# Questions for consideration

## Vision and objectives

1. What should the vision be for the forest products sector in the coming decades?

To be a sector producing cellulose based products for society that, in a carbon constrained economy, are highly sought after and, as appropriate, used in preference to alternatives products - be it for building, energy/fuel, chemicals etc.

2. What specific objectives should underpin this vision?

**To achieve a greater degree of integration and collaboration along the forest products production chain** - from forest owners/managers, to harvesting contractors and log processors, to chemical engineers, architects, engineers, builders and research scientists. It is imperative that this be achieved in order to align, as much as possible, what we grow with what the market is likely to demand rather than grow what we have in the past and hope the market will want it in the future. The sector, collectively, needs to be more visionary.

Fundamental in achieving this more visionary approach requires a commitment to research greater than that we are currently experiencing. In particular, we need government (Federal and State) to make long term research funding commitments that underpin industry innovation and development and to view this as an investment in the economy that will yield positive returns and not simply as an expense. If governments want to support growth in the forest products sector it seems inappropriate to reduce funding on the basis that, from time to time, industry support for research reduces. At times of industry downturn, such as we are now experiencing, it is understandable that industry participants must view research expenditure as discretionary – if they don't they risk their very survival. The New Zealand example is appealing, where government commitment to forest industry / forest products research through Scion is laudable and in stark contrast to the reduced forestry and forest products research commitment of our CSIRO. Another objective is therefore: **To secure long term commitments, in particular from government, to funding for research to underpin innovation and development in the forest products sector.**

We often look at the Scandinavian forest products sector with envy, where forests and the diverse range of products and benefits derived from them are more universally acknowledged and appreciated by the community. Another objective is therefore: **To achieve a greater level of appreciation within the community of the diverse range of benefits that accrue to society from the forest products sector -> increased social acceptance of, and support for, the sector.**

Delivering the objectives above will enhance "market pull" which in turn will encourage the establishment of more plantations/woodlots and a greater level of active management of privately owned native forest.

This creates its own set of challenges for forest managers, in particular the issue of balancing competing land use pressures. Fallout from the MIS era is not helpful in this regard. Private land provides the primary opportunity for expanding forest estates to underpin an expanding forest products sector. The greatest opportunity now lies in the sensitive and sensible integration of trees into agricultural systems – Agroforestry – to supplement the existing broad acre plantation estates. The on-farm benefits of Agroforestry are reasonably well known but the uptake in Australia, compared to countries like to New Zealand, is relatively poor. Another objective is therefore:

**To initiate more work that delivers compelling financial evidence of the value that accrues to an agricultural system by the sensitive and sensible integration of (in particular) commercial trees into that system.**

It is time to break down the barriers that have long existed between agriculture and forestry and to convince more farmers that trees are an opportunity rather than a threat. Agroforestry is a "win-win" for agriculture and forestry – adding value to agricultural production, diversifying farm incomes and expanding the forest estate for industry.

## Issue 1: Market trends and pressures

3. What forest products does Australia have a local and/or international competitive advantage in producing?

If we envisage a forest products sector as described above, located on the doorstep of the growing Asian economies, Australia will be well positioned to be competitive across the broad spectrum of (still yet to be fully defined) cellulose based "products". To achieve this though, it is imperative that we strengthen our research capacity and engage with disciplines once thought to be unrelated to forest products (chemistry, engineering etc).

Australian forest practices are second to none. As markets progressively require more evidence of sustainably production, Australian forest products will become even more sought after.

4. What is the potential demand for forest products in the coming decades?

If international (rather than Australian) trends are any indication we can expect the demand for products to grow considerably. It is very likely that cellulose based products will be more widely used in ways previously unheard of and Australia is ideally located to tap into the growing Asian markets and a broadening domestic market as emerging products become more common place.

5. How can Australia best position itself for this demand, both nationally and internationally?

By adopting the vision and embracing the objectives outlined above. We need greater collaboration and focus along the forest products production chain, supported by appropriate research and a longer term visionary assessment of future markets. Currently the sector is too fragmented.

6. What are the other drivers or disruptions that will potentially affect supply and/or demand?

The ongoing impact of anti-forestry campaigners in the market place reducing market pull for the sector.

The tendency of governments to trade off production forest areas for reasons of political expediency. Ongoing partitioning of forest estates is not good for the forests and it threatens the viability of sustainable processing industries that rely on these forests and the security of the communities, often regional, that depend on these industries.

## Issue 2: Emerging uses and markets

7. Which emerging forest products have the greatest potential for Australia?

A difficult question to answer as yet because progress within Australia with the development of emerging forest products is (sadly) in its infancy. It is conceivable that engineered wood products for construction and wood pellets for industrial use (domestic and export) are likely to be successful in the relatively short term. The production of energy (power) from biomass is currently more questionable at a large scale but

CHP may have application at a local level – schools, hospitals, community swimming pools etc. and industrial clusters.

8. What are some of the barriers to the development and/or uptake of these emerging forest products in Australia?

Anti-forestry campaigners targeting end users pose a significant threat.

Lack of a focussed, cohesive, research based approach to the development of emerging forest products.

Argument over the use of native forest residues (pulpwood) for renewable energy.

9. What opportunities exist to better utilise wood resources?

Everything that can be made from a barrel of oil can be made from wood. New construction techniques using engineered wood products are proving that more energy efficient, cost competitive buildings, of considerable scale, can be constructed entirely from wood. New advances in 3d printing with cellulose fibres are reported on a regular basis. The opportunities appear to be endless. It's a matter of developing and refining the technologies and showing a willingness to pursue the opportunities they provide.

## Issue 3: Forest resources

10. What is required to ensure the plantation estate is able to meet future demand for forest products?

Estate development is a response to current and anticipated demand, albeit there is lag time. Confidence in the long term future of the forest products sector that will require feedstock from plantations and other forests will encourage the development and maintenance of an appropriate forest resource. Joint venture / share farming opportunities between plantation companies and farmers can have positive impacts.

11. What is required to ensure the native forest estate is able to meet future demand for forest products?

Strategies to combat the negative influence of anti-forestry campaigners in the market place.

Less partitioning of the native forest estate into "production" and "conservation" forests and a return to the application of the "multiple-use" forest management concept.

A rationalisation of the multiple regulatory layers imposed by statutory forest practices regulations and market driven certification schemes. For some private native forest owners the cost of regulation makes it impossible to actively manage their forests any longer – a loss to industry; the creation of a worthless asset for the owner that in time will degrade and quite possibly disappear.

12. What opportunities are there to increase wood supply from farm forestry, private native forestry and Indigenous owned and managed lands?

Private land provides the remaining opportunity to increase forest estates. The greatest opportunity now lies in the sensitive and sensible integration of trees into agricultural systems – Agroforestry – to supplement the broad acre plantation estates that currently exist. The on-farm benefits of Agroforestry are well known but the uptake in Australia, compared to countries like to New Zealand, is relatively poor.

It is time to break down the barriers that have long existed between agriculture and forestry and to convince more farmers that trees are an opportunity rather than a threat. Agroforestry is a "win-win" for agriculture and forestry – adding value to agricultural production, diversifying farm incomes and expanding the forest estate for industry.

In Tasmania, private native forests cover in excess of 850,000 ha yet in recent times this estate has largely been in limbo due to reduced industry demand. The potential it has to once again be a significant contributor of resource to the forest products sector is considerable.

## Issue 4: Innovation, research and development

13. What are the future research and development needs for Australia's forest products sector, and which of these needs are specific to strengths and opportunities in the Australian context?

Refer general comments above in relation to research.

14. What are the current inhibitors to private sector investment in research, development and extension and what role, if any, does the Australian Government potentially have in addressing these?

Refer general comments above in relation to research.

15. How can the framework for coordinating Australian forestry research and development be strengthened?

Not in a position to comment.

## Issue 5: Consumer and community engagement

16. How can domestic and international consumers be better engaged on the environmental, economic and social credentials of Australian forest products?

A more pro-active, coordinated program of engagement.

17. How important are consumer awareness programs to the future prosperity of the sector?

Important. Refer to comments above about the comparison between the role and acceptance of forestry and the forest products sector in Scandinavia with that of Australia.

18. Can forest certification be better leveraged to achieve stronger demand and better prices for Australian forest products and, if so, how?

Probably not. Certification, unfortunately, seems more likely to assist in securing market access than better prices for products. For that reason it is time to attempt to rationalise the demands / requirements of statutory regulation systems and market base "regulation" imposed by certification. At present the combined cost impost of these multiple layers of regulation, particularly for smaller forest owners who wish to manage their own forest, is becoming a barrier to actively and commercially managing their forests.

## Issue 6: Strengthened regional approaches

19. How could forestry hubs better utilise resources and promote greater efficiencies and innovation?

Not in a position to comment.

20. What have been the barriers to the establishment and efficient operation of forestry hubs to date, and what might be the role of the Australian Government in addressing these?

Not in a position to comment.

21. If additional forestry hubs are to be established, where would they best be located?

Not in a position to comment.

## Issue 7: Infrastructure

22. What infrastructure will be required to respond to future demand for Australian forest products?

Hard to determine at this stage but whatever is needed it is certainly the role of government to provide appropriate infrastructure to support the sector.

23. What can be done to ensure better recognition and understanding of the sector's infrastructure needs?

Closer engagement with the sector.

## Issue 8: Industry skills and training

24. What are the skills and training needs of the sector over the coming decades, and where are the current gaps?

Considerable.

We no longer comprehensively train professional, broadly skilled foresters in Australia and largely rely on importing these skills from New Zealand and South Africa. Unfortunately, skilled as these people are in plantation silviculture, foresters from these countries know very little about Australian native forest management. Our skill base in this area is diminishing at a fast rate and is cause for concern.

The current lengthy period of industry down turn being experienced in Tasmania (in particular) is resulting in a loss of experienced forestry personnel across the entire forest products production chain – from silvicultural and harvesting workers to research scientists.

25. Are Vocational Education and Training and university training providers well-positioned to meet the future skills and training needs of the sector?

No.

26. What improvements are required at an enterprise level to support the recruitment, development and retention of the sector's current and future workforce?

Sovereign risk has become a considerable factor in undermining the security and long-term stability of the sector in many parts of Australia, and in particular in Tasmania. If we do not address this issue it will continue to be difficult to attract appropriate forest products processing investment that is required to provide market pull down the forest products production chain. Without this long term stability the sector will be unable to attract, train and retain adequately skilled workforces that the sector will require into the future.