genetics trial at Kamona in north east Tasmania. The study is being undertaken in collaboration with Ta Ann Tasmania, University of Tasmania, Queensland Department of Agriculture, Fisheries and Forests, and Neville Smith Timbers. This work is part of a larger project, which aims to improve our understanding of the wood quality from *E. nitens* and *E. globulus* plantations.

The *E. nitens* trial was planted in 1984 using seed from the native forests of central Victoria, and while the trees were unpruned and unthinned, some natural pruning and thinning had occurred through competition from other trees.

The trial is being used to examine recovery of both peeled veneer and sawn timber from the trees. For the veneer trial, two logs from 50 individual trees were sent to Ta Ann for processing into peeled veneer. The peeled veneer has since been sent to the Queensland

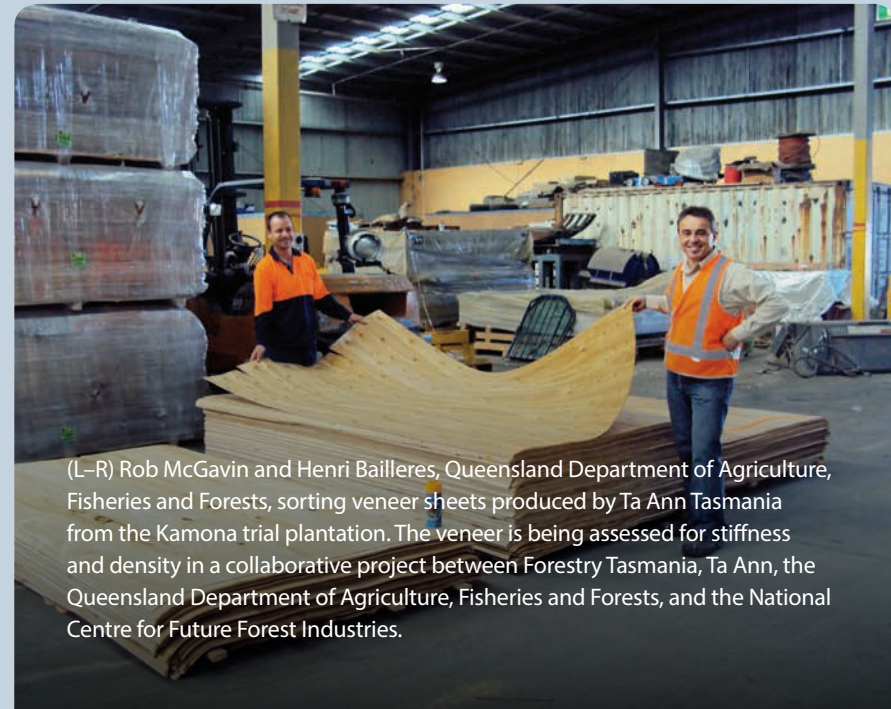
Department of Agriculture, Fisheries and Forests laboratories, where it will be tested for attributes such as stiffness and density. Some plywood products may also be produced from the veneer and tested.

For the sawlog trial, 150 logs were sent to Neville Smith Timbers for cutting into boards and racked for drying, and will ultimately be made into a range of products to evaluate their suitability for architectural and furnishing purposes.

The results from preliminary studies have been promising. They indicate that wood from older *E. nitens* plantations is denser and stiffer than wood from younger plantations, which is typically used for pulpwood. The older plantation wood is also demonstrating properties that could make it a viable alternative to native forest regrowth timber for sawing and peeling. These studies, and others like them, are beginning to build a more detailed picture of what uses and values the plantation estate will have to offer as it matures and becomes ready to harvest.



Forestry Tasmania's Dean Williams with logs produced from a trial *Eucalyptus nitens* plantation at Kamona, north east Tasmania. The logs are being evaluated for sawn timber properties by the University of Tasmania's Centre for Sustainable Architecture with Wood.



(L-R) Rob McGavin and Henri Bailleres, Queensland Department of Agriculture, Fisheries and Forests, sorting veneer sheets produced by Ta Ann Tasmania from the Kamona trial plantation. The veneer is being assessed for stiffness and density in a collaborative project between Forestry Tasmania, Ta Ann, the Queensland Department of Agriculture, Fisheries and Forests, and the National Centre for Future Forest Industries.





### Fertilising

Improving nutrition is a key means of improving the health and productivity of our plantations, because many of Tasmania’s forest soils have relatively low nutrient availability, particularly of nitrogen and phosphorus. Consistent with our aim of long-term sustainability, fertiliser use is adjusted for each stand and site, according to soil, climate, economic, operational and environmental factors. Ongoing research is investigating new fertiliser products for primary fertilising at planting, and also ways to improve secondary fertilisation from age two years onwards.

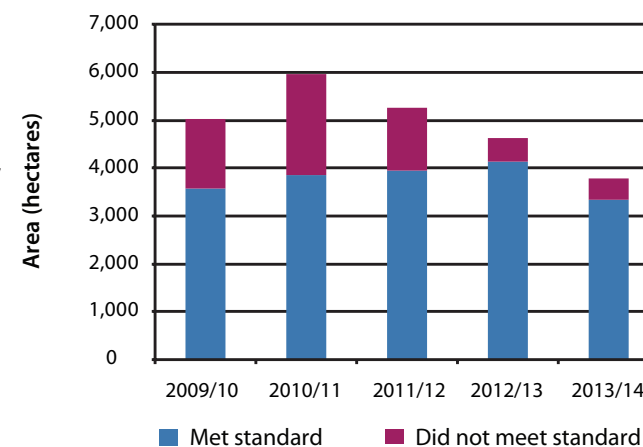
In 2013/14, primary fertilising continued to be a routine component of plantation establishment, and the area covered by the secondary fertilising program increased from the previous year. A total of 809 hectares received secondary fertiliser, which comprised 505 hectares receiving fertiliser after first production thinning, and 304 hectares receiving standard secondary fertilising.

### Maximising the quality of solid wood products from plantations

In line with commitments to increase the future supply of high-quality sawlogs from plantations, large volumes of knot-free timber (clearwood) are required. Pruning is integral to this production. Pruning is presently undertaken in three stages, or lifts, to a height of 6.4 metres. These stages allow the trees time to rebuild leaf area (canopy), and to allow the healing over of the stem to subsequently produce knot-free timber.

Monitoring the timing of pruning, ensuring adequate numbers are pruned, and assessing the quality of pruning, are fundamental to maximising pruned wood volume. The quality standards system for these pruning assessments also provides valuable information about the growth of the stand. In 2013/14, we pruned 3,796 hectares of eucalypt plantations across first, second and third lifts. Of this area, 3,345 hectares, or 88 per cent, met the quality standards.

**The area of eucalypt plantations 1st, 2nd and 3rd lift pruned and area that met quality standards**



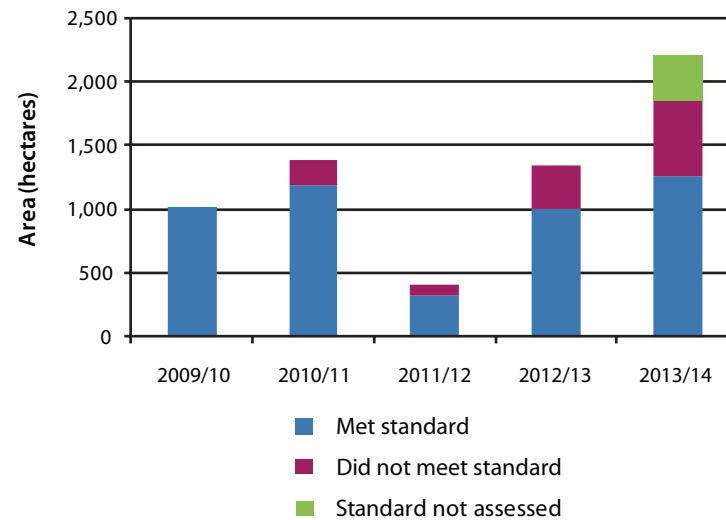
# *sustaining* JOBS FOR CURRENT AND FUTURE GENERATIONS

## Plantation thinning

Pruning and thinning can be used to increase the production of pruned logs from plantations, and to maximise the value of plantation timber. Thinning increases individual tree growth rates by concentrating a site's growing resources on a smaller number of trees. The number and height of pruning lifts, and the timing and intensity of thinning, can be varied in order to achieve the best outcomes on a given site.

The thinning program increased in 2013/14, with 2,200 hectares of eucalypt plantation thinned. Of the area assessed, 1,250 hectares, or 68 per cent, met the quality standards for thinning.

**The area of eucalypt plantations commercially thinned and the area that met quality standards**



The main reasons for this poor result were damage to retained stems, and stocking not meeting prescriptions.

These results were compounded by stands being older than desirable for thinning treatments (due to poor pulp markets in the last few years) and the use of inexperienced harvesting contractors. Because the operation is being undertaken in a two-stage process, 351 hectares of thinned forest was not assessed against the quality standard.

We are continuing to actively investigate ways to manage the plantations that are overdue for thinning, including pursuing pulpwood markets and developing early-age thinning silviculture for future rotations.



## Apiary management

Many beekeepers in Tasmania depend on land managed by Forestry Tasmania for access to leatherwood (*Eucryphia lucida*) nectar, although significant sources also occur in conservation reserves managed by other agencies. Leatherwood trees predominantly occur in mature wet eucalypt forest and rainforest. Approximately one million hectares of forest in Tasmania has been identified as likely to contain leatherwood. Of this, 230,000 hectares (21 per cent) occurs on Permanent Timber Production Zone land, with about 98,000 hectares of this area being in areas zoned for

wood production. There are presently 340 sites available for beekeeping on Permanent Timber Production Zone land. Where practical, forest management prescriptions exclude leatherwood from harvesting.

Beekeeping is flagged as a management objective for areas with a high leatherwood component under Forestry Tasmania's Management Decision Classification zoning system, and harvesting in these special management zones takes particular account of maintaining and enhancing leatherwood sources.

Forestry Tasmania collaborates with the Tasmanian Beekeepers Association on leatherwood resource management through participation in the Murchison Leatherwood Committee and the Wedge Community Forest Agreement, and through consultation on leatherwood resource mapping in the southern forests. Forestry Tasmania and the Tasmanian Beekeepers Association have reached agreement on access charges to Permanent Timber Production Zone land for beekeeping purposes, security of tenure for site licences and access arrangements. Agreement has also been reached on separation of sites to preserve the integrity of collection zones.



Land managed by Forestry Tasmania is an important source of leatherwood nectar. In 2013/14, there were 340 beekeeping sites on Permanent Timber Production Zone land.

# *sustaining* CARBON STORES, CLEAN AIR, WATER AND HEALTHY FORESTS



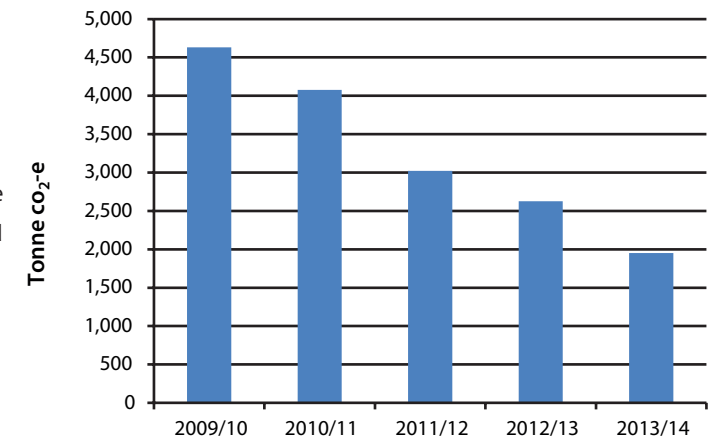
## Our carbon dioxide emissions

The main energy inputs used by Forestry Tasmania are fossil fuel, mainly for the purpose of transport of staff and equipment, and electricity used to power our offices and workshops. Our estimated fossil fuel-derived greenhouse gases, emitted in carbon dioxide equivalent, amounted to two kilotonnes in 2013/14. This does not include energy use by our contractors. This is a 26 per cent reduction compared with last year's emissions. The reduction can largely be attributed to a decrease of 250,000 litres in fuel use, associated with Forestry Tasmania's reduced vehicle fleet.

We do not directly measure fossil fuel use by our contractors, but it is expected that our contractors' log haulage fleet would produce the majority of emissions. To manage fuel efficiency, our wood scheduling system identifies optimal cart routes for each harvest operation we conduct.

We continued to use the rail network to transport 80,000 tonnes of logs from Brighton to Bell Bay, reducing emissions and taking the equivalent of 2,500 truck movements off the Midland Highway.

Annual amount of fossil fuel derived CO<sub>2</sub>-equivalents produced from fuel and electricity usage



## Carbon storage in our forests

We have updated our estimate of present and future carbon storage in the forests we manage. The update predicts carbon storage in standing trees until 2050, and is based on our latest sustainable yield review (see pages 19–20). The update was undertaken using the same methodology as our previous estimate, which was prepared by the MBAC Consulting Group in 2007.<sup>1</sup>

The updated carbon storage estimate (presently 68 million tonnes) is significantly lower than the 2007 estimate (approximately 150 million tonnes), and reflects the reduced land area under Forestry Tasmania's management control. It is predicted that carbon storage will remain in a fairly steady state until about 2030, before increasing to approximately 78 million tonnes in 2050. The update shows that reductions in carbon associated with harvesting are offset by growth in the forest as a whole.

Forestry Tasmania uses a range of strategies to ensure that water quality in Tasmania's Permanent Timber Production Zone land remains excellent. These include the use of the CSIRO-developed Pesticide Impact Rating Index.

<sup>1</sup>MBAC (2007). Forestry Tasmania's carbon sequestration position. Melbourne, MBAC Consulting Group.

Although estimates are easy to generate, and we have done this previously, it is very difficult to accurately measure our contribution to carbon dioxide emissions from our burning program. This is because the amount generated by each burn depends on factors such as forest type, residual fuel loads, recent weather, local topographic conditions and burn intensity. However, at the estate level, carbon sequestered through our growing forests outweighs carbon lost during the harvesting and regeneration process.

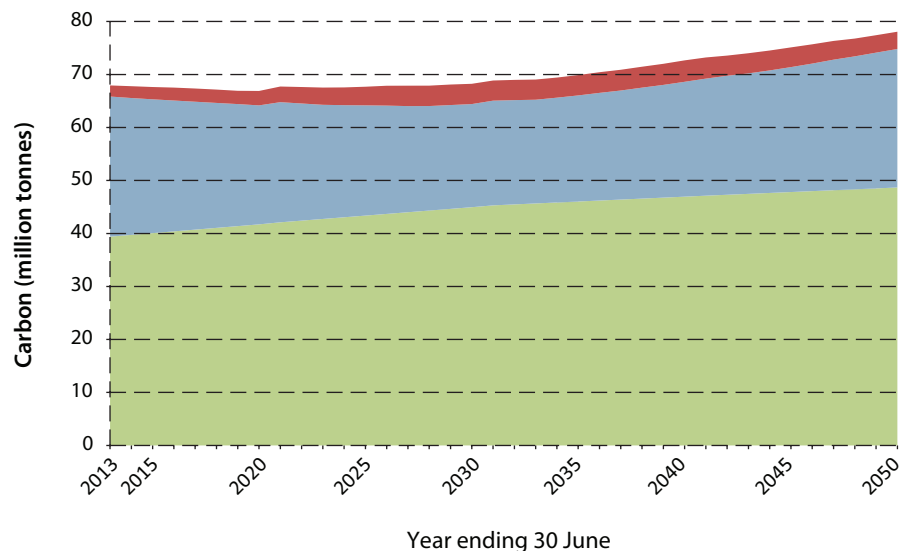
### Planned burning and air quality

Controlled fire is a valuable tool, used by Forestry Tasmania at high intensity to regenerate native forests by creating an ash seedbed to facilitate the germination of eucalypt seed in wet forest types, and at lower intensity to reduce fuel loads in drier forest types, buttongrass moorland and heathlands. The majority of Forestry Tasmania’s planned burning is undertaken during autumn, as weather and fuel conditions at that time of year enable fire behaviour to be manipulated to match operational objectives.

All burning operations are intensively planned and conducted in accordance with long established, research-based prescriptions.

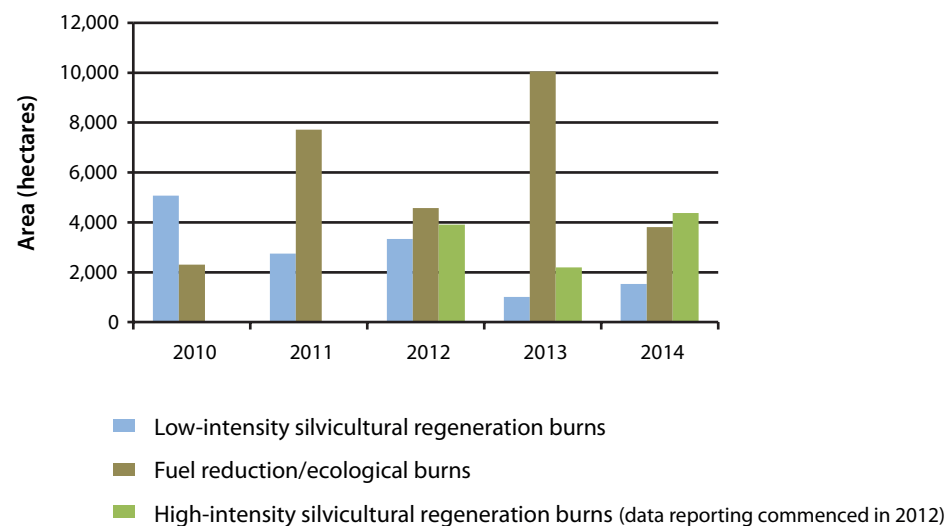
The weather patterns over the 2013/14 burning season provided more frequent than normal opportunities for burning. This enabled us to conduct 177 planned burns, covering approximately 9,700 hectares. The burns were made up of both high- and low-intensity silvicultural burns, as well as strategically located fuel reduction burns.

Estimated carbon stocks in standing live trees



- Eucalypt native forest outside wood production area
- Eucalypt native forest wood production area
- Eucalypt plantations

Burns conducted on Permanent Timber Production Zone land



# *sustaining* CARBON STORES, CLEAN AIR, WATER AND HEALTHY FORESTS

Smoke is an inevitable product of this regeneration and fuel reduction burning and has the potential to cause detrimental social and economic effects. We therefore attempt to minimise the effects of our burning on the Tasmanian community.

Forestry Tasmania, other forest industry companies, and the Parks and Wildlife Service, coordinate autumn burning through participation in the Coordinated Smoke Management Strategy, which is a Forest Practices Authority initiative. Every morning during the autumn, the Forest Practices Authority sets maximum smoke load limits for Tasmania's 'airsheds', and Coordinated Smoke Management Strategy participants manage their burning within their smoke allocation. In addition, Forestry Tasmania aims to burn only in areas for which forecast weather conditions indicate the smoke will be dispersed away from settled areas. At present, the Coordinated Smoke Management Strategy only applies to burns carried out by Forestry Tasmania, the forest industry and Parks and Wildlife Service, so many other private landholder burns go unrecorded.

Practices applied to minimise disruption to the community during the 2014 burning season also included the following:

- Briefing key stakeholder organisations, and notifying the general public through public notices in all State and regional papers, as early as possible before the burning season commenced in autumn.
- Daily stakeholder and media advisories were issued at or before 11:00am on the morning of all planned burns.

- Daily appraisals of smoke management issues arising from planned burns were issued each evening. These included, when necessary, an explanation of factors that contributed to any unexpected outcomes.
- The declaration of one 'no burn day' due to predicted poor smoke dispersal.

We did not need to issue any public notifications of poor air quality arising from our burns.

We also continued to provide information on the Tasmanian forest industry planned burns website ([plannedburnstas.com.au](http://plannedburnstas.com.au)), and on Forestry Tasmania's own website, to ensure that the community had access to information about the location of planned burns.

## **Air quality monitoring**

Forestry Tasmania uses a network of air quality monitoring stations known as the Base Line Air Network Tasmania (BLANKET) to plan and monitor our burns. The network is managed by the Environmental Protection Authority and comprises approximately 30 monitoring stations, which are largely located in the main Tasmanian population centres.

The BLANKET sites supply near real-time particle concentration data, allowing us to monitor the amount of smoke or dust in the atmosphere near each station and to determine if national air quality guidelines have been exceeded. The measurement equipment used at these sites provides data that is only indicative of air quality, but it nevertheless provides a valuable tool to monitor the spatial extent of smoke events produced by planned burns, domestic firewood consumption or wildfires.

Forestry Tasmania uses the network to monitor and estimate the extent of any degradation of air quality arising from all forms of prescribed burning. This information strongly influences the scheduling process for the remaining burn program.

The Environmental Protection Authority identified 45 indicative exceedances of the national air quality standard at the BLANKET sites across the duration of our prescribed burning program. We reviewed these events in relation to the timing and location of all our burns, and could not attribute any exceedances wholly to our burning program. However, we acknowledge that, along with other smoke sources, smoke generated from our burns probably contributed to one exceedance detected at the Geeveston monitoring station.

The Environmental Protection Authority is also responsible for recording and investigating all smoke-related complaints for the State. Forestry Tasmania therefore forwards all smoke-related complaints that it receives to the Environmental Protection Authority for compilation. In 2013/14, the Environmental Protection Authority received 11 complaints, a reduction from the 21 complaints received in 2012/13. Forestry Tasmania generated smoke contributed to six of the complaints, compared to 11 in 2012/13. This continues the trend of an annual decrease in both the number of smoke complaints Environmental Protection Authority receives, and the number of complaints to which Forestry Tasmania has contributed.

For more information on air quality monitoring in Tasmania, visit [epa.tas.gov.au](http://epa.tas.gov.au)

## Water, soils and geodiversity

### Water quality

Streams on Permanent Timber Production Zone land provide quality habitat for native species, water that needs minimal treatment for domestic and agricultural use, and recreational opportunities such as fishing, canoeing and swimming. Water quality in Tasmania's Permanent Timber Production Zone land is generally excellent, partly because of the range of strategies that Forestry Tasmania uses to minimise the impacts on water quality of activities such as pesticide use, harvesting and road construction.

To minimise the risk of chemical contamination from our pesticide operations, we use the CSIRO-developed Pesticide Impact Rating Index software package. The Pesticide Impact Rating Index determines the risk of a pesticide operation based on mobility; toxicity to indicator plants, invertebrate, fish and mammal species; and site-specific variables such as soil type and landscape. It can also assess the risk of pesticide operations to human health through comparison with the Australian Drinking Water Guidelines. It combines this data with site-specific information to produce a risk assessment of the potential for pesticides to move off site, and their potential to affect aquatic organisms. The use of the Pesticide Impact Rating Index has reduced the risk of pesticide contamination of streams by enabling the identification of the safest but most effective pesticides to use for control of weeds, insect pests or fungal disease. In 2013/14, all of the chemical application operations that we were required to model using the Pesticides Impact Rating Index were modelled as posing low or very low environmental risks.

We also conduct a water quality monitoring program at sites where there may be a risk to water quality, or where there is stakeholder concern associated with our chemical use. The Pesticide Impact Rating Index provides our staff with a scientific means of identifying those sites, allowing our water monitoring resources to be effectively targeted. In 2013/14, we submitted water samples from nine operations for independent analysis. These samples include a pre- and post-spray sample, as well as a sample taken after the first significant rain event that occurred after the operation was completed. None of the samples we submitted contained any detectable levels of chemicals, continuing our good recent record in effectively managing chemical applications.

### Soil and geomorphology

Soil and geomorphology values are considered during the development of Forest Practices Plans. The Forest Practices Code provides guidance on managing specific soil and geomorphological conditions, in order to minimise damage to these values through processes such as compaction and erosion. Some areas require special management, or even total protection, due to their sensitivity to disturbance. As at the end of 2013/14, our Management Decision Classification system recorded a total of 8,000 hectares as having been declared unavailable for harvesting due to the risk of erosion, with a total of 105,000 hectares managed for soil and geoconservation values.

## Weeds, pests and diseases

During the 2013/14 year we maintained our commitment to managing weeds, pests and disease through the following routine measures:

- Managing the risk of weed and pathogen spread in forest operations by implementing wash down and quarry management procedures.
- Monitoring and controlling identified declared noxious weeds.
- Maintaining a forest health surveillance program to identify issues as they emerged.
- Operating an integrated pest management program to control the damage in plantations caused by leaf beetles.
- Monitoring and controlling the damage to establishing forests caused by browsing mammals.

# sustaining CARBON STORES, CLEAN AIR, WATER AND HEALTHY FORESTS

## Ragwort control successful on Bruny Island

Forestry Tasmania took the lead in eradicating a yellow-flowered invader on Bruny Island during 2014.

Ragwort is a pasture weed that is toxic to grazing animals, and which has become widespread across Bruny Island. It seeds prolifically and spreads rapidly.

However, after years of intensive control, one formerly ragwort-infested area on Permanent Timber Production Zone land has now been declared free of the noxious weed.

Senior forest officer Mitchell Raspin says the eradication is the result of a long-term program undertaken by Huon District in collaboration with Kingborough Council and community groups.

"If you go to any weed management committee meeting in the Huon District, the first weed people always want to talk about is ragwort," he says.

"Controlling ragwort is an expensive, labour-intensive process that can take up to five years to be successful."

Spraying can control new plants. However, other than biological control, the only way to eliminate those with seedheads is to pull the weeds by hand. The pulled plants must be bagged and buried in a dedicated waste management facility to reduce the risk of seed spreading.

Buoyed by the recent success on Permanent Timber Production Zone land, the main focus of Huon District's efforts this year was a heavily infested 10-hectare area that covered both forestry and private land.

Forestry Tasmania staff, aided by volunteers, worked over five days to pull weeds. Kingborough Council managed weed disposal.

Mitchell says the benefits of the intensive program are now starting to become evident.

"Ragwort continues to be a challenge on both private and public land. However, with the continued involvement of the local councils, landowners and community groups, we believe that it can be controlled to a manageable level on Bruny Island."

## Forest health surveillance program

Forestry Tasmania maintains a forest health surveillance program to detect new or emerging forest health problems, and to facilitate the management of pests and diseases in plantations on Permanent Timber Production Zone land. Once a health problem is detected, our scientists work with field officers to further investigate issues and develop effective controls. Roadside and ground surveys covered approximately 38,000 hectares of hardwood plantation this year.

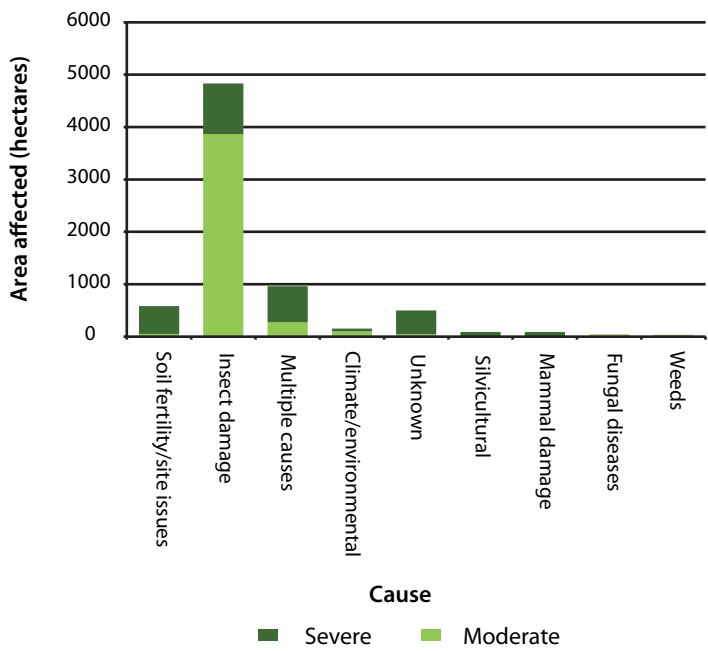
This year, the health program detected that a number of mid-rotation plantations have a proportion of trees with copious gum bleeding and underlying gum-vein and pocket defects in the wood. The phenomenon appears to be restricted to *Eucalyptus globulus*. Preliminary investigation suggests the injury was the result of water stress that developed during the unusually warm and dry conditions experienced in the 2012/13 summer.



(L-R) Forestry Tasmania's Rob Crellin and Sean Boucher working to eradicate ragwort on Bruny Island.



**The main health problems causing moderate or severe damage in established eucalypt plantations on Permanent Timber Production Zone land**



**Leaf beetle management program**

Forestry Tasmania has a long-established integrated pest management program to control leaf beetle (chrysomelid) pests, which can cause severe defoliation damage to plantation eucalypts. The integrated pest management program puts an emphasis on monitoring population levels prior to any control actions being undertaken. This has been shown to be an effective and economical way of managing the problem, while using the least amount of insecticide possible.

Forestry Tasmania monitored 13,454 hectares for insect damage this year, focusing our efforts on plantations that, historically, show the highest risk of damage. The monitoring revealed that leaf beetle activity was unusually low compared with the previous few years. Only 1,543 hectares was assessed to have above-threshold populations, compared to 6,137 hectares in 2012/13. The lower area with above-threshold populations was at least partly due to increasing the integrated pest management threshold level for most plantations.

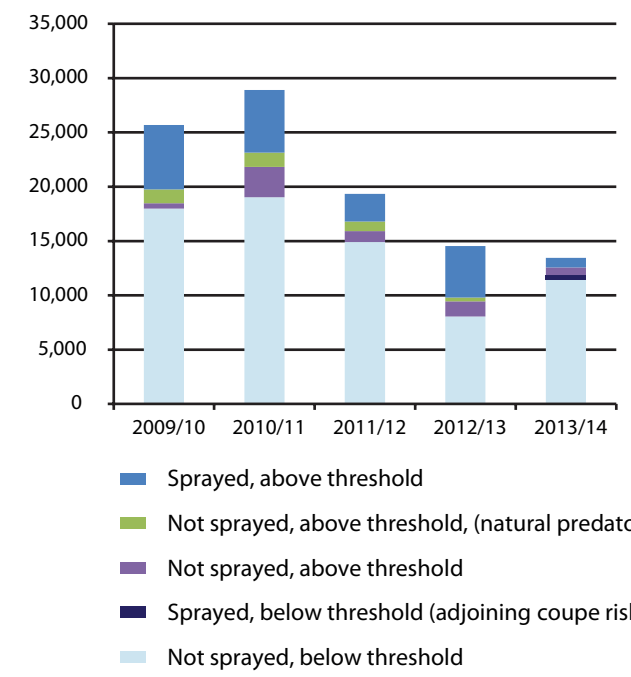
Leaf beetle control operations were only conducted across 1,402 hectares this year, which is significantly lower than in recent years. The majority of coupes controlled had above-threshold populations, while some coupes that were still below threshold were treated when neighbouring above-threshold coupes were controlled.

Intensive management of some mid-aged plantations in the north east highlands, to assist them recover from poor crown density, has continued with further adjustments to the integrated pest management program. Good crown

recovery has been achieved throughout the majority of affected plantations. The area reported to be suffering from severe, chronically poor crown density has improved from 3,728 hectares in 2012, to 688 hectares this year.

Research conducted during the year has increased our understanding of the life history of the leaf beetle *Paropsisterna selmani*, which rapidly emerged to become the major pest species last year. We found that although *P. selmani* developed more quickly than the leaf beetle *P. bimaculata*, the most important difference with *P. bimaculata* was its earlier commencement of egg-laying and smaller egg batches. The consequences of these differences are still to be understood.

**Leaf Beetle IPM: Summary of monitoring outcomes**



# sustaining CARBON STORES, CLEAN AIR, WATER AND HEALTHY FORESTS

## Pesticide use

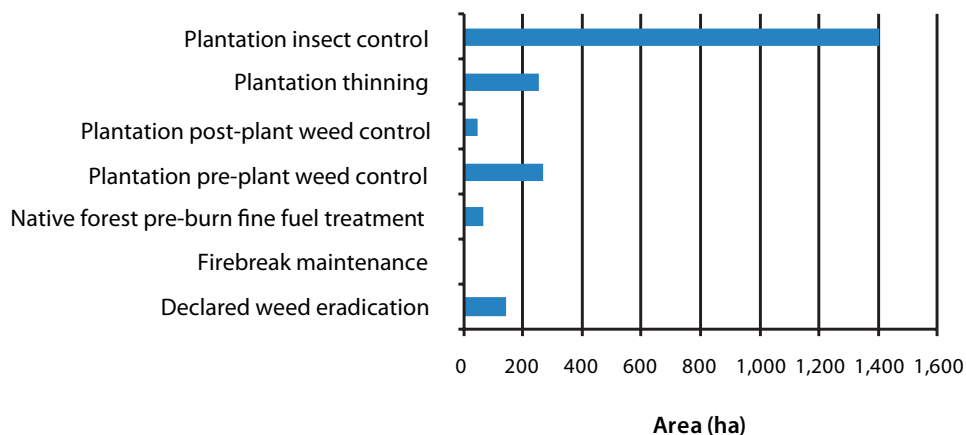
Forestry Tasmania uses pesticides where it is impracticable to use alternative methodologies for achieving forest management objectives. All chemical applications are conducted in accordance with regulatory requirements. In 2013/14, we applied chemicals to 2,045 hectares of forest, compared with 5,270 hectares in 2012/13.

The majority of the 2013/14 pesticide application area (1,402 hectares) was for the purposes of insect control to prevent defoliation by leaf beetles in plantations. Forestry Tasmania's integrated pest management approach (refer previous page) ensures that insecticide use is limited to situations where insect populations are high, and the threat of economic damage is real. This year, we used 32 litres of alpha-cypermethrin active ingredient for the purposes of insect control.

## Herbicide use

In 2013/14, we applied herbicides to 781 hectares. Forestry Tasmania uses herbicides for a range of reasons, including to improve conditions for seedling growth at the time of forest establishment, to conduct non-commercial thinning operations in younger plantations, to control declared weeds, and to maintain firebreaks. In 2013/14 we applied 1,277 kilograms of herbicide active ingredient in both liquid and granular form. The majority of active ingredient used (93 per cent) was glyphosate. Details of other pesticides and chemicals used are provided in Appendix 2.

## Area subject to pesticide applications



Forestry Tasmania's forest nursery at Perth used approximately 47 kilograms of active ingredient for the purpose of controlling weeds and fungi in containerised seedlings.

## Fuel and chemical spills

We have set procedures in place for managing fuel and chemical spills. We record all accidental spills of fuels or chemicals in our Corrective Action Request system, and manage them to ensure that the potential adverse environmental effects are minimised. We notify the Department of Primary Industries, Parks, Water and Environment of spills greater than 20 litres.

There was one reportable spill for the year. This related to an emergency landing undertaken by a contracted helicopter pilot, during which a helitorch carrying 200 litres of gelled unleaded petrol was jettisoned. The helitorch was

damaged in the fall, resulting in the petrol leaking out onto surrounding grassy vegetation. The petrol was disposed of by safely burning it on site. No long-term environmental damage is expected to arise as a result of the incident.

We had one major chemical overspray event for the year, when we conducted an insect control operation on a non-target plantation. The incident did not result in breaches of riparian areas, but led to an incursion into an eagle management exclusion zone. The incident was an error by Forestry Tasmania staff, having briefed the contracted helicopter pilot on the area that was incorrectly sprayed. The event was detected during routine operational review, which triggered an incident investigation and resulted in changes to procedures surrounding communication and briefings with contractors.



Photo courtesy Nigel Richardson

## Bushfire response

As a land manager, Forestry Tasmania is obliged to control and extinguish unplanned bushfires that occur on Permanent Timber Production Zone land. There are many causes of bushfires, including lightning, arson and carelessness. Lightning causes only a small proportion of the fires recorded as occurring on Permanent Timber Production Zone land, with the majority being caused by people.

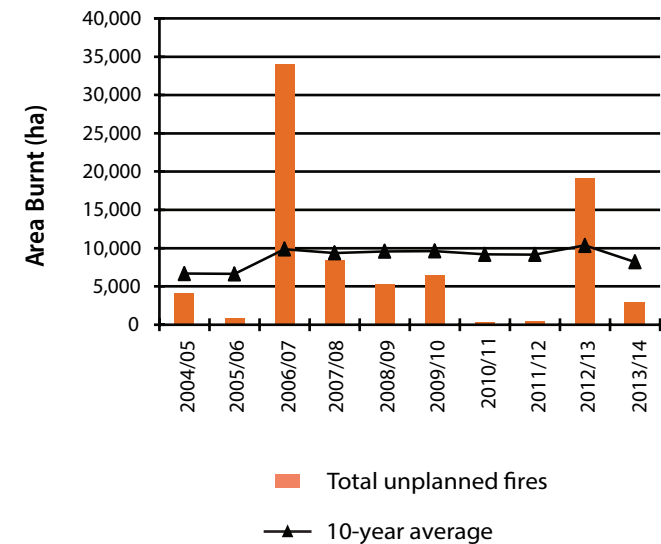
Despite a cool start to summer, the 2013/14 fire season was warm overall with some hot days in January and February. For most of the State, rainfall was below average during summer, returning to average levels during autumn. Several days of strong and damaging winds were recorded early in the season.

The 2013/14 fire season was relatively quiet, with the season's major bushfire event occurring near Zeehan on the west coast, where a group of five lightning strikes caused bushfires that burned over 5,400 hectares. The Parks and Wildlife Service managed these fires, with Forestry Tasmania providing significant support in accordance with the Inter-Agency Fire Management Protocol.

A total of 34 unplanned bushfires burnt approximately 2,900 hectares of Permanent Timber Production Zone land during the 2013/14 season. The area burnt in 2013/14 was 12 per cent of the 10-year rolling average of 24,677 hectares. Over the 2013/14 season, fire suppression activities cost Forestry Tasmania just under \$3 million. We also contributed 12,262 working hours for suppression activities during the season. These included:

- 982 hours of staff deployment to the October 2013 Blue Mountains fires in New South Wales;
- 9,100 hours of general firefighting activities for crew members, strike team leaders, heavy tanker drivers and tree fellers;
- 1,100 hours worked in incident management teams as incident controllers, and in planning roles such as mapping, resourcing and fire behaviour prediction;
- 950 hours of divisional or sector command;
- 100 hours of air operation management; and
- more than 30 hours of aerial fire mapping, including specialist night vision goggle work.

**Area burnt on Permanent Timber Production Zone land by unplanned fires**



# sustaining SAFETY, COMMUNITY ACCESS AND HERITAGE



## Health and safety

For the second year in a row, all nine safety and workers compensation performance measures for staff were met. This is a highly commendable effort, particularly given the challenges faced by the organisation.

We sustained three lost time injuries during the financial year, equalling last year's historic low number. With an overall reduction in 'worked hours', the Lost Time Injury Frequency Rate increased to 5.10, which was the second-lowest figure on record.

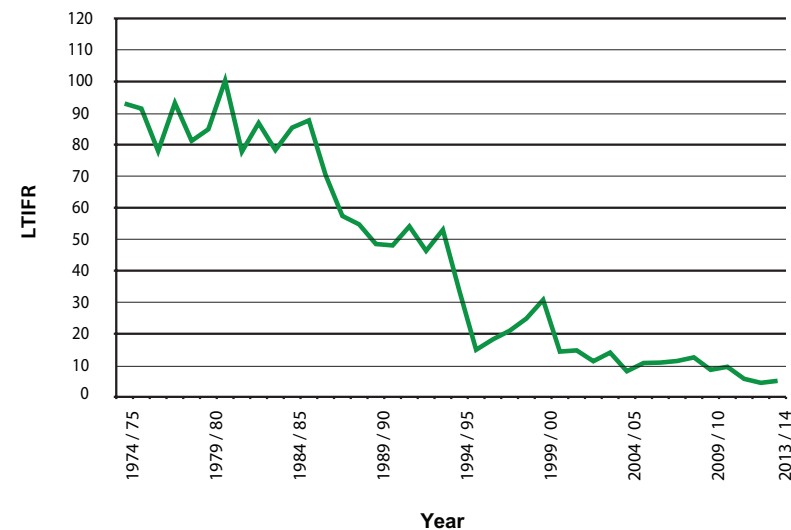
Forestry Tasmania continues to promote a positive approach to safety, focusing individual workers' attention on staying safe at work. We have renewed our ongoing commitment to the Safety Circle® program by organising a refresher course, which will be delivered to all staff in the second half of 2014.

We also continued with a health and wellbeing program in 2013/14. In excess of 160 staff signed up to the program, participating in individual health assessments and regular consultations, as well as attending short presentations on various health and wellbeing themes. While the program provider experienced difficulty in maintaining regular contact with some staff due to Forestry Tasmania's dispersed operations, overall results are starting to improve. Of particular note is a reduction in blood pressure – in October 2013, an alarming 84 per cent of participants were assessed as pre-hypertensive or above. However, in the most recent report in February 2014, this had reduced to 69 per cent.

Forestry Tasmania's certification to Australian and New Zealand Standard 4801: Occupational Health Management Systems remains in place following the required surveillance audits.

Regrettably, our harvesting and haulage contractors had a difficult year with ten lost time injuries resulting in a Lost Time Injury Frequency Rate of 14.3. Consequently, we have developed a strategy, which will be implemented throughout 2014/15, to improve contractor safety. This includes an ongoing program of education and mentoring, plus regular safety management system and site audits. Additional initiatives will incorporate an increased focus on safety responsibility training and regular safety communication from Forestry Tasmania.

## Staff long-term safety performance as measured using the lost time injury frequency rate (LTIFR)



### Workers compensation

Forestry Tasmania received a record low number of 13 workers compensation claims during 2013/14. Fortunately, many of the injuries were less serious in nature, with 62 per cent of new claims finalised and closed within the financial year.

The Cost of All Claims was under target by 51 per cent. The final total of \$64,103 for 2013/14 is by far our lowest total on record.



Our purchase of the Eagle Glide at the Tahune AirWalk proved to be a worthwhile investment during 2013/14.

### Forest tourism

Forestry Tasmania's major tourism attraction is the Tahune AirWalk. This venture also incorporates the Forest and Heritage Centre at Geeveston. Forestry Tasmania also has 50 per cent interest in the zipline attraction at Hollybank Forest Reserve, although this is managed by a private company.

During 2013/14, in accordance with legislated land tenure changes, Forestry Tasmania divested operational responsibility for the Eagles Eyrie at Maydena, which was transferred to the responsibility of the Tasmanian Parks and Wildlife Service.

The Tahune AirWalk received close to 70,000 visitors for the year. The AirWalk's performance was on trend with the Huon Trail route and indicative of the tourism market's move to more frequent but shorter holidays in Hobart, and reduced touring in the regions.

Our marketing to Asian visitors was successful, and we also increased our focus on groups and the Tasmanian market. The Forest Friends Card, which provides Tasmanian residents with free admission to the AirWalk when accompanied by one or more paying guests, proved to be very effective in encouraging local visitation.

We also focused on improving the average spend per visitor in food and beverage and retail, as well as on improving our cost of sales. This has resulted in much-improved revenue and profitability in these segments.

The Eagle Hang Glider, which was purchased in 2012/13, has proven worthwhile over the past 12 months. While we

had to spend a significant amount in 2013/14 getting the infrastructure to a safe operating standard, this investment will prove its value in the coming year.

Looking forward to 2014/15, our focus will be on creating a new website, improving accessibility and content, and continuing to use television advertising in the local area. We are also exploring avenues for strengthening the brand and potentially adding more soft adventure activities to enhance the visitor experience.

### Land and property management

The *Forest Management Act 2013* gives Forestry Tasmania statutory responsibilities for management and control of all Permanent Timber Production Zone land, and consequently, for the granting of all permits, licences, forest leases and other occupation rights. The Act enables Forestry Tasmania, on behalf of the Crown, to grant easements over Permanent Timber Production Zone land for such purposes and upon such terms and conditions as Forestry Tasmania determines.

Forestry Tasmania agrees to leases, licences and easements with commercial businesses, non-commercial organisations and government entities for many purposes including telecommunications towers, weather stations, pipelines, electricity transmission lines and dams. There are 553 current leases, licences and easements on Permanent Timber Production Zone land, with approximately 180 presently in various stages of negotiation.

# *sustaining* SAFETY, COMMUNITY ACCESS AND HERITAGE

## **It's all downhill for Hollybank mountain bike development**

A long-held proposal for Forestry Tasmania's Hollybank Forest Reserve, near Launceston, to be the focus of a mountain biking facility was realised during 2014.

In 2005, United States-based mountain biking expert Joey Klein prepared a plan for a series of tracks at Hollybank and on the lower slopes of nearby Mount Arthur.

Initial applications for external funding to develop the tracks identified in the plan proved unsuccessful. However, in 2012, Northern Tasmanian Development picked up the project, along with more tracks near Derby and on the Blue Tier, for inclusion in a submission for Regional Development Australia funding.

Being 'shovel ready,' the Hollybank component attracted State Government funding ahead of a decision on the Regional Development Australia application, and work started in early 2014.

The 25-kilometre network of tracks is due to be ready to ride by October 2014.

The development will add to the reputation of Hollybank as a hub for recreation and adventure tourism after the opening of the Hollybank Treetops Adventure zipline in 2007. The Hollybank mountain bike experience will be an introduction to the tracks further east, also now under construction, on land now under Parks and Wildlife Service management at Derby and the Blue Tier.

## **Forest Activity Assessments**

Where compatible, Forestry Tasmania encourages the use of Permanent Timber Production Zone land for uses other than wood production. Third parties regularly approach us to obtain permission for an array of proposed activities. These activities include recreational events, film production and scientific research, as well as construction of communication towers and visitor facilities, and the establishment of new apiary sites. As the forest manager, Forestry Tasmania has a responsibility to manage these activities and ensure they do not compromise the values of Permanent Timber Production Zone land. To achieve this, each proposed activity is assessed to ensure a range of natural, cultural and social values are not compromised, and that any potentially detrimental effects are either mitigated or avoided. Forestry Tasmania conducted 74 activity assessments during the 2013/14 year.

## **Aboriginal and historic cultural heritage**

In 2013/14, Forestry Tasmania commenced consultation on a number of issues with the Aboriginal community, particularly regarding the development of our Aboriginal Cultural Heritage policy and Access to Traditional Materials policy. Forestry Tasmania also continued to work with Aboriginal Heritage Tasmania to continue to improve management of Aboriginal heritage on Permanent Timber Production Zone land.

With respect to managing cultural heritage, we undertake archaeological surveys as part of our pre-harvest assessment of special values. These surveys may detect new sites, or

re-detect old sites that had no contemporary map reference. Once we find archaeological sites, we assess and protect them as necessary. These sites may include artefact scatters, former mines, tramways, huts, boilers and old mill sites.

This year, we found four new non-Aboriginal heritage sites for which we implemented appropriate management prescriptions. We found no new Aboriginal cultural heritage sites.

## **Stakeholder engagement**

### **Stakeholder engagement strategy**

Forestry Tasmania recognises that, to do our job well, we need to engage effectively with all of our stakeholders. We have previously engaged with many of our stakeholders as a regular part of doing business, but we acknowledge that there are areas in which we need to improve. We are therefore improving our communication in order to better meet the needs and expectations of stakeholders.

During 2013/14, we developed a stakeholder engagement strategy to guide our staff, and to clearly communicate to our stakeholders what they can expect from Forestry Tasmania. The strategy describes how and when Forestry Tasmania will engage with its stakeholders, and aims to:

- Ensure we are aware of and respect the needs and expectations of our customers, neighbours, staff and the wider community.
- Obtain valuable insights and input that will assist in achieving our business objectives.

- Ensure we are aware of, and can respond promptly to, issues of concern before they become more significant problems.
- Develop and maintain open, trusting relationships with our stakeholders.
- Build understanding, trust and support for what Forestry Tasmania does.

This strategy also sets out:

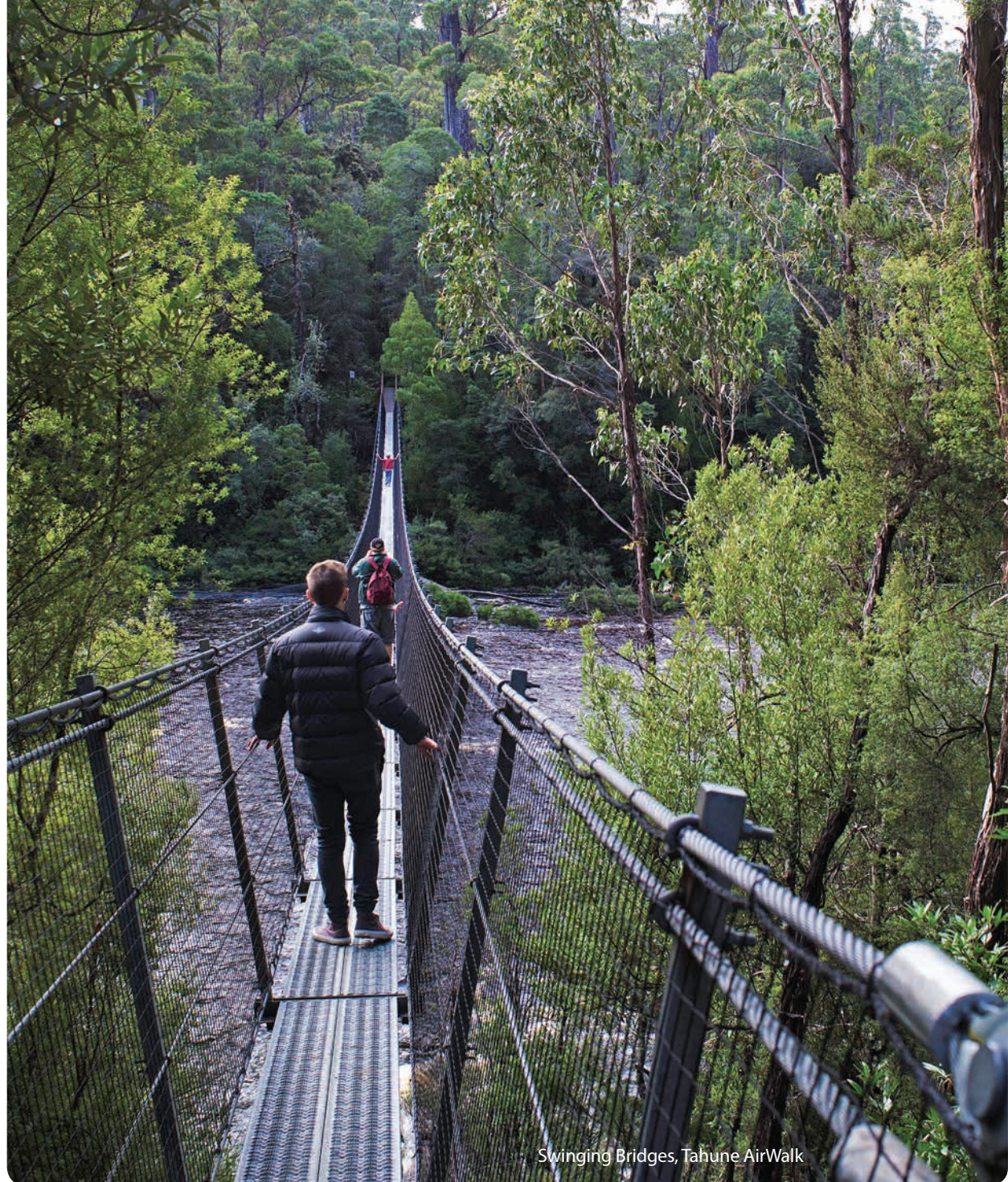
- our basic approach to stakeholder engagement;
- with whom we engage;
- how we engage; and
- how we will improve our engagement.

Over the coming year, Forestry Tasmania will fully implement the stakeholder engagement strategy across the business.

In 2013/14, Forestry Tasmania also adopted new stakeholder engagement software to assist in ensuring that issues raised by stakeholders were recorded, consistently dealt with, followed up and reported. The system was rolled out across the organisation in October 2013 and, from that time, we recorded 799 separate interactions with 1,670 distinct stakeholders. A breakdown of stakeholders is provided in Appendix 2.

#### Stakeholder Engagement Strategy

[http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/stakeholder\\_engagement\\_strategy\\_2014.pdf](http://cdn.forestrytasmania.com.au/uploads/File/pdf/pdf2014/stakeholder_engagement_strategy_2014.pdf)



Swinging Bridges, Tahune AirWalk

# *sustaining* SAFETY, COMMUNITY ACCESS AND HERITAGE

## **Ningher canoe - a journey of discovery at Dark Mofo, June 2014**

### **Jen Murnaghan, Producer**

*The ningher canoe project was never simply about making a canoe. It was about a journey, both physically and metaphorically, a journey that could acknowledge deep and profound loss, of recovery, relationships, healing and struggling to regain control, of what it takes to make a journey in the hope of becoming culturally whole once more.*

Fiona Hamilton – cultural producer and artist, 21 June 2014

Brendan Brown and Jamie Everett, both residents of Cape Barren Island, were invited to build a ningher canoe for Dark Mofo 2014.

Ask either one of them where their ability to master the complicated process of crafting a ningher (paperbark), or tuylini (stringybark) canoe according to the ancient traditions of their ancestors came from, and they are likely to stare deep into your eyes and bring their fist to their chest with the words "...from in here mate." This is the Tasmanian Aboriginal culture of today.

With the assistance of Forestry Tasmania, Buck and Jamie travelled to Smithton where a coupe was opened to collect paperbark tea tree, a specific species required for its naturally waterproof properties.

According to Brendan, the north west of the State has the largest supply of swamp tea trees in Tasmania. Thanks to Forestry Tasmania's enthusiastic assistance, we were able to procure enough to build the canoe.

The build took place on site at MONA in Berriedale, where reeds were collected from the river foreshore and tightly packed to create the buoyancy required.

Once dried and set, the paperbark surrounded the central hull to create a natural waterproof coating, tied together with native laurel and string made from reeds.

Visitors were invited to discuss the construction and experience living culture in practice.

Tasmanian Aboriginal people were honoured to feel the love of the broader community as we undertook this poignant and important cultural step in recovering our precious culture.

We built and launched a ningher, a canoe, and for a short time it graced the waters of the Derwent River. For a short time, people saw the passion in our hearts for practising our culture. There would never be failure, only a journey of discovery.

The canoe project stands as a powerful achievement for all of us. For Tasmanian Aboriginal people, the project was a big step forward, and although the journey may be painful for some, full of risk and expectation not realised at times, it is also a journey of hope, beauty, strength, healing and spirit.

The journey is ours, and we are proud to have honestly shared it. What this journey has meant to others is not for us to say, but we are listening. We look forward to taking small steps together, honestly, and in the spirit of becoming whole once more.

*ningher comes out of country,  
wherever there is paperbark, reeds and water  
ningher waits.*

*Without water they would not be made.*

*Culture that draws them out of the bush  
always for a journey. Each unique.*

*Hands that shape, bend, tie.*

*ningher is formed from country*

*ningher is country.*

– Gregory Lehman, Cultural Narrator, 28 May 2014

### **Project credits:**

Brendan 'Buck' Brown, Senior Master Canoe Maker

Jamie Everett, Tasmanian Aboriginal Artist

Greg Lehman, Cultural Narrator

Fiona Hamilton, Tasmanian Aboriginal Cultural Producer and Artist

Kartanya Maynard, Tasmanian Aboriginal Vocalist

Jen Murnaghan, Producer





(L-R) Senior master canoe maker Brendan Brown and artist Jamie Everett working on the ningher canoe at MONA, June 2014

# *sustaining* SAFETY, COMMUNITY ACCESS AND HERITAGE

## **Branchline**

Our e-newsletter, *Branchline*, was used to communicate with approximately 4,000 stakeholders in Tasmania, mainland Australia and overseas. It was published on a flexible schedule, in response to emerging issues and to keep stakeholders informed about upcoming events such as open days. We produced 10 issues of *Branchline* in 2013/14, which was the same number as in the previous year.

## **Going Bush**

Forestry Tasmania again participated in the *Going Bush* television series, which provides information about the Australian forest industry. The program, now in its seventh season, was produced in cooperation with a range of other forest industry participants. The program airs nationally on the 7Two network, and locally on the Southern Cross network. Forestry Tasmania has decided not to participate in future seasons of this program.

## **Forest education**

Forestry Tasmania continued its sponsorship of the Forest Education Foundation, which operates the National Forest Learning Centre at our Head Office in Hobart. The centre is a focus for school groups to learn about forests and forest management.

We also continued working in partnership with the Forest Education Foundation in delivering our open days, which ran during the school holidays and delivered a range of fun and informative activities related to forests and forest management.

## **Forestry Tasmania contributes to Schools Tree Day**

Students around Tasmania once again took part in Schools Tree Day during 2014, with widespread plantings of native trees and shrubs made possible by donations from Forestry Tasmania.

Part of Planet Ark's annual National Tree Day, Schools Tree Day provides students with the opportunity to learn about the environment by planting and caring for native trees and shrubs. The initiative links to many areas of the school curriculum, including maths, science and the arts.

This year marked the seventh year that Forestry Tasmania supported Schools Tree Day. Forest Nursery Assistant

Manager Carlton Cox estimated that some 65,000 seedlings have been provided to schools and community groups over that time.

"This year, 7,000 seedlings of 20 different species, including many less common eucalypts, were supplied.

"Our range includes plants from a variety of environments, so that suitable species were available for milder coastal areas through to the colder central regions of Tasmania.

"The shade and natural environment they will create will make schools even more pleasant places to be."

Students not only help with planting the seedlings, but also with the ongoing care as they grow into maturity.



Minister for Resources, Paul Harriss, and Forestry Tasmania's Jacob Gaul help out at Lindisfarne Primary during Schools Tree Day.

## Right to Information

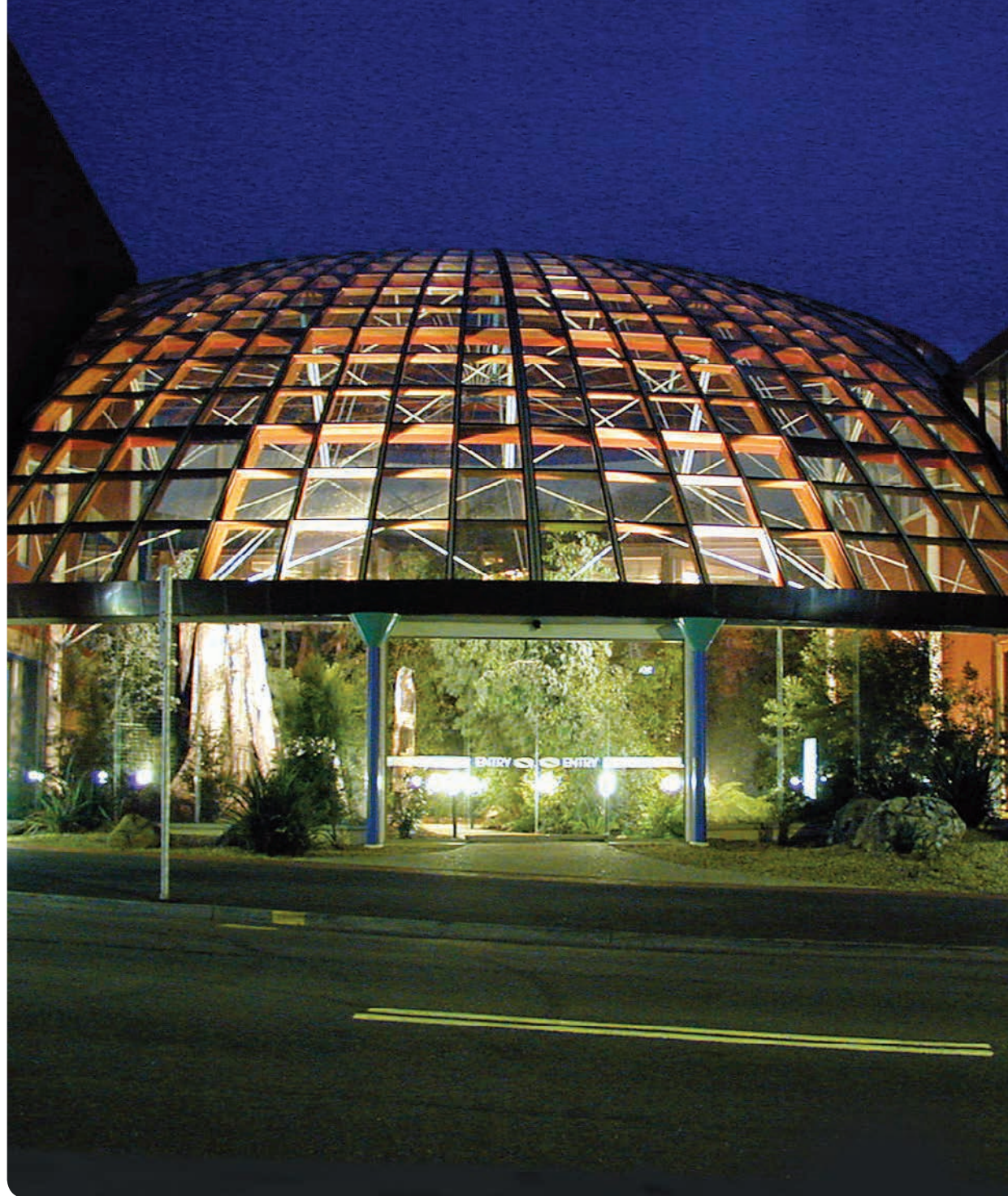
The *Right to Information Act 2009* places significant emphasis on pro-active disclosure of information without the need for stakeholders to make formal applications. In response to formal requests, it also provides for active disclosure, which is the voluntary release of information, and for an enforceable right to information under assessed disclosure, unless some of the information sought is exempt under the Act.

In 2013/14, we continued to pro-actively release information via our website and to the media. Forest Practices Plans remained available for purchase via our online shop, and will now be provided online free of charge.

During the year, we also received five applications for assessed disclosure, which was a decrease on the previous year's total of six. In accordance with our internal policy, all finalised applications for assessed disclosure, with the exception of those relating to personal information, were uploaded to our website.

## Ministerial support

The Office of the Minister for Resources received 15 letters or other forms of correspondence regarding Forestry Tasmania in 2013/14, which was a significant decrease on the 27 received in the previous year. The major issues raised in this correspondence were Forestry Tasmania contracts and water catchment management associated with forest harvesting.





# *sustaining* SCIENCE-BASED STEWARDSHIP

## Legal compliance

### Forest Practices Act

All forest operations must be carried out according to a certified Forest Practices Plan. Plans contain specifications for harvesting, road works and reforestation activities, which must comply with the Forest Practices Code.

The Code requires special provisions to protect natural and cultural values, including flora, fauna, geomorphology, soils and water, cultural heritage and visual amenity.

The forest practices system emphasises high environmental standards through planning, training and education. Where problems arise, corrective action, including the remediation of damage, takes place. This is followed by review, analysis and improvement of systems to ensure that similar errors do not occur in the future. Where the problem is considered serious, legal enforcement is applied in a number of ways. This includes verbal or written notification by a Forest Practices Officer, which is issued under Section 41 of the Forest Practices Act. The Forest Practices Authority may also prosecute or issue fines for failure to comply with certified Forest Practices Plans.

The Forest Practices Authority issued one fine of \$500 to Forestry Tasmania this year. The fine related to a plantation thinning operation that did not comply with the certified Forest Practices Plan. During the contractor briefing, Forestry Tasmania staff mistakenly instructed the harvesting crew to harvest a part of the plantation that had been explicitly excluded from the plan for machine accessibility reasons. When the issue was identified, Forestry Tasmania

self-reported the incident to the Forest Practices Authority. A full investigation resulted in several system modifications, including an update of coupe handover procedures. No environmental damage arose from this incident.

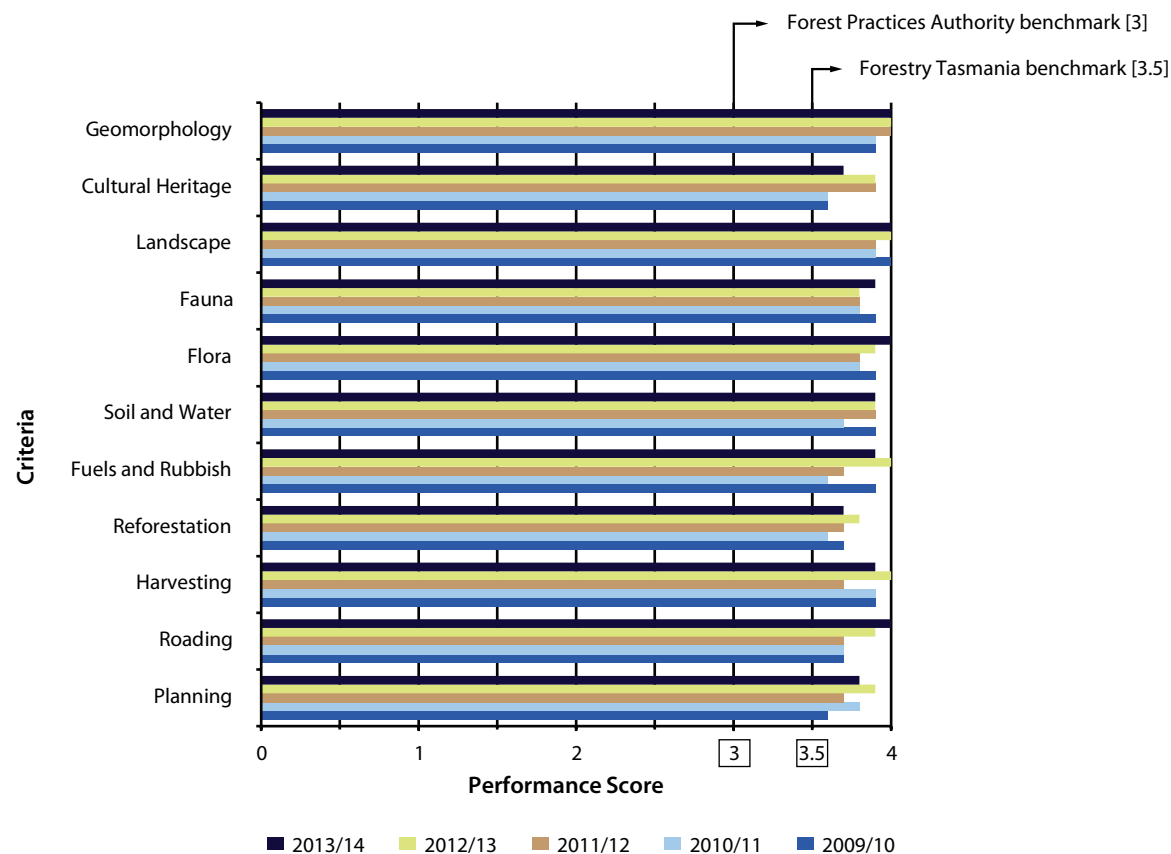
Forestry Tasmania issued two Section 41 notices to its harvesting contractors for the year. Both of these notices were issued for the same operation, one relating to the harvesting of a section of a stream reserve, and the other to an excavator working and stacking logs in a machinery exclusion zone. In both cases, Forestry Tasmania notified the Forest Practices Authority, which conducted a full investigation.

The Forest Practices Authority undertakes an independent annual audit of a representative sample of Forest Practices Plans. The audit examines environmental management during forest operations at various stages of completion. In addition to the assessment of operational performance, the audit checks the standard of the plan, including all assessments and procedures required by the forest practices system.

The Forest Practices Authority audit examined 19 Forest Practices Plans developed by Forestry Tasmania. We scored an average rating of 'above sound' on all 11 criteria examined, which met our internal benchmark. There were no follow-up investigations required as a result of these inspections, which was a good outcome. The only minor issue identified was the need for more accurate wording around regeneration prescriptions in some Forest Practice Plans.

For more information on the Forest Practices Authority's regulatory mechanisms refer to [fpa.tas.gov.au](http://fpa.tas.gov.au)

**Our environmental performance measured by the Forest Practices Authority over the past five years**



**Audit public summary reports**  
<http://www.forestrytas.com.au/forest-management/afs-public-summary-reports>

**Work Health and Safety Act**

In the 2013/14 financial year, Forestry Tasmania was issued with two *Work Health and Safety Act 2012* enforcement notices by WorkSafe Tasmania. One Section 195 prohibition notice and one Section 191 improvement notice were issued, both relating to our mechanical workshop in Smithton. Corrective actions were implemented and WorkSafe Tasmania closed both notices within one month of issuing them.

**Certification**

Forestry Tasmania's sustainable forest management performance is independently audited against the requirements of three voluntary certification standards: the Australian Forestry Standard (AS 4708), Environmental Management Systems (AS/NZS 14001), and Occupational Health and Safety Systems (AS 4801). These certifications are very important to us as they provide our customers and stakeholders with an assurance that the management systems underpinning our compliance with standards are operating effectively.

Our auditing body conducts regular surveillance audits of our systems, to check that we are continuing to comply with the standards. We had one surveillance audit in 2013/14 that found no non-conformances with the respective standards.

# sustaining SCIENCE-BASED STEWARDSHIP

## Forest Stewardship Council certification

2013/14 saw Forestry Tasmania continue its progress toward achieving Forest Stewardship Council certification. Major undertakings this year included compiling a new draft Forest Management Plan, conducting a high conservation value assessment, and appointing a certifying body, which conducted a pre-assessment on our operations.

We developed our current Forest Management Plan in 2008, with an intended 10-year lifespan. Since that time, there have been many changes to Forestry Tasmania's business and our operating environment that have necessitated an earlier-than-expected update. The development of the revised Forest Management Plan has involved extensive stakeholder consultation. We undertook initial consultation with key stakeholders on the criteria and objectives upon which the plan is based, and followed this up with extensive public consultation on a consultation draft of the plan. The draft plan was available for public comment for in excess of three months and we received many valuable submissions, which will help us to shape and finalise the Forest Management Plan in late 2014.

The high conservation values assessment is a critical component of the Forest Stewardship Council certification process. The Forest Stewardship Council standard requires that organisations undertake an assessment to identify areas containing high conservation values, and to develop and implement management actions to maintain and/or enhance these values.

Forestry Tasmania undertook an extensive and detailed approach to identify high conservation values and developed a Consultation Draft High Conservation Value Assessment and Management Plan. This draft Management Plan was also available for public comment for in excess of three months, and we received valuable feedback that will be considered in the development of the final plan in late 2014.

In March 2014, our certifying body conducted a preliminary assessment, which was an initial gap analysis of our compliance against the Forest Stewardship Council Forest Management and Controlled Wood standards. The preliminary assessment identified a number of modifications to our current forest management system that will be required in order for us to meet the standards.

Forestry Tasmania will undertake a full assessment audit against the Forest Stewardship Council standards in early December 2014.

## Research and development

Forestry Tasmania maintains a small group of scientists and technicians who focus on a number of research and development programs of direct relevance to Forestry Tasmania. The research group contributes to many programs, including but not limited to: management of the forest health program, the leaf beetle integrated pest management program, management of the plantation and native forest quality standards systems, and conducting research that underpins our silviculture and landscape context planning systems. Forestry Tasmania scientists also manage the internationally recognised Warra Long-Term Ecological Research site.

During 2013/14, our research staff authored 17 technical reports and 14 peer-reviewed papers, contributed two book chapters, delivered 12 conference presentations and maintained the Warra Long-Term Ecological Research site.

The transfer of knowledge from research to field practice is an essential component of our scientists' work. Field days with operational staff last year were held on the leaf beetle integrated pest management, alternative regimes for plantations, plantation pruning and waste thinning, *Phytophthora cinnamomi* and weed management, and on partial harvesting in high-altitude and dry forests.

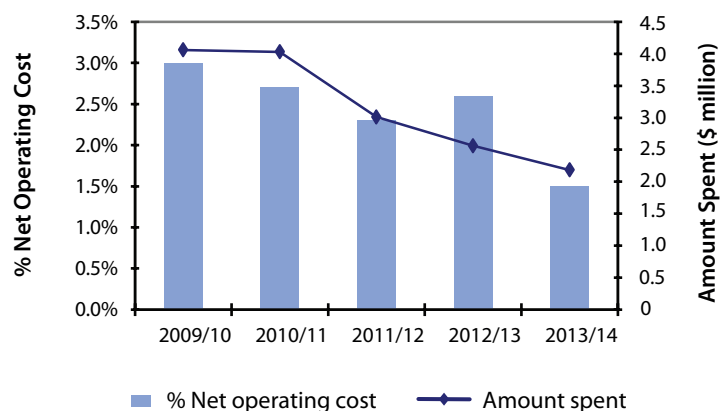
Forestry Tasmania's difficult trading conditions over the last few years have resulted in a decrease in the amount of research funding that the organisation can provide on its own. The current poor environment for developing collaborations and obtaining external research funding

compounds this problem: the Cooperative Research Centre for Forestry was wound up recently, the CSIRO forest research arm is being reduced, and the National Centre for Future Forest Industries has no apparent source of future funding.

Despite the poor research funding environment, our scientists have been successful in obtaining some external funding for several projects that are important to Forestry Tasmania. Funds have been received from the National Collaborative Research Infrastructure Strategy for maintaining the carbon flux tower and conducting other work at Warra, and an Australian Research Council grant for work supporting research into Forestry Tasmania's approach to managing biodiversity has also been obtained. Forestry Tasmania recognises the importance of its research and development group and continues to support its work where possible.

The Research and Development group's annual report, which highlights work for 2013/14 and identifies future work, is provided in Appendix 3.

**Amount spent annually on research as a percentage of Forestry Tasmania's operating cost**



### Resources information systems

Forestry Tasmania's business is heavily dependent on comprehensive, relevant and up-to-date information on the forest resource. We have a group of staff that are responsible for collecting and providing this information, and for maintaining the underlying systems for delivery and storage of the information to operational staff. In recognition of a reduced organisation size, we are concentrating on moving to lower-maintenance and more modern systems for delivering this information.

One of the key developments for the year was the release of a test version of our new web-based geographic information system browser, which will be used for interrogating data and producing maps. This software is timely, given that our present system is no longer supported by its provider.

The LiDAR remote sensing project continued throughout the year. The acquisition program has nearly been completed, with only a few uncaptured areas remaining in the north west and the central highlands. Consequently, the focus of the LiDAR project has now moved from acquisition to delivery, with the aim of maximising the data's value beyond its present use in coupe and infrastructure planning. We have started to develop the first iterations of LiDAR-based forest inventory, and will continue to refine these tools in consultation with our operational staff. Further work is planned to broaden both the access to, and application of, LiDAR-derived data.

### External commercial services

Forestry Tasmania's external commercial services entity, Forestry Services International, continues to sell its expertise into the market in Tasmania, interstate and internationally.

In 2013/14, Forestry Services International's revenue was \$250,000. Consultancies primarily continued to be in its traditional areas of LiDAR terrain mapping, eucalypt tree breeding, silvicultural research for a project in China, forest yield modelling, and forest health surveillance. Plantation valuation work was also undertaken for the first time. Forestry Services International's client list included Australian and international forestry companies, councils, utility corporations and government agencies.



# sustaining SCIENCE-BASED STEWARDSHIP



The Forest Nursery's Peter Moore grafting superior radiata pine specimens, which will be planted in tree orchards in New South Wales.

## Forest Nursery at Perth diversifies

With safety vest instead of surgical gown you probably wouldn't mistake nursery manager Peter Moore for a medico, but hovered over the grafting table he wields the scalpel as deftly as a surgeon.

The Forest Nursery at Perth diversified into providing a tree grafting service in June 2014, and Peter now fulfils orders for Timberlands Pacific and the Forestry Corporation of New South Wales.

The orders will increase the two organisations' stocks of superior selections of radiata pine (*Pinus radiata*) trees.

"These are some of the best trees in Australia, for growth, form and timber qualities," he says, with a touch of pride.

The grafted trees are distributed around several orchard sites in NSW, with some kept to enrich the stocks already held at Perth.

They are managed in orchards to provide seed for the production of seedlings, some of which will be planted at higher-elevation sites.

"Our disease-free status means we can send plant material interstate, so that's a big advantage.

"The grafting is a tricky, time-consuming job, but it's the best way to build up the traits you want in trees relatively quickly," Peter says.

The grafting service is just part of the diversification the Forest Nursery has been going through in 2014.

One of the other innovations has been to lease an unused area of the nursery to propagate strawberry and raspberry plants, which are then distributed to commercial growers.

## Organisational capacity

Forestry Tasmania's key strategic human resources issue is the maintenance of appropriate levels of skills and experience in the face of budgetary constraints. During the reporting period, we reduced our staff head count by approximately 16 per cent, from 351 on 30 June 2013 to 295 on 30 June 2014. This equates to 252 full time equivalent staff. This reduction occurred through natural attrition, and through 43 staff moving to the Department of Primary Industries, Parks, Water and Environment following the implementation of the Tasmanian Forests Agreement.

Our reduced land base and changed focus has seen the need for an organisational restructure. 2013/14 saw production activities transfer away from a four-district approach to a two-region approach, in order to make better use of our resources and to improve our customer supply capacity.

The majority of Forestry Tasmania employees' conditions of employment are covered by an enterprise agreement. The current agreement, Forestry Tasmania Enterprise Agreement Number 3 of 2012, has a completion date of 9 October 2014. In cooperation with unions, Forestry Tasmania reached agreement to provide a two per cent pay increase for employees from 1 April 2014 and to commence negotiations around a new enterprise agreement. Forestry Tasmania aims to attain certification from the Fair Work Commission for this new or varied enterprise agreement in the coming financial year.



### Recognising long-serving employees

In December 2013, the organisation recognised a number of long-serving employees who had reached 40-year, 35-year and 25-year milestones with Forestry Tasmania. Awards were presented at end of year celebrations held at the district offices and Head Office. The employees had served Forestry Tasmania for a combined total of 460 years.

### Training and development

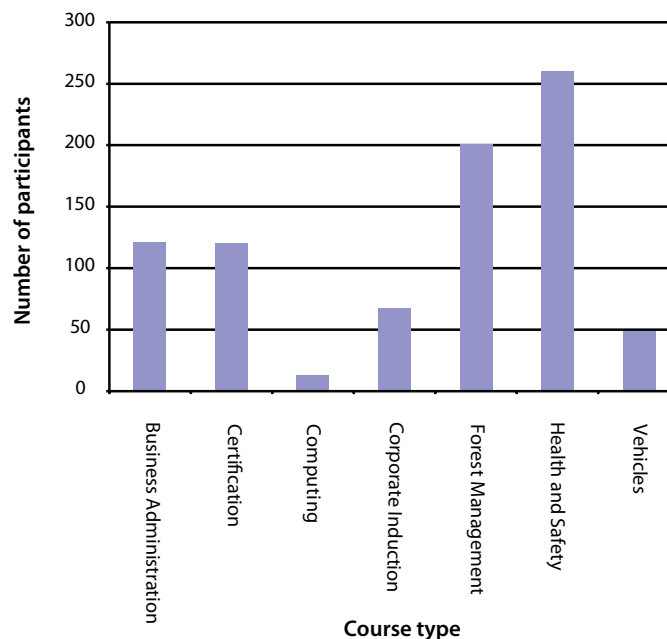
Forestry Tasmania's Training and Development unit continued to facilitate the training of employees and external clients, maintain and improve our training systems, and operate our Registered Training Organisation.

During 2013/14, Forestry Tasmania staff underwent 14,130 hours of training, covering a range of disciplines such as crash-free driving, forest management and health and safety.

Forestry Tasmania's Registered Training Organisation is accredited to provide training and assessment against nationally recognised competencies. We maintain a small pool of 'trainer and assessment' qualified staff to facilitate the delivery and assessment of these competencies.

During 2013/14, Forestry Tasmania's Registered Training Organisation issued 69 nationally recognised qualifications and enrolled 51 new learners.

Number of staff who underwent training this year



### Safety review arrangements

As part of its commitment to continuous improvement in safety, Forestry Tasmania has an extensive communication, consultation and review process. This commences with Toolbox meetings, which are attended by all staff, and proceeds through to the statewide Safety and Environment Group, which meets monthly. In addition to this, the Board Environment Safety and Health Subcommittee meets quarterly to review and monitor implementation of policies, procedures and management systems, and to recommend the direction for improvement in safety and health management. The Subcommittee is the peak body for review of the Forest Management System, and reports of the Board of Forestry Tasmania.

A photograph of a forest path with tall trees and ferns. The path is made of dark gravel and leads through a dense forest of tall, thin trees. The ground is covered with green ferns and other forest floor vegetation. The sky is visible through the canopy of the trees.

## where to FROM HERE?

Listed below are some of the challenges and priorities we will be striving to achieve in 2014/15, to ensure we continue to deliver on our organisational objectives:

### **Sustaining biodiversity and habitat**

- Finalise a High Conservation Value Management Plan.
- Achieve our landscape metric targets and continue to refine and promote our Landscape Context Planning system in consultation with the Forest Practices Authority.
- Ensure effective transfer of Permanent Timber Production Zone land to other agencies in accordance with legislative requirements.
- Continue to assist other organisations and agencies in restoring harvested areas in areas no longer managed by Forestry Tasmania.

### **Sustaining jobs for current and future generations**

- Meet financial performance targets as agreed with shareholder ministers.
- Meet all contracted and negotiated customer wood supply commitments.
- Make available at least 137,000 cubic metres of high-quality sawlog.
- Continue working towards securing new markets and implementing alternative uses for lower-grade forest products.
- Continue working with our industry partners to develop a Tasmanian-based Hardlam manufacturing plant.
- Contribute to the development of an overall strategic plan for the Tasmanian forest industry.
- Continue our hardwood plantation pruning and thinning program to maximise future sawlog production.
- Produce 11,300 cubic metres of special species timber, and conduct at least 12 tenders for special species logs.
- Continue work on product recovery studies in the hardwood plantation resource.

### **Sustaining carbon stores, clean air, water and healthy forests**

- Maintain our forest health surveillance program and leaf beetle integrated pest management program.
- Maintain our commitment to the Coordinated Smoke Management Strategy.
- Maximise our contribution to the Statewide fuel management program.
- Maintain sufficient fire fighting resources and continue contribution to the Inter-Agency Fire Management Protocol.

### **Sustaining safety, community access and heritage**

- Deliver refresher training in safety culture to all staff.
- Implement new safety strategy for harvest and haulage contractors.
- Promote a positive staff culture through better communication and by developing a survey that benchmarks staff satisfaction.
- Fully implement our stakeholder engagement strategy.
- Revise website and refine online interactive map viewer to enable stakeholders to more easily access information about Forestry Tasmania and its operations.

### **Sustaining science-based stewardship**

- Undertake a formal assessment against the Forest Stewardship Council's Forest Management and Controlled Wood standards.
- Finalise and release a new Forest Management Plan, which will incorporate a new set of corporate objectives.
- Complete the LiDAR data acquisition program.
- Complete the special species resource assessment project.
- Attain certification from the Fair Work Commission for a new or varied staff Enterprise Agreement.
- Work with contractors to build and maintain the required capacity and capability to effectively carry out forest operations.



# GLOBAL REPORTING INITIATIVE CONTENT INDEX

This report has been self-assessed as complying with level C disclosure of the Global Reporting Initiative.

GRI Ref.	Profile Disclosures	Reported	Location within this report
<b>Strategy and analysis</b>			
1.1	CEO statement.	Fully	Message from the Chairman and Chief Executive Officer
<b>Organisational profile</b>			
2.1	Name of the organisation.	Fully	Business overview
2.2	Primary brands, products, and services.	Fully	Business overview
2.3	Operational structure.	Fully	Our organisation
2.4	Headquarters location.	Fully	Our organisation
2.5	Countries of operation.	Fully	Our organisation and p.53
2.6	Nature of ownership and legal form.	Fully	Business overview
2.7	Markets served.	Partially	Sustaining jobs
2.8	Scale of organisation	Fully	Year at a glance table
2.9	Significant changes during the reporting period regarding size, structure, or ownership.	Fully	Message from the Chairman and Chief Executive Officer Forest legislation and policy
2.10	Awards received during the reporting period.	Fully	Hardlam (Wood products)
<b>Report parameters</b>			
3.1	Reporting period.	Fully	Reporting structure and scope
3.2	Date of most recent previous report.	Fully	Reporting structure and scope
3.3	Reporting cycle.	Fully	Reporting structure and scope
3.4	Contacts.	Fully	Contact us (page 1)
3.5	Process for defining report content.	Partially	Reporting structure and scope
3.6	Boundary of the report.	Fully	Reporting structure and scope
3.7	Limitations of the scope or boundary of the report.	Fully	Our organisation Reporting structure and scope
3.8	Basis for reporting on joint ventures, subsidiaries, leased facilities, outsourced operations, and other entities that could affect comparability.	Partially	Reporting structure and scope
3.10	Explanation of the effect of any restatements of information provided in earlier reports.	Fully	Reporting structure and scope
3.11	Significant changes from previous reporting periods in the scope, boundary, or measurement methods applied in the report.	Fully	Reporting structure and scope
3.12	GRI content index.	Fully	GRI content index

GRI Ref.	Profile Disclosures	Reported	Location within this report
<b>Governance, commitments and engagements</b>			
4.1	Governance structure.	Fully	Corporate governance
4.2	Indicate whether the chair of the highest governance body is also an executive officer.	Fully	Corporate governance
4.3	State the number of members of the highest governance body that are independent and/or non-executive members.	Fully	Corporate governance
4.4	Mechanism for shareholders and employees to provide recommendations or direction to the board.	Partially	Corporate governance
4.14	List of stakeholder groups engaged by the organisation.	Partially	Community engagement
4.15	Basis for identification and selection of stakeholders with whom to engage.	Partially	Community engagement

# GLOBAL REPORTING INITIATIVE CONTENT INDEX

GRI Ref.	Performance Indicators	Reported	Location within this report
<b>Economic</b>			
EC1	Economic value generated and distributed, including revenues, operating costs, employee compensation, donations and other community investments, retained earnings, and payments to capital providers and governments.	Fully	The year at a glance Appendix 1: Financial statements
EC8	Development and impact of infrastructure investments and services provided primarily for public benefit through commercial, in-kind, or pro-bono engagement.	Partially	Sustaining safety, community access and heritage
<b>Environmental</b>			
EN3	Direct energy consumption by primary energy source.	Fully	Our Carbon emissions
EN4	Indirect energy consumption by primary energy source.	Partially	Our Carbon emissions
EN5	Energy saved due to conservation and efficiency improvements.	Partially	Our Carbon emissions
EN11	Location and size of land owned, leased, managed in, or adjacent to, protected areas and areas of high biodiversity value outside protected areas.	Fully	Reserve system
EN14	Strategies, current actions, and future plans for managing impacts on biodiversity.	Fully	Biodiversity
EN16	Total direct and indirect greenhouse gas emissions by weight.	Partially	Our Carbon emissions
EN23	Total number and volume of significant spills.	Fully	Fuel and chemical spills
EN28	Monetary value of significant fines and total number of non-monetary sanctions for non-compliance with environmental laws and regulations.	Fully	Legal Compliance
EN29	Significant environmental impacts of transporting products and other goods and materials used for the organisation's operations, and transporting members of the workforce.	Partially	Our carbon emissions
<b>Social</b>			
LA1	Total workforce by employment type, employment contract, and region.	Partially	Organisational capacity
LA6	Percentage of total workforce represented in formal joint management-worker health and safety committees that help monitor and advise on occupational health and safety programs.	Partially	Health and safety
LA7	Rates of injury, occupational diseases, lost days, and absenteeism, and number of work-related fatalities by region.	Partially	Health and safety
LA10	Average hours of training per year per employees	Partially	Organisational capacity
SO1	Nature, scope, and effectiveness of any programs and practices that assess and manage the impacts of operations on communities, including entering, operating, and exiting.	Partially	Community engagement, air quality

# sustainable FOREST MANAGEMENT POLICY

Forestry Tasmania is a State Government Business Enterprise with the fundamental statutory responsibility to manage the Permanent Timber Production Zone of Tasmania's public forests. We will manage these forests using best practice to create long-term wealth, employment and social benefits for Tasmanians.

Under this policy, Forestry Tasmania will:

- Operate in an environmentally, socially and economically responsible manner.
  - Actively engage with stakeholders.
  - Strive to maximise recovery and value of our forest products.
  - Implement measures that minimise waste and prevent pollution.
  - Undertake and support research that will ensure that operational practices are underpinned by sound science.
  - Meet or exceed relevant legislation and other requirements subscribed to by the organisation.
  - Maintain a forest management system and conduct forest management in a manner that is certified to be compliant with ISO 14001, AS 4801 and the Australian Forestry Standard.
- Commit to and actively work towards long-term incorporation of Forest Stewardship Council Principles and Criteria into the Forest Management System.
  - Develop objectives and targets that assist in achieving the strategic aims and goals outlined in the *Sustainability Charter* (Forest Management Plan).
  - Ensure that staff and contractors have sufficient information, skills, training and resources to implement this policy.
  - Regularly monitor, audit, review and publically report on our performance.
  - Commit to continual improvement in our sustainability performance.
  - Communicate this policy and make it publically available.



Steve Whiteley  
Chief Executive Officer  
August 2013

# contents APPENDIX 2 – SUSTAINABLE MANAGEMENT DATA TABLES

## Appendix 2

Sustainable Forest Management data tables – contents below  
[www.forestrytas.com.au/uploads/File/pdf/pdf2014/sustainable\\_forest\\_management\\_appendix\\_2014.pdf](http://www.forestrytas.com.au/uploads/File/pdf/pdf2014/sustainable_forest_management_appendix_2014.pdf)

The tables in this Appendix support the statements made in the main report and provide a more detailed view of long-term trends.

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Forestry Tasmania