Submission to IGAB Independent Review Panel

from

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General Points

The Discussion Paper raises the two issues of the effectiveness of IGAB and the effectiveness of the national biosecurity system.

IGAB is an intergovernmental agreement to foster cooperation and a national approach by Commonwealth, State and Territory governments. There is no reason to question its usefulness in this context. It is equally true that considerable effort is being put into the national biosecurity system by all jurisdictions.

There are, however, some major issues requiring attention that have been raised in the Discussion Paper and in several other reviews and documents since the Beale review in 2008, eg:

- RIRDC's *National Weeds and Productivity Research Program 2010-2015*
- *Australia's Biodiversity Conservation Strategy 2010-2030*
- 2011 *Australian State of the Environment Report*
- *Australia's Fifth Report to the Convention on Biological Diversity* in 2014
- the New South Wales Natural Resource Commission's *Review of weed management in NSW* in 2014
- CSIRO's 2014 report *Australia's Biosecurity Future*
- the 2015 Senate Committee report on *Environmental Biosecurity*
- the National Biosecurity Committee's discussion paper on *Modernising Australia's approach to managing established pests and diseases of national significance* in 2015
- the *Queensland Biosecurity Capability Review* in 2016, and
- the Productivity Commission draft report *Regulation of Australian Agriculture* released in July 2016.

These issues raised in these documents all require attention if the national biosecurity system is to become as good as it can be.

Major issues I see with the current arrangements are listed as conclusions following my answers to the Discussion Paper questions. These conclusions suggest that major reforms are still needed, in particular:

- Each jurisdiction should institute wide and open consultation processes in developing positions to take to a review of the IGAB.

- Environment Ministers and local government, eg, through the Australian Local Government Association, need to be IGAB parties.
- Independent organisations for biosecurity administration and for management and dissemination of research should be established
- Ecologically sustainable development (ESD) and biodiversity commitments, including the precautionary principle, should be foundations for the IGAB and national biosecurity arrangements.
- Parties should commit to the need for increased government funding and for implementation of recommendations in the Senate Committee report on environmental biosecurity.
- Parties should commit to meaningful support for community driven activities supporting improvement over the whole biosecurity continuum.

Comments on the Discussion Paper questions

The IGAB

1) Is the IGAB a suitable mechanism to underpin Australia's national biosecurity system in the future (10 or 20 years from now)? Are the consolidated priority areas still appropriate?

   Yes, to the extent that a continuing intergovernmental forum and agreement about the nature and content of biosecurity management fostering cooperation and national approaches is desirable.

   No, to the extent that it does not involve environment Ministers and local government. The Australian Local Government Association is a party to the Intergovernmental Agreement on the Environment, which should be a foundation document for biosecurity. Local government has specific biosecurity responsibilities in many jurisdictions, and has functions that affect biosecurity outcomes, eg, land management.

2) What are your views on the construct, effectiveness, and transparency of the IGAB? Please provide examples.

   The effectiveness of IGAB will remain compromised so long as its membership and activities remain trapped in the historic trade/agriculture framework.

3) What practical improvements to the IGAB and/or its structure would provide for an increased, but accountable, role for industry and the broader community?

   Intergovernmental agreements necessarily involve government interests as the parties. The role for industry and community interests is in consultation processes undertaken in development of positions by the parties, and in development and implementation of programs and strategies.

Agreeing to risks, priorities and objectives

4) Is the goal, and are the objectives, of Australia's national biosecurity system still appropriate to address current and future biosecurity challenges?

No. The goals should be prevention of all harmful incursions resulting from human activities, to minimise the impact of harmful incursions from non-human sources, eg, wind and sea borne, migratory birds, and continuing reduction of negative impacts of existing harmful incursions.

Yes for the three stated objectives if the proposed goals are adopted. Otherwise the existing goal, unfortunately enshrined in legislation, provides scope for risk creators to argue that their marginal cases can be justified.

5) In order of importance, what do you see as the most significant current and future biosecurity risks and priorities for Australia and why? Are Australia's biosecurity objectives appropriately tailored to meet these risks and priorities?

Several of the following were included in the CSIRO report *Australia's Biosecurity Future* in 2014.

Risks (in no particular order):

Sacrificing the environment to trade.

Government withdrawal from research.

Continuing failure to deal effectively with established problems, eg, weeds.

Shifting goal posts and unexpected and unpredictable outcomes from global changes – to the atmosphere and oceans, to biodiversity, to geology and hydrology and from pollution and waste.

Continuing underfunding by governments.

Failure to involve and influence all parties whose activities and decisions may influence outcomes.

Priorities (in no particular order):

Base biosecurity on protection of the general environment.

Base biosecurity programs and systems on ecological principles and on addressing biodiversity priorities.

Adequate government funding of biosecurity functions.

Revival of research programs.

Better linking of community engagement activities and community driven programs with formal biosecurity processes.

6) Are the components and functions of Australia's national biosecurity system consistently understood by all stakeholders? If not, what could be done to improve this?

Probably not. Better public communication programs, wider and deeper consultation when developing and implementing policies and programs, and greater recognition of community generated programs should all improve the position.

7) What benefits (or impediments) are there in realising a more integrated national approach to biosecurity, agreed to by key partners in Australia's national biosecurity system?

There is no integrated approach now, as environmental interests and local government are to one side and the whole system (apart from health) is stated to be primarily a support for agriculture and trade. So I agree with the Productivity Commission conclusion that this review should look at whether clearer national leadership (by the Australian Government or another national body) could improve Australia's biosecurity system (page 23 of the draft report *Regulation of Australian Agriculture* released in July 2016).

Establishment of a separate, independent national biosecurity organisation to administer the national biosecurity system, as has been recommended many times before, would facilitate a more integrated approach.

8) What form would this best take (for example, a national statement of intent or national strategy)? What are the key elements that must be included? What specific roles do you see industry and the broader community playing in such an initiative?

A national strategy needs to be developed, eg, using a good model such as the *ACT Biosecurity Strategy 2015- 2025.* The ACT has succeeded in taking an integrated approach to biosecurity without sacrificing attention to agriculture – see http://www.tccs.act.gov.au/parks-conservation/plants_and_animals/Biosecurity.

Any interested party needs to have the opportunity to contribute to development of a national strategy. A credible process would be needed to overcome any inhibition to contribute arising from a sense that the usual suspects from agriculture and commerce would dominate.

As recognised in the Discussion Paper, biosecurity is highly complex with many interrelated components. It has all the characteristics of 'wicked' problems – uncertainties, a dynamic environment, conflicts and competing interests, and knowledge, social, resource and political constraints. In such cases, strategy development can be very daunting. One useful approach to avoid strategy, policy and program paralysis is to base the strategy around:

- what can be done with existing knowledge and resources
- what gaps impeding progress can be identified, eg, knowledge, resources political will, and

- strategies to overcome these impediments.

A national strategy could be supplemented by regional, industry and specific issue strategies.

Embedding shared responsibility

9) Are the roles and responsibilities of stakeholders in Australia's national biosecurity system clearly and consistently understood? How might this be improved?

Probably not. Developing a national strategy would help, accompanied by better public communication programs and wider and deeper consultation when developing and implementing policies and programs.

10) What practical actions do you think governments and industry organisations can undertake to strengthen the involvement of industry and community stakeholders in Australia's national biosecurity system? Would increased involvement in decision making on and implementation of biosecurity activities help the adoption of shared responsibility?

Yes to the second part of the question. Practical actions: a national strategy, willingness by governments to support and fund public good action by community interests, encouragement of community driven action, eg by landcare groups and special purpose groups, eg see http://www.serratedtussock.com.au regarding the Serrated Tussock Working Party for NSW and the ACT. When dealing with industry it is also necessary to reach out to all involved, and not assume that all are involved with industry organisations.

Funding biosecurity

11) Are the IGAB investment principles still workable? Do they still meet the needs of Australia's national biosecurity system now and in the future?

There is an argument that they remain untested. The current investment principles have not led to all risk creators and risk beneficiaries contributing, or to governments contributing meaningfully. So long as environmental agencies are both underfunded and sidelined, it cannot be said that all relevant parties are involved in decision making. So the principles read more like a wishing and hoping list.

12) Are governments and industry investing appropriately in the right areas? Are there areas where key funders should be redirecting investment? Can investment in biosecurity activities be better targeted? If so, how? Please provide examples.

The text and the question rely on an assertion about 'constrained' government resources. As Australians are one of the richest groups of people there have ever

been, any detrimental constraint can only exist because of unwillingness to overcome revenue problems, or because of conscious decisions to give priority to other things.

What is a right investment for industry will remain determined by it. If governments want to influence this, they will need to provide the necessary leadership and incentives.

The Productivity Commission's draft report *Regulation of Australian Agriculture* confirms that biosecurity involves substantial public good issues (page 262) and that landholders bear costs for conservation that benefit the whole community (page 91).

The record with incursions of ants and weeds suggest that there is too little investment in early detection and quick response processes. There is too little investment in support for community driven programs. Even where the latter occurs, eg, through landcare and similar programs, it is all too often too little, too late, too short term in outlook and beset by high transaction costs.

Three good steps would be investing in establishment of an Environmental Health organisation (by whatever name and in whatever form), in a fund supporting NEBRA, and in a research program.

13) How do we ensure investments and investment frameworks align with priorities, while being flexible enough to address changing risks and priorities?

By avoiding simplistic legacy funding, by allowing all interested parties to contribute ideas for the decisions, and by maintaining a reserve fund to help with unexpected problems, and by using continuous planning processes in the strategy development proposed in the answer to question 8.

14) Are current biosecurity funding arrangements still appropriate to meet the needs of Australia's national biosecurity system, now and in the future? What might an alternative or novel funding model encompass?

Everybody in the community benefits from good biosecurity, and it can be very difficult to apportion relative benefit, a proposition supported by the Productivity Commission in its draft report *Regulation of Australian Agriculture* (page 270). There are considerable public good issues involved. Therefore a first step is constant pressure for adequate government budget allocations. Any revised version of the Intergovernmental Agreement should include a commitment by the Commonwealth, State and Territory governments to overcome the funding problems they have generated by past decisions. As already suggested, there is scope for efficiency gains in ridding government grant programs of high transaction costs (see answer to question 12).

The risk creator problem may be harder, but should be tackled.

15) What can be done to ensure an equitable level of investment from all stakeholders across Australia's national biosecurity system, including from risk creators and risk beneficiaries?

Importers, tourism and travel interests and overseas online shopping operators and the infrastructure they use are not obviously contributing to compensate for the inevitable biosecurity issues they generate.

Market access

16) Are market access considerations given appropriate weight in Australia's national biosecurity system? What other considerations also need to be taken into account?

The foundation for biosecurity should be protection of the natural environment, an approach that would automatically generate benefits for industry and the community at large. Market access considerations are obviously short term in nature and may vary considerably over time, and producers and traders are sources of biosecurity problems. Therefore market access and other trade benefits should be a byproduct of good biosecurity administration rather than its foundation.

17) Are there ways governments could better partner with industry and/or the broader community to reduce costs (without increasing risk), such as industry certification schemes?

Yes. Certification schemes are only as useful as the quality of their auditing arrangements. A proliferation of industry schemes increases costs to producers where they are involved in more than one industry (the norm on a high proportion of Australian farms). Proliferation of schemes about environmental issues in the 1990s led to rationalisation through the development of the international standard ISO 14001. Therefore the revised Intergovernmental Agreement should include a commitment to fostering certification schemes that any industry or enterprise can use. Such schemes will need to comply with international standards if they are to be useful for exporters. If such schemes also cover animal welfare they can provide multiple benefits for producers and exporters, as well as a marketing tool for trade in Australia. See http://www.almg.org.au for an example of such a scheme.

There are examples worthy of support as a 'public good' contribution in addition to certification schemes, such as general ones encapsulated by the landcare concept, and more specific ones like the weed control program of the South Burnett Regional Council in Queensland – see attached outline.

18) How can the capacity and capability of surveillance systems (including diagnostic systems) underpinning Australia's national biosecurity system be improved?

The scope of this issue needs to broadened beyond the narrow trade issues mentioned in the Discussion Paper. Surely this must now be obvious from myrtle rust and ant experience.

One issue is continued government investment in surveillance and diagnostic systems, as there is a large public good element. The Productivity Commission draft report *Regulation of Australian Agriculture* reports a decline in government investment

(page 286). This obviously needs to be reversed if overall biosecurity is to be improved.

Another issue is to mobilise 'citizen science' activity effectively. This may require higher priority for investment in sophisticated communication and data collection systems, eg, through acceleration of rollout of the NBN on the basis of the original scheme. In some cases it could require minimal investment in providing equipment for volunteers to use. See a related very successful water quality monitoring activity that has been in operation for many years now by the Ginninderra Catchment Group, in the ACT and nearby New South Wales - http://www.ginninderralandcare.org.au/waterwatch.

The role of research and innovation

19) Which specific areas of Australia's national biosecurity system could benefit from research and innovation in the next five, 10 and 20 years and why? Please provide examples.

How to apply ESD and precautionary principles, as required by Commonwealth legislation, international agreements and Commonwealth, State and Territory commitments, in cost effective, effective, and practical ways, so that proper consideration is given to environment protection and so that narrower shorter term industry considerations do not jeopardise biosecurity and lead to or exacerbate environmental problems.

What is needed to support meaningful compliance with general duties in respect of the environment and biosecurity, which already exist in some jurisdictions, to assist with ensuring that there are practical benefits for individuals, industry and the general environment.

Weeds management – see http://www.rirdc.gov.au/news/2012/10/07/new-weed-solutions-unveiled-in-national-research-compendium and https://rirdc.infoservices.com.au/items/10-209

Understanding the drivers (eg, personal, commercial, philosophical) of activities inconsistent with improved biosecurity outcomes (eg, neglect of pest eradication), to support the development of effective compliance and incentive programs.

20) How can coordination of biosecurity-related research and innovation activities be improved?

There are research issues of general application to biosecurity, others that involve specific issues and affect many parties and have strong public good elements, eg, weeds and invasive animals such as rabbits, and others that are industry specific. The thinking behind the proposals over many years for a unified biosecurity system

with a separate independent administration applies equally to biosecurity research needs.

A straightforward approach to coordination would be to use the proven R&D Corporation model, by establishing a new Biosecurity R&D Corporation to oversee biosecurity research planning, to fund public good elements of research, to provide a framework for industry funded research where other organisations do not already do so, to provide a basis for advice to all jurisdictions about biosecurity research, and to provide services to all interested parties by giving access to research outcomes and lay guides about available research and how it might apply in particular circumstances.

21) How can innovation (including technology) help build a more cost-effective and sustainable national biosecurity system?

Those whose actions contribute to biosecurity problems, eg, landholders with weeds, will often lack the skills, knowledge and resources needed to identify a problem and to deal with it. Therefore there is a need to provide means to help an individual identify a problem, to understand its significance, to know where to go to get help, and for assistance with resources where dealing with the issue is beyond their capacity and where failure to do so would have negative effects for others and for the environment beyond their landholding. A study about innovation in farming in relation to natural resource management recommended the possibility of a coordinating and clearing house approach for supporting innovators and linking them with those who could benefit from them - see http://lwa.gov.au/products/pr030524. The Biosecurity R&D Corporation proposed above could fulfill this role.

Measuring the performance of the national biosecurity system

22) What does success of Australia's national biosecurity system look like? How could success be defined, and appropriately measured (that is, qualitatively or quantitatively)? What, if any, measures of success are in use?

The Discussion Paper includes the assertion that there is general satisfaction with the national biosecurity system. This sounds like more wishing and hoping, as it was plainly not the view of many submitters to the Senate Committees inquiring into new biosecurity legislation and environmental biosecurity. Many matters will require attention before it could reasonably be asserted that the national biosecurity system is satisfactory, or as good as it could be.

A successful biosecurity system is one where:

- no new incursions from human activities are being detected
- the negative impacts of existing incursions are eliminated or being continuously reduced, and

- incursions occurring from natural, non-human causes are quickly identified, and their negative impacts are eliminated or are being continuously reduced.

23) What would be required to ensure data collection and analysis meets the needs of a future national biosecurity system? Who are the key data and expert knowledge holders in the national biosecurity system?

It is pleasing to see that the Discussion Paper recognises that there is considerable fragmentation in existing arrangements, and that there is no central point for coordination and analysis (in the data and measurement context, but the comment applies more generally). Proposals for a separate, independent body to administer biosecurity and the proposals in these comments on research and innovation provide a basis for overcoming the acknowledged current problems (see the answers to questions 7, 9, 20 and 21).

24) How can existing or new data sets be better used? How might data be collected from a wider range of sources than government?

The comments on 'citizen science' and other research issues apply here.

Conclusions

Based on these answers, I suggest that despite the improvements made over recent years and which continue to be made in several jurisdictions, significant current problems are that the IGAB:

- remains trapped in the agriculture/trade history of quarantine and biosecurity development in Australia, confirmed by the arrangements set out in Figure 2 of the Discussion Paper
- administration does not overtly involve environment Ministers, even though the industries it seeks to protect and provide marketing support for depend on the environment and the natural resources and ecosystem services it provides, and could not survive without them - some current biosecurity problems, such as from persistent perennial weeds, have led to significant losses of production, reduced profit margins, and land being taken entirely out of production, and degradation of natural environments such as the Great Barrier Reef will cause losses to industries such as tourism, with negative flow on effects for local regions
- lacks the triggers needed to ensure greater attention to environmental biosecurity – the 2015 Senate Committee report on Environmental biosecurity cited in the Discussion Paper confirmed that environmental biosecurity still lags behind that for health and industry, and that continuing major biosecurity problems have centred on environmental issues, such as weeds and ants
- does not include local government as a party
- has not led to the development of a national strategy comparable with some of the State and Territory developments, and
- is not linked to the National Strategy for Disaster Resilience.

Similarly some current problems with the national biosecurity system are:

- No national strategy.
- Failure to develop issues highlighted in the Beale report, even though successive Commonwealth governments have claimed to support them – for example, an effective continuum approach, quality control systems for biosecurity administration, meaningful shared responsibility, environmental biosecurity.
- Failure to establish a separate independent National Biosecurity organisation.
- Failure to base policies and administration on obligations apparently accepted by all Australian governments for biodiversity conservation and ecologically sustainable development (ESD).
- Retreat from research supporting effective biosecurity management.
- Unwillingness by governments to provide adequate and timely funding for the public good elements of biosecurity management.
- Major risk creators associated with importing, tourism and travel, online shopping and associated infrastructure do not seem to be routinely providing funds to compensate for the biosecurity problems they inevitably generate.
- Lack of internationally acceptable auditable certification systems to support the rhetoric about a 'clean, green' image for Australian products.
- Failure to generate data and information systems that bring together all existing sources, and to use effectively all existing knowledge sources, eg, for taxonomy.
- Failure to support community driven programs for reduction of biosecurity problems.

The Serrated Tussock Working Party for NSW and the ACT provides a good example of the latter. Modest support from a previous New South Wales government enabled it to develop a broad ranging strategy identifying the action that needs to be taken by public and private interests to overcome the increasingly negative impact of persistent perennial weeds – see http://www.serratedtussock.com.au. Successor governments did not maintain the support, leading to a substantial slowing of effort. This failure exacerbates the problem encapsulated in Figure 3 in the Discussion Paper whereby costs and problems increase with delays in effective action.

The principles underlying the Working Party arrangement can be applied to all parts of the biosecurity continuum where community mobilisation could make a difference.

* This submission draws on experience in Commonwealth administration, Commonwealth-State relations, global change and environmental research, farming, industry organisations, landcare and similar organisations, and on research being undertaken as a higher degree research candidate at Griffith University.

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South Burnett Regional Council Pest Management Program

(See a longer description of the program in Small FARMS October 2013. Local government in Queensland has extensive natural resource management and biosecurity responsibilities, and so for the purposes here, its New South Wales equivalent is Local Land Services.)

The South Burnett Regional Council in Queensland has a Pest Management Program based on collaboration, assistance, management planning, rewards, and community involvement. It incorporates fire regimes and biodiversity. In Queensland local government has substantial environmental responsibilities, akin to those vested in Local Land Services in New South Wales.

The program was developed a few years ago to replace the more common 'enforcement of environmental legislation' approach, which was not producing the needed results.

A big problem with pest management, including for weeds, is engaging landholders and other relevant parties, eg, agricultural contractors and transport operators, in sufficient numbers and over a sufficient length of time.

The Council approach involves:

- **Council commitment** the Council has a Natural Resources Management and Parks Division
- **Example** eg, carry out weed control on roadsides and Council land where a program is to start
- **Contact** letter to all the landholders in the relevant area advising about the intended program and available support, talking to them as necessary
- **Assistance** the Council can provide information and advice (including relating to relevant whole of farm issues), and, if landholders are willing to agree to a minimum three year plan, free hire of equipment
- **'Public good'** in a highest priority situation, herbicide may be provided, and in an isolated, high priority situation, matching resources, eg, three hours for each landholder ten hours, may be provided
- **Last resort** recourse to enforcement action
- **Continuing community involvement** Council support for establishment of a Pest Advisory Committee
- **Rewards** the Council is part of the Burnett District Pest Management Group that has an annual award for 'a South Burnett landholder or community member for their efforts towards pest management awareness and activities'.

So far the process has been successful, with high participation and a buildup of peer pressure. The approach has meant community support if any enforcement action is taken.

The base funding for the program comes from normal Council rates, ie, the whole community accepts responsibility. There is also an Environmental Levy of $25 a ratepayer. The town ratepayers are urged to see the program as benefiting them too because of the strengthening of the local economy, and the freeing of resources that can be spent in the towns.

An important outcome is that the system is more efficient, ie greater outcomes for the same investment. There is a leveraging effect, eg, the Council has a $1.6 million Caring for our Country grant from the Biodiversity Fund.