

ForWood - March 2014

Welcome to the March issue of ForWood.

I hope 2014 is progressing well for you and your business. I hope 2014 is progressing well for you and your business. I hope 2014 is progressing well for you and your business. I hope 2014 is progressing well for you and your business. I hope 2014 is progressing well for you and your business.



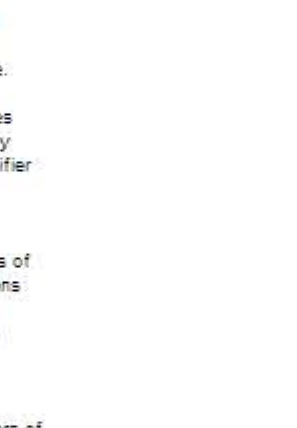
In this issue, I particularly draw your attention to two news items, the [prefabricated timber ground floor system](#) and the [new data dashboard resource for levy payers](#). These exciting projects are typical of the technological developments and new service offerings FWPA aims to provide to our members and the industry as a whole. I hope you enjoy reading this issue of ForWood and, as always, I welcome your feedback.

Ric Sinclair
Managing Director, FWPA

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LATEST NEWS

Industry levy: Voluntary contributions matching funds



New Federal Government legislation has been passed to allow a wider range of FWPA R&D projects to receive matching funding from the Federal Government when jointly funded by industry via voluntary contributions.

As many of you will be aware, FWPA receives funds from the Australian Commonwealth Government on a dollar-for-dollar basis, when the Company invests in research, development and extension (RD&E) or other activities nominated by the Government from time to time.

To date, this matching has only applied to funds provided by FWPA from the compulsory levies on forest growers, wood processors (except pulp and paper) and importers and the income derived from agreements with State owned forestry bodies.

One of the recommendations arising from the Productivity Commission's review of the Research and Development Corporations was to allow Government matching for voluntary contributions to qualifying projects, up to a defined level.

The new Government re-introduced legislation to this effect in to Parliament, which was passed by the Senate on 12th December 2013.

However, at this stage the specific regulations required under the Forestry Marketing and Research and Development Services Act 2007 to manage the arrangements for voluntary matching have not been enacted.

In the meantime, FWPA is proceeding to establish robust systems and procedures for the management of voluntary contributions and Commonwealth matching funds that are transparent, accountable and consistent with the strategic goals of the Commonwealth Government and the Company.

INDUSTRY PROMOTION

Looking for new customers? WoodSolutions could be your answer



In an era where finding new customers is an increasingly fragmented and expensive process, the success of the timber and wood products industry website – [www.woodsolutions.com.au](#) – offers a new attractive and cost effective alternative for suppliers of wood and wood products.

A recent analysis of visitor statistics using a year-on-year comparison for the WoodSolutions website, shows a 32% increase of traffic to the Supplier Listings pages of the site.

The increase in visitor numbers to the supplier listings pages suggest that this should be an opportunity of interest to any company or organisation wishing to reach the building specifier market including architects, building designers, engineers, developers, builders and quantity surveyors.

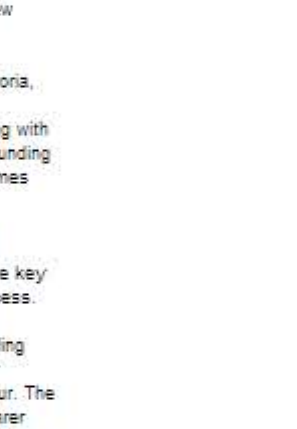
"Currently the top supplier listings have received thousands of page views" said Eileen Neubury, Marketing Communications Manager for FWPA, "and that's especially valuable to our suppliers because those page views come from a qualified audience of specifiers who are actively seeking product information."

Supplier listings are free to Members and Associate Members of FWPA. Full membership is free to levy payers. Associate Membership – including a free supplier listing providing access to the thousands of specifiers visiting the WoodSolutions website – is \$500 a year.

"It's inexpensive compared to advertising in specialist trade or building media – a full year on WoodSolutions can cost many times less than a full page ad in a print magazine," said Eileen, "it's a cost effective way to reach a tightly targeted market."

More information about membership is available from the [FWPA website](#).

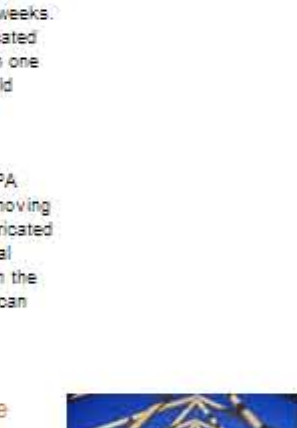
2014 Australian Timber Design Awards



Now in its 15th year, this WoodSolutions sponsored event is a platform for the rebirth of the Planet Ark/Environmental Edge, Wood, Naturally Better.[™] television advertising campaign in April 2014.

Part of a total budget approaching \$700,000, the television schedule will run in major metro and regional markets and be complemented by online video at popular news and entertainment websites. The online element of the campaign is expected to generate exposure to more than 400,000 'unique browsers'.

View the Planet Ark/Environmental Edge, Wood, Naturally Better.[™] television spot [here](#).



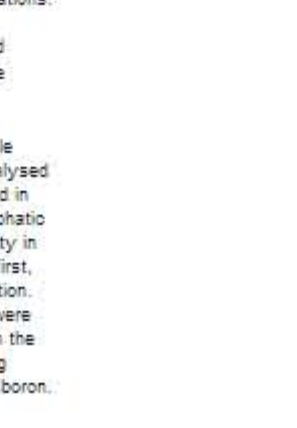
WoodSolutions Seminar Sponsorships and Technical Presentations

To grow awareness of the WoodSolutions program among specifiers, FWPA sponsors and supports various seminars in each State.

New South Wales and Victoria
Four half-day seminars, in Sydney, Paramatta, Canberra and Victoria were well attended by architects, building designers and engineers. Titled, "Essential Exterior Timber Design" the events combined presentations by both WoodSolutions and industry experts.

Queensland & Western Australia
A series of seminars and tutorials are planned for the first quarter of 2014.
WA: Friday 14th March (Perth) and Tuesday 18th March (Bunbury): Roof Construction Practice & Performance - Greg Meachem
QLD: Tuesday 1 April: latest practices, products and innovations (co-presented with the Australian Timber Flooring Association)

WOOD: art design architecture



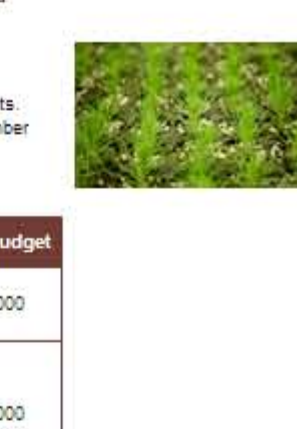
Wood, Naturally Better.[™] is the Principal Sponsor of WOOD: art design architecture, a two year touring exhibition developed by Adelaide's Jam Factory in collaboration with the Adelaide Botanic Gardens. It features 28 exhibitors and a 247 page catalogue.

The exhibition explores innovative and outstanding ways that artists, designers and architects in Australia are using wood.

WOOD: art design architecture has now closed in Bathurst and has moved to the Lake Macquarie City Art Gallery in NSW, where it is running until April 28th.

The tour itinerary
[Lake Macquarie City Art Gallery](#), Lake Macquarie, NSW
14 Feb – 28 April 2014
[QUT Art Museum](#), Brisbane, QLD
9 May – 6 July 2014
[Kirk Arts](#), Cairns, QLD
18 July – 14 September 2014
Objekt: Australian Design Centre, Sydney, NSW
4 October – 14 December 2014

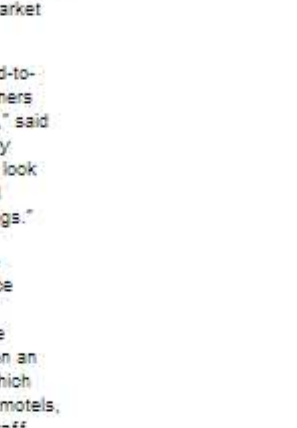
Planet Ark: Make it Wood and Certification Forum



Planet Ark's Make it Wood campaign is progressing well. Discussions with various Councils and more recently the Melbourne City Council on a 'Wood First' policy have been well met and will be progressed over the coming months.

Plans are underway for a Certification Forum to be held in June 2014. The forum will focus on identifying the barriers and strategies to promoting wood and paper certification. To assist in developing an event that is relevant and helpful to all stakeholders, a short survey was distributed on 5th February 2014. The results were encouraging and indicated solid support for the Forum.

Do you need a ForestLearning School Presentation Kit?



Many FWPA members are asked to speak at local schools about the forest and wood products industry. As part of the ForestLearning program FWPA has created a school kit that includes a presentation, classroom activities, videos and posters.

If you conduct school presentations and are interested in finding out more please contact the Project Manager, Tania Crosbie Tania@suatimelibrary.com.au or 0412 145624

RESEARCH DEVELOPMENT & EXTENSION

Proposed CRC bid



FWPA has taken the lead in developing a bid for a cooperative research centre (CRC) in the sector focussed on optimising the manufacturing sector to better suit the known quantity and quality of existing forest resources.

Support and encouragement has been received from the R&D community for FWPA to advance a CRC bid, although to be successful, the bid will require significant cash and in-kind support from industry.

The proposed CRC will focus on initiatives to improve the international competitiveness of existing manufacturing facilities and to assist in the deployment of a new generation of wood fibre technologies. The working title for the bid is the *CRC for Transforming Wood Fibre*.

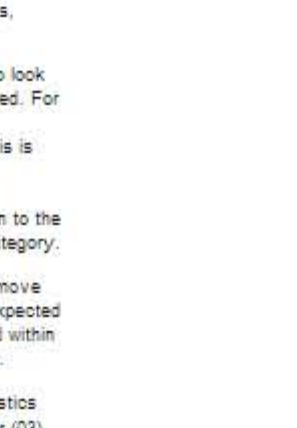
While much of the detail is still to be worked through with R&D and industry partners, it is hoped that a successful CRC will deliver on four key goals:

- A robust value chain for the growing and processing of Australian wood fibre resources to maximise international competitiveness and attract new investment
- Better understanding of the materials and customers for key markets, especially in the built environment of 2030 and beyond
- Decision support tools to assist in the optimisation of existing and new products that capture key variables and outputs along the full value chain
- The next generation of technically skilled experts that can help assist the industry make the transformation in its products and markets

The bid is being led by Dr Chris Lafferty, FWPA's R&D Manager, and he can be contacted directly at chris.lafferty@fwpa.com.au or (0422) 373 399.

PROJECT REPORTS & UPDATES

Call for FWPA R&D research proposals closes



FWPA's November call for expressions of interest for R&D projects proposals closed on 28 February. A total of 22 proposals was received, all targeted at addressing the current active industry investment plans. The plans provide details of the expected industry outcomes and a guide as to the available level of funding within each identified priority.

The project proposals will now be assessed by the relevant Industry Advisory Groups with applicants to be advised of the outcome by the end of April. Successful bids may commence later this calendar year.

Walking on wood: an economical prefabricated timber ground floor system

Everyone loves a timber floor in a home, it's warm, welcoming and good to walk on, and now it's incredibly fast and economical to install. An FWPA funded research project has developed a practical solution: a prefabricated lightweight timber ground floor system that includes prefabricated timber floor panels and the 'stumps', that support the floor on the footings. To take the product to market, a new Market Implementation Group (MIG) has been created, facilitated by the Frame & Truss Manufacturing Association (FTMA).

A key component of the new prefabricated ground floor initiative is that frame and truss (F&T) manufacturers supply builders with the whole package: design, fabrication and installation. The system was designed to be as simple as possible and only use existing components that are readily available, it had to be structurally excellent, economically competitive and also fit onto the back of a truck for easy transport from any factory where the panels would be made. In essence, the prefabricated ground floor package effectively provides what the concrete slab sector offers builders - the delivery of a working surface, on a specific site, on a specific date for a specific cost - one contract. Installation is a new concept for many F&T manufacturers but for those innovative companies looking for market differentiation it provides a major business opportunity.

The pre-fab package has a number of benefits over the concrete slab-on-ground construction method that dominates new urban developments throughout Australia. A proportion of new housing is being built on constrained sites with sloping blocks, on reactive clays with high seasonal moisture movement, or low lying flood prone areas. A major advantage of the raised timber floor is that it can be easily adjusted in the future if there is ground movement due to soil conditions, while flooding can pass underneath. These constrained sites provide the main opportunities for the new prefabricated ground floor systems where, apart from clearly being a better construction practice, real financial benefits and savings can also be demonstrated. The initial aim is to start winning back this market share – the low hanging fruit. It is estimated in Victoria alone that each 1% market share gain equates to between \$2.5M – \$3.4M in new sales of timber products.

The MIG consists of thirteen F&T manufacturers from Victoria, Queensland and New South Wales; the major nailplate manufacturing companies MiTek, Fryda and Multinail; along with a number of major building product supply companies co-funding the MIG including: CHH, Hyne, ITI, Meyer Timber, and James Hardie.

The MIG members have confirmed their commitment to a structured and careful market introduction and identified the key priority activities needed to maximise market take up success. Already a number of trials have occurred in real-world building sites, including one builder installing the prefabricated floor systems over his basement garage/studio in under one hour. The remainder of his floor was built using traditional stump, bearer and joist construction (84 stumps in all) over the following weeks. The builder observed that if he had only used the prefabricated floor system the whole floor would have been completed in one day, and with prefabricated wall panels and trusses he could have had the house to a fully framed stage within a week.

The project is an excellent example of structured industry engagement and collaboration in commercialisation of FWPA R&D outcomes. It also provides an exciting first step in moving the timber industry towards a more systems based prefabricated and panelised approach to future residential and commercial construction – one where industry can capitalise not just on the products they produce but the value-added services they can deliver to the customer.

Structural Engineer's Timber Design Software Review and Recommendations

A key tool that structural engineers rely upon in the design of non-residential or commercial building sector is structural analysis software. This software predicts the behaviour of structures and building components. The widely used structural analysis software available to engineers is dominated by concrete and steel information. For the timber industry to compete in the non-residential or commercial building sector, suitable software that includes timber information has to be readily available.

While software is used regularly for timber in domestic residential applications, there has been a lack of knowledge on suitable software for non-residential or commercial building applications. A 2010 survey of 30 structural engineering firms across Australia found that 70% of the engineers surveyed said that they were either likely or very likely to specify more timber in non-residential projects if there was a readily available structural analysis software package, which incorporated current timber and engineered wood product properties, and provided a check against compliance to AS 1720 Timber Structures – Design Methods Standards.

Many engineers expressed uncertainty about AS 1720, as they are not frequent users of this Standard, so in turn lacked confidence in specifying timber. A software program that checks against the Standard in a transparent way would substantially reduce engineers' risk in designing with timber and engineered wood products. In time, it would also increase comfort in the specification of timber.

The survey pointed to a wide range of timber engineering and design software programs being available, but they have not been taken up by general structural engineers. In general this is because lack of awareness of the software amongst structural engineers.

The review recommends that FWPA help to publicise and promote existing timber specific structural design and analysis software to structural engineers through FWPA's WoodSolutions program. The review also recommends that after a period of time, structural engineers should be surveyed on their software preferences to measure any change in usage. If the survey shows structural engineers are not using the existing available software program, FWPA could consider developing a generic timber Standards/Code checking compliance with AS 1720 software module that could be incorporated into the most common structural analysis software.

Analysis of long term productivity and productive capacity of a radiata pine plantation on infertile fine textured soils

For the continued productivity and profitability of pine plantations through future rotations it is vital that growers have a true understanding of the balance of the production of timber, carbon take up, water use and other values occurring in their plantations. As a result, this long term study measured changes in productivity, productive capacity, carbon accumulation and hydrology in pine (*Pinus radiata*) plantation sites from the 1980s and 1970s to the present.

The research focused on pine plantation plots in the Liddale State Forest about 130 km northwest of Sydney. Plots analysed during the first rotation (as early as 1961) were re-measured in subsequent rotations. Where significant quantities of phosphatic fertilizer had been applied in the second rotation, productivity in the second rotation was more than 30% higher than in the first, and had a residual effect on productivity into the third rotation. For plots where significant quantities of fertilizer nutrients were not applied, the second rotation productivity was lower than the first by 5–8%. This appears to be a result of nutrients being removed in harvesting, especially calcium, potassium and boron.

The research also found that the mature pine plantations accumulated 2.14 tonnes of carbon per hectare per year between ages 42 and 55 years, most of this was in the vegetation. The subsequent rotation accumulated carbon at a rate of 5.5 tonnes of carbon per hectare per year in the first 12 years of growth.

Measurements of water use found that as forests develop they use water and consequently runoff declines; then as productivity decreases as trees mature, runoff increases. The researchers suggest that to minimise the long term patterns of decreased and increased runoff, the pattern of harvesting (thinning and clearcut) and re-establishment should be planned so only a proportion of any larger catchment is affected in any year.

Completed projects

Each issue of ForWood will list the latest completed projects that have been updated to our website. Below are projects that have been completed since November 2013.

Project No.	Project title
PRA215-1011	Preparation of structural engineering software providers brief
PNC218-1011	Analysis of long term productivity and productive capacity of a radiata pine plantation on infertile fine textured soils
PNC220-1011	Utility of molecular breeding in forestry
PRE313-1314	Attendance Report from United Nations Climate Change Conference Warsaw 2013; Conference of the Kyoto Agreement Parties - COP19 (AFPA) PRE313-1314
PGD163-0910 (not available online)	Managing gene flow from Eucalyptus globulus plantations (University of Tasmania PhD - Matthew Larcombe)
PRA308-1213	Economic Analysis of Selected FWPA Projects 2013

New projects



Each issue of ForWood will list the latest approved projects. Below are projects that have been approved since November 2013.

Project (Research Provider)	FWPA invests	Total budget
Economic Analysis of Selected FWPA Projects 2014 (eSYS)	18,000	18,000
Attendance Report from United Nations Climate Change Conference Warsaw 2013; Conference of the Kyoto Agreement Parties - COP19 (AFPA) PRE313-1314	10,000	10,000
LCA and the Australian Forest and Wood Products Sector – A Discussion Paper (CSIRO Ecosystems Sciences) PRA315-1314	5,000	5,000

STANDARDS COORDINATION

Australia's building code change creates exciting new opportunities for timber framing



The culmination of three years work, orchestrated by FWPA, the Australian Building Code Board recently approved amendments enabling timber framing to be used on a far wider range of projects. The new regulations now permit the use of fire and acoustic rated timber-framed construction systems for 3 storey Class 3 buildings (e.g. hotels/motels) and broadens the market for timber. The amendment will apply from May 2014.

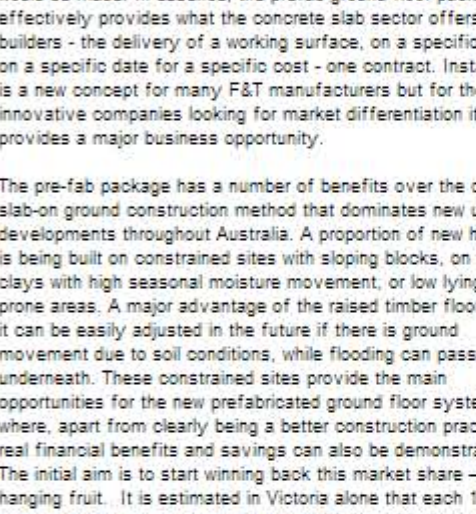
"This welcome change in the building code to allow deemed-to-satisfy solutions will provide architects and building designers with the opportunity to use more wood and wood products," said the University of Tasmania's Associate Professor Gregory Nolan, "hopefully this is the tip of the iceberg and we can look forward to more approved applications for traditional wood framing and new engineered wood products in taller buildings."

Australian designers and builders have to comply with the Building Code of Australia (BCA) that includes performance standards for different classes of buildings and specifies materials that have been tested and approved to meet the standards. Until now, 3 storey timber framing has not been an approved method of construction for Class 3 buildings, which covers a wide range of accommodation, including hotels, motels, hostels and residential parts of health-care facilities for staff accommodation.

The three-year process, which involved submissions by Forest and Wood Products Australia Ltd (FWPA), testing by fire engineers Exovia Warringtonfire and work by the Timber Development Association, led to the Australian Building Code Board approving the amendments in late 2013.

This is a step towards bringing Australia into line with the majority of overseas building codes, that allow deemed-to-satisfy solutions for much taller timber buildings, as shown in the table below.

FWPA's Codes & Standards program is continuing to address these restrictions, working with industry and regulatory bodies to broaden the market opportunities for both structural and non-structural timber products.

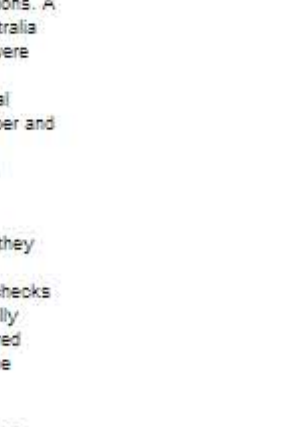


This is a positive development for our industry as designers and builders gain a broader material palette – and the option of bringing the environmental advantages of wood to more projects, while it's part of a market development process that will add substantial volume for Australian companies.

However, as the international comparison shows, there is still an enormous opportunity to increase the use of timber in taller buildings.

Read the alternative solution compliance resource for fire safe timber design project [report online](#)

Under development: AS 1604 Issues Paper



Industry concerns have been developing over several years in relation to the continuing suitability of Australian Standard AS1604: Specification for preservative treatment. FWPA has recognised these concerns need to be addressed and emerging ideas regarding service life design of timber elements and structures considered.

The AS 1604: Parts 1-5 series of Standards was revised in 2012. Typically these Standards have required revision when new or altered preservative formulations are introduced. The Standards have a direct de-facto regulatory role with respect to acceptable preservative formulations in that it is difficult to effectively market such products in Australia if they are not accepted and included in these documents. This is more relevant now with the recent removal of the NSW Timber Marketing Act 1977 (TMA).

Industry comment and criticism to date is somewhat anecdotal, inadequately defined and across a range of areas of concern. These include varying ideas about the concepts of performance versus prescription requirements, appropriate treatment levels and comparative performance of preservatives for a given Hazard Class, analysis methods, measurements of penetration and retention and product quality compliance.

Industry has acknowledged the important role of AS 1604 but it is signalling it is not confident that it is still appropriate for use into the future. In particular, how does this Standard fit into a service life design approach?

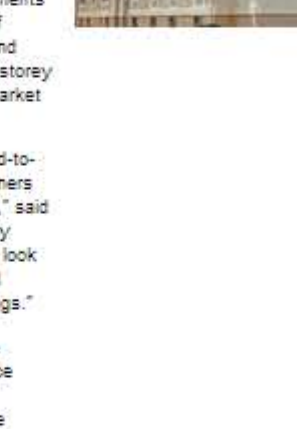
Clarification is needed regarding the type of Standard or Standards required to adequately address the relationship between the specification and sampling and analysing of preservative treatments and preservative treated timber (AS1804 and AS/NZS 1805) and the service life design of preservative treated timber elements and structures.

This project is to produce an Issues Paper as a catalyst for resolving industry concerns, both marketing and technical, and formulating an acceptable approach for standards development that will meet the needs of the industry, and the consumer, into the future.

For more information, please contact Boris Iskra, Standards and Building Codes Manager on boris.iskra@fwpa.com.au or (0407) 874 901.

STATISTICS & ECONOMICS

FWPA developing a new data dashboard resource for levy payers



The FWPA is moving to make available a range of information to improve industry sector knowledge through a data dashboard hosted on the FWPA website. The information will cover two broad areas including:

- Data which industry can generate; and
- Data in the public domain which can be consolidated in the one location

In terms of data which industry can generate progress has been made:

- Expanding the Softwood Timber Survey to cover more than 50% of monthly sales volumes
- A Hardwood Timber Survey is being developed to cover both sales volume and weighted average prices. This survey is expected to launch in April with participation from major saw millers covering some 80% of monthly sales volume
- Discussions have also commenced with growers about developing surveys for forest production, inventory and re-establishment rates

The aim is to make industry information and the public domain information available in a format that is accessible and relevant to FWPA levy payers. To do this through the webpage a "data dashboard" is being developed with data being collected at three levels and is expected to include:

- International (China, US, NZ, Exchange Rate Information, Trade Data)
- National (GDP, Credit Growth, Employment, CPI, Retail Sales, Car Sales, Housing Approvals, Housing Starts, Alterations & Additions, Construction measures)
- Industry (FWPA Industry Level Data Sets – Production/Sales, Inventory, Weighted Average Prices)

The dashboard will be structured to provide the capacity to look at key data sets and then examine specific data as required. For instance, an enquirer may be interested in the imports of sawmelter which is covered by HS Code 4407. In turn this is broken down into Coniferous Sawmwood 4407.10. Tropical Sawmwood 4407.2 and Hardwood Sawmwood 4407.9. The dashboard concept will then enable an enquirer to drill down to the specific 10 digit products that make up each aggregate category.

The dashboard concept should also provide the ability to move quickly between data sets where logical links exist. It is expected that work on the dashboard development will be completed within two months enabling a launch of the resource in April/May.

For more information, please contact Jim Houghton, Statistics and Economics Manager on jim.houghton@fwpa.com.au or (03) 9927 3240.