AIIA response to Venturous Australia Recommendations

The Australian Information Industry Association (AIIA) represents over 450 information and communications technology (ICT) member companies, from individual consultants to the world's leading multinational corporations.

AIIA member companies employ more than 100,000 Australians, generate combined annual revenues of more than $40 billion and export more than $2 billion in goods and services each year.

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AIIA
AUSTRALIAN INFORMATION INDUSTRY ASSOCIATION
LEADING THE ICT BUSINESS COMMUNITY

Overview

On behalf of its membership, AIIA congratulates the Review panel on a comprehensive and timely report into Australia's innovation ecosystem. *Venturous Australia* provides a refreshingly holistic approach to innovation and in our view has identified many of the key levers for building Australia's innovation strengths into the future.

Many firms in the ICT sector are of the view that the role of ICT, as a key driver of productivity growth, was noticeably understated in the Report. However, many of the recommendations are nevertheless directly applicable to the ICT sector and have stimulated a renewed level of vigorous discussion on these critical issues. Our response sets out three key priorities that are prerequisites for the recommendations to be applied to the ICT sector with maximum effect.

AIIA's response sets out in some detail our current thinking in response to each recommendation. AIIA and its members look forward to engaging further with the panel and government representatives as the White Paper is developed and its recommendations subsequently considered and implemented.

Innovation and the ICT Sector

A critical ingredient for the success of the recommendations in the Review is a healthy and productive local ICT sector. ICT underpins the majority of substantive innovation outcomes in the current commercial, governmental and social context. Australia cannot be a truly innovative nation without creative and leading-edge adoption of technology. The Review does not specifically recognise this vital structural issue. Further it does not recognise that there are current and serious limitations that must be addressed in the local ICT sector for innovation success to be achieved.

AIIA identifies the following three priorities as essential to the enablement of future productivity dividends offered by Australia's ICT sector:

1. Maximising Australia's productivity growth through innovation requires a strong performance in the creation and implementation of ICT solutions; therefore the Review might usefully consider means of addressing the currently poor and declining ICT workforce environment. The significantly declining numbers of skilled ICT workers will result in a direct and material loss in the high productivity dividends that the sector has contributed in recent years through the design, development and implementation of innovative ICT solutions in areas such as education, e-commerce, e-government, e-health and manufacturing – where Australia has demonstrated considerable leadership. **Specific additional recommendations from AIIA include joint government and industry support of a campaign to promote careers in ICT and the development of a number of global best-in-class university specialist faculties focused on the innovative combination of business and technology in key sectors such as Financial Services, Healthcare, Environment and Tourism.**

2. Recognition of the transformational impact that the innovative use of ICT can deliver in terms of improved outcomes for the economy and society is essential. If Australia is to capitalise on the financial advantage created by its natural resources and plan appropriately for the future, then positioning the nation as a successful global leader of ICT implementation will be critical. Increasingly, all business will trend in the current direction of the ICT sector by becoming more globally connected, and Australia must invest at all levels in transformational ICT potential to achieve and maintain a global competitive advantage. **A communication program joint funded by industry and government to educate business and consumers on the potentially transformative nature of ICT is recommended by AIIA.**

3. Given the close connection between innovation and the leading-edge adoption of ICT, **AIIA recommends that the Australian Government put in place strategies designed to financially stimulate industry to invest in the latest technology capabilities where their intended use is directly linked to highly innovative projects. This should not be limited to pure R&D activities, as innovation activity is a much broader field.**

Analysis of Recommendations

RED Strongly supported, high priority.

ORANGE Supported, medium term priority

GREEN In principle support.

Recommendation	AIIA Comment	Priority
Recommendation 3.1 Support business innovation as an explicit priority for Australia's innovation policy by incorporating the following objectives into programs aimed at building business innovation capacity: • assist the generation and absorption of business knowledge by private firms; • help private firms to secure returns and to appropriate value from undertaking inherently uncertain innovative business activities; • foster the capacity for innovation at the company level in response to market and customer demands; • facilitate economically useful connections between firms and other institutions for knowledge transfer and capability building; • extend the global reach and market access of Australian firms; and • increase the managerial, technical and collaboration skills and competencies of private firms.	The recognition of business innovation as a priority is to be applauded. The key challenge is how best to achieve these objectives on a long term sustainable basis that achieves the business culture transformation as envisaged. In our view, there are common themes of cultural change, entrepreneurship and building confidence to take risks evident in this and indeed, all the recommendations. This is fundamental cultural change that demands strong leadership and engagement throughout all levels of government and recognition of strong leadership in the business sector. To this end, we would support the introduction of awards recognising excellence in innovation, the concept of an innovation index and exploration of voluntary reporting on innovation measures that may encourage a greater culture of investment in innovation. We believe that industry associations can play a key role in stimulating innovation in their respective sectors. Our own experience is that, at an industry level, targeted "grass roots" programs can be highly effective.	

	For example, some years ago, AIIA partnered with the Macquarie Graduate School of Management to offer an Entrepreneur's Program. Many SMEs do not have the time or money to undertake a full MBA program and want more specific learnings for their industry requirements. In the ICT industry, many companies want to complement their technical skills with broader business skills. With this in mind, AIIA and MGSM offered a residential program limited to around 10 key representatives from Australian SMEs. Participants reported significant learnings at a key time in their companies' development as well as formation of a strong ongoing network of like minded colleagues. AIIA's CollabIT Program, operating in many states, is focused on bringing ICT SMEs together around common interests, whether they be geographical needs, technology platforms or market-focused business opportunities. Participants report a range of strong benefits, not only around business opportunities, but learning how to overcome similar issues and the formation of both formal and informal alliances. Similarly, our Exporters' Group brings Australian ICT companies together around common interest in accessing foreign markets. This has been valuable in helping our members better understand the risks and opportunities, offering them strategies for approaching those markets, building local and international market networks and generally building their confidence in "having a go". However, the government also has a key role in encouraging a cultural shift through educational and other levers. In the early education sector, we need to encourage a spirit of inquiry and risk taking – essentially, encouraging students to enjoy the journey of discovery rather than focusing on the end result. With this in mind, AIIA has started to develop a teacher's kit as part of National Technology Week ("Start Here, Go Anywhere" campaign). This includes a variety of downloadable creative ICT activities that teachers may incorporate in	

	their lessons, across all curriculum areas. More generally, we need to move away from a still pervasive "tall poppy" syndrome towards a culture that enjoys exploration and is confident and supported in taking risk. Popular programs such as *New Inventors*, *Myth Busters*, and coverage of *ANU Science Olympiad* are useful, particularly in encouraging Gen Y to adopt a more entrepreneurial approach. Perhaps there is scope to explore a reality show on innovation.	
<u>Recommendation 3.2</u> Extend the Enterprise Connect Program to include services firms and expand it to provide explicit business innovation services in conjunction with the existing business review and advisory services.	AIIA supports this recommendation in principle. Whilst Enterprise Connect is a strong general program and there is value in building upon that strength, our experience is that companies who require business innovation assistance may seek it from a variety of sources, often closer to their own specific industry experience. Enterprise Connect is regarded as having competencies in manufacturing, but not being as well equipped in assisting either the services sector or technology firms that face vastly different issues with complex global dynamics. For this reason, it is important to consider supporting a range of services. For example, organisations such as Playford Capital provide specialist investment advice and programs for the technology sector. More broadly, one of the most respected, and therefore strongest, sources of innovation advice in the ICT sector is mentors and experienced industry players, whether engaged by the company informally or formally, for example, as consultants or directors. Earlier this year, AIIA established an Alumni of past Directors, extending back 30 years. The deep industry experience of these people that can be a very valuable source of business innovation advice and guidance. There may be further measures that can be explored in attracting "mentors" to directorship roles. For example, some smaller companies find the red	

	tape associated with corporate governance overwhelming. Could this be lessened to attract greater participation? Or perhaps there could be mentorship obligations attached to paid directorship roles over a certain salary, or tax concessions for those contributing founding equity.	
Recommendation 3.3 Establish a new Knowledge Connections program within the Enterprise Connect Program, to work with Industry Innovation Councils in facilitating new connections and clusters crucial to the competitive advantage of firms in knowledge-based economies.	AIIA supports this recommendation in principle. However, it is important to recognise that there is already much industry specific activity focused on facilitating new connections and clusters. Some of this is facilitated by industry associations such as AIIA; much of it is organic and free flowing. The support of proven clustering programs should be explored as part of scoping any additional programs. AIIA's experience with its CollabIT program is that the most successful clusters centre on tangible business opportunities. Many small businesses simply do not have the resources, or perhaps undervalue the potential value of clusters around less focused concepts. Most report that a mixture of structured activity such as "speed dating", "elevator pitches" and unstructured networking are most effective. For clustering around specific business opportunities to be innovative, the customer must be open to innovative and partnered offerings. Whilst the private sector is open to these opportunities to some extent, the approach of the government sector tends to be more risk averse. To this end, we applaud recommendations that support more innovative government procurement.	
Recommendation 5.1 On the basis that high quality human capital is critical to innovation, support:	AIIA strongly supports this recommendation as going to the heart of the innovation agenda. One only need look at examples such as Finland to demonstrate that focus on educational outcomes, combined with	

• the human capital focus of the COAG national reform agenda; • the broader national education reforms, and their central focus on raising teacher quality; • innovation being considered as a key element of these and future substantial national reforms; • a process to review currently inconsistent funding models for tertiary training in the creative arts, with the aim of producing a nationally consistent policy; and • an examination of the most innovative educational reforms being pursued in other countries to benchmark our efforts.	investment in R&D and infrastructure results in high level performance. On the COAG agenda, the creation of Ministerial Council may help demonstrate leadership and facilitate the activities of all responsible ministers. On the issue of teacher quality, our evidence strongly shows that ICT should be approached as a horizontal built into each core curricula subject, as well as simply being treated as a stand alone subject. More importantly, teachers must be ICT literate and be able to demonstrate and translate confidence and leadership to their students. We would strongly support a range of initiatives to this end, as part of the broader Digital Education Revolution and Digital Economy reform agendas. These might usefully include the following: • investment in the ICT infrastructure (e.g. labs) of educational institutions to support educational objectives; • measures that encourage and support use of technology-assisted learning, for example allowing global connections with other educational institutions to facilitate exchange of ideas and building global networks at educational level e.g. sister schools, linked ICT faculties. Our experience is that greater sharing and risk taking occurs amongst those in relationships of trust, so there are benefits in establishing that early; • encourage greater exchange through secondments cross industry, government and academic sector. However, to do so requires close examination and adjustment of lifestyle and salary parity; • further development of content that supports innovative ICT learning; • continual assessment against international best practice, for example, next generational learning in advanced maths in the UK (BECTA).	

Recommendation 5.2 Innovation policy should be aligned with immigration policies to ensure that they facilitate Australia's access to the global talent pool. In particular, human capital should carry equal or more weight than economic capital in individual migration assessments.	Access to the global talent pool is essential to innovation in a global industry such as ICT. Many of our member companies have active talent programs as part of developing and retaining their staff. AIIA strongly supports the need to access global talent and would encourage a range of measures to ensure that we can offer an attractive work environment. Australia is already recognised as being one of the most livable countries, but we need to do more - innovative people are attracted to more innovative environments and may quickly be lost to more innovative economies without action. The corollary to this issue for the ICT industry is the ongoing skills shortage. Recent well publicised downsizing by larger companies will not address this issue. In a global industry with innovative competitors, our greater risk is losing Australian employees to more lucrative markets, so we also need to maintain focus on growing human capital and developing and retaining that capital. We hope that the range of measures set out in this report does facilitate a more attractive and innovative ecosystem that is an exciting place for both local and foreign talent.	
Recommendation 5.3 Establish a program to encourage and support professional bodies (working with educational institutions and State and Territory Governments as appropriate) to provide accelerated pathways to facilitate enriching professional transitions so as to make Australia a world leader in this area: • the Advocate for Government Innovation (see Chapters 10 and 12) should develop priorities with	AIIA strongly supports this recommendation as crucial to addressing skills in the ICT industry. As an industry association, we are committed to this measure and have been actively building pathways with various educational bodies for some years now to help ensure that students are "commercial ready". Employers often lament the fact that graduates' technical skills are already out of date on commencement and that their business skills are not sufficient to support the innovative application of ICT to business challenges. To this end, we would be interested in working with the government to analyse the complex skills	

the aim of developing some breakthroughs within eighteen months; • an early priority should be further building pathways for key professions in which there are skill shortages. One such initiative would facilitate the entry of science and mathematics graduates into teaching; and • the Minister for Education, Employment and Workplace Relations should make a statement on progress on this agenda within eighteen months.	requirements (including "T-shaped professionals") of the ICT industry, encompassing the suppliers, commercial and government customers and others. Some of the key challenges facing the ICT industry in developing pathways are as follows: • the need for ongoing learning and skills updates; • teacher ICT literacy (as above); • a narrow stereotyped image of the ICT industry; • lack of interaction between the industry and educational institutions. In recent years, we have undertaken a range of measures to address these issues: • closer cooperation with the VET and tertiary sector on course design. We note that, owing to funding arrangements, it is somewhat easier to work with CRCs than the universities. However, we note that the establishment of the Deans of ICT has been very positive and we believe that MCEETYA could play a more significant role in this area; • greater involvement in career awareness events, including students, parents, career counselors; • promotion of the broad range of ICT roles as part of our ValueICT message; • exploration of greater use of industry/educational sector secondments and exchanges. For example, industry support for retiring staff to move into teaching or other mentoring, community roles. AIIA would welcome the opportunity to work with the Advocate for Government Innovation in developing pathways across the full breadth of the ICT sector.	

Recommendation 6.1 Adopt the principle of fully funding the costs of university research activities and implement through adjustments in funding to block and competitive grant schemes, without compromising grant success rates. Lessons from overseas and current government investigations should provide evidence for the full costs of university research and allow rapid transition to a full-cost funding model.	Supported.	
Recommendation 6.2 Base the distribution of research block funding to universities on success in winning national competitive grants and on evidence of excellence in research, such as the research quality rankings to be produced by the Excellence in Research for Australia initiative.	Supported.	
Recommendation 6.3 Develop a strategy to support the strengthening of publicly funded research agencies (PFRAs) within the National Innovation System over time, including urgent restoration of funding levels.	Supported. AIIA notes that PFRAs play a vital role in the innovation ecosystem, however it is also essential that the role of private firms that are, by necessity, more market focused, also receive support proportionate to their contribution to Australia's innovation ecosystem.	
Recommendation 6.4 In the short term, increase funding both for the PFRAs and the university research system to at least match the proportion of GDP that was allocated to them in the mid 1990s. In the longer term the goal should be to match investment levels of leading OECD economies.	See our comment in relation to 6.3 above.	

Recommendation 6.5 To build concentrations of excellence, encourage collaboration and achieve better dissemination of knowledge, introduce additional funding support for university and other research institutions to partner with each other and with other research organisations (national and international.) Discussions about additional levels of support should occur during the projected round of compact negotiations.	Supported. From an ICT industry perspective, it simply does not make sense for all universities and research institutions to aim to excel in all areas given the size of Australia's economy. Building centres of excellence, logically based on local industry needs and strengths (e.g. resources in WA and government services in the ACT), is essential in maximising the impact of available funding, attracting skilled researchers and teachers, building international strengths and forming meaningful collaborative arrangements. We fully support greater measures that achieve greater dissemination of knowledge and collaboration on the basis that this helps ensure that research efforts are market focused, rather than "research for research sake". As one of our members reflected, "collective genius is replacing the lone scientist." Australia must play to its strengths in working in open collaborative cross sectoral partnerships.	
Recommendation 6.6 The implementation of new incentives around national challenges, including water, carbon emission reduction and related climate change and environmental initiatives needs to avoid further fragmentation of responsibilities and encourage consolidation.	AIIA strongly supports the implementation of new initiatives to focus innovative research and collaboration on national challenges. This is a national, indeed global, imperative. Many of AIIA's members are now relatively advanced in sustainable ICT measures, both addressing the contribution that ICT makes to the environmental challenge, but perhaps more importantly, demonstrating how ICT can be used to transform business to substantially enhance energy efficiency. Australia's ICT industry has the potential to become a global leader in sustainable ICT initiatives given our political stability, location, English language and rural and regional challenges among other things. However, this potential will be more readily realised with appropriately targeted incentives.	

	Whilst many of the recommendations within the Report do go some way to support this, we query whether the Government might consider further specialist incentives or concessions recognising innovative activity in these areas. For example, strong leadership (perhaps via a Ministerial Council), establishment of a specialist fund (perhaps drawing on the Futures Fund?) and heavier weighting of activity in these areas as part of the grant program criteria may assist.	
Recommendation 6.7 Australia should enhance its capacity to engage internationally by opening up current innovation granting programs to international partners and participants.	AIIA supports this recommendation given the significant potential innovation and related benefits that international partners and participants can bring to Australia. However, it is essential that any such grant program carefully assess the benefits of international participation to ensure that they do contribute to Australia's knowledge and economy in some way. We would be reticent to see measures that reduced scarce grant program funding to local firms without local benefit being realised in some other sense.	
Recommendation 6.8 The NHMRC should be resourced to deliver incentives designed to rationalise and consolidate Australia's health and medical research sector, including universities and independent medical research institutes, to achieve efficiency and effectiveness of the sector.	AIIA supports this recommendation in principle and notes that the private sector has a significant role to play alongside university and independent medical research institutes in achieving greater efficiency and effectiveness. For example, the ICT sector can draw on a range of very innovative local and global initiates in e-health, technologies that remotely monitor vital signs and telemedicine for remote diagnosis and interventions etc. These have the potential to significantly improve health outcomes and reduce costs in health system. However, for these e-health initiatives to be realised, we must ensure that a range of the other recommendations made in this report are	

	prioritised, for example, addressing human capital issues and enhancing linkages and global sharing of information. More specifically, we must ensure that: • health care providers are adequately skilled and have access to necessary underlying technologies (noting the many different working environments from rural and remote to research hospitals); • internationally compatible standards eg. Re patient records are implemented; • the importance of interoperable ICT infrastructure is recognised; • the regulatory framework provides the appropriate balance for e-health initiatives such as privacy laws; • health care providers have access to appropriate security technologies, for example to protect patient records; • we build community trust in e-health.	
Recommendation 6.9 Funds currently distributed under the Research Training Scheme and Australian Postgraduate Award (APA) schemes should be allocated to institutions on the basis of demonstrated excellence in research based on the research quality rankings that will be produced by the Excellence in Research for Australia Initiative.	AIIA supports the principle that funding should flow with excellence. See comments in relation to 6.5 above.	
Recommendation 6.10 The research quality rankings from the Excellence in Research Australia initiative should be made publicly available to promote matching of the best research groups with the best doctoral students.	See comments in relation to 6.9 above.	

Recommendation 6.11 The APA annual student stipend should be raised to at least match the current APA(I) stipend of around $25,000 — and then indexed by average earnings; at the same time, the length of support provided under an APA should be increased to 4 years.	Generally supported.	
Recommendation 6.12 Early career research fellowship schemes that incorporate up to two years of supported research experience in another country should be introduced.	AIIA supports this recommendation. We note that, as part of attracting, retaining and developing talent in the current skills environment, many of our more progressive member companies with international operations or relationships already offer similar schemes, with positive results in terms of both skills retention and development. A broader scheme might usefully consider: • the experience of Korea, which, we understand, has around 7000 post graduate students in international placements at any one time; • recognising and encouraging the practices of firms that already offer such schemes; • the merits of extending the scheme beyond early career to talented staff throughout their careers, who can usefully build on and share their deeper technical and commercial experience.	
Recommendation 6.13 Establish a National Research Infrastructure Committee to advise on strategic directions in funding of national research infrastructure including landmark infrastructure.	AIIA supports this recommendation in principle provided that there is a clearly demonstrated need for such a body that is not and cannot be fulfilled by an existing body.	

Recommendation 6.14 To ensure a sustainable research infrastructure strategy into the future, extend funding for a successor program to the National Collaborative Research Infrastructure Scheme (NCRIS) for 10 years including capital and operational support of $150 to $200 million per annum. The remit of such funding should explicitly include support for the humanities, social sciences and creative arts as well as the sciences.	See comments in relation to Recommendation 6.13 above.	
Recommendation 7.1 The Australian Government should experiment with the use of prizes to stimulate innovation. Funding should be modest – say $5 million over two years with an external evaluation after three years.	AIIA supports this recommendation as a useful means of raising the profile of innovation both amongst innovative entities, but also the broader community. Australians are very willing to grant Olympians iconic status, but have a culture of overlooking others who have worked just as hard and whose work may well have more impact on our society. In developing such an innovation prize, consideration might usefully be given to: • the existence and prominence of existing awards schemes in various industries. For example, in the ICT industry, both the iAwards and Pearcey Medal have industry wide status. Winners from the various iAwards categories are then eligible for our regional ICT awards, APICTA. Winners report significant benefits in terms of marketing and business opportunities; • the national prestige of such a prize scheme, which would be essential in building awareness of innovation and changing culture; • the limitations of a single prize scheme. Perhaps innovation categories could be encouraged in existing schemes, such as recognising excellence in innovative teaching through the Australia Day awards;	

	• the possibility of engaging and raising the awareness of the Australian public if they were invited to submit nominations (for people or projects), with a televised focus on category highlights.	
Recommendation 7.2 Patent law should be reviewed to ensure that the inventive steps required to qualify for patents are considerable, and that the resulting patents are well defined, so as to minimise litigation and maximise the scope for subsequent innovators.	AIIA supports review and reform of the existing patent law scheme, however we were concerned to see the Panel's assertion that software patents deter or inhibit innovation. This view does not appear to be supported by evidence and we would be concerned that one class of patent be treated differently from other forms with economic equivalency. More generally, many of our members hold significant patent portfolios and are keen to see greater definition and transparency in patents. Others, particularly our smaller members are already effectively "locked out" by the complexities of cost of applying for business method patent and software patents. Moreover, the cost of monitoring and defending patents can be prohibitive. For this reason, many use other legal and commercial measures to protect their more innovative ideas. We acknowledge that patent law reform is necessary complex and will require consideration of international obligations. AIIA's members and affiliates would be pleased to contribute and share their practical experience as part of any reform process. AIIA also notes that one of the more significant barriers, particularly for smaller innovative firms, is timely access to industry specific advice on the various means of protecting their IP. IP is a complex issue for many companies. Whilst there is good general information available from government sources, consideration might also be given to supporting industry associations in innovative industries provide advice and information to members. For example, AIIA worked with Gilbert + Tobin	

	to produce the Software Legal Guide some years ago. This was highly valued by members, but cost has prevented development of an updated version for the meantime. AIIA is also working with Maat to offer members discounted legal advice bundled with appropriate contracts. At present, some firms are simply not seeking this advice on account of cost and risking their investments as a result.	
Recommendation 7.3 Professional practitioners and beneficiaries of the IP system should be closely involved in IP policy making. However, IP policy is economic policy. It should make the same transition as competition policy did in the 1980s and 90s to being managed as such.	See generally comments in relation to recommendation 7.2 above. AIIA's Legal Forum comprises a range of professional practitioners and our membership includes many beneficiaries of the IP system. We have played a role in IP policy making in the past and would be pleased to be closely involved in the future. More generally, we note that, in our industry particularly, IP law and policy has not kept pace with technological developments and this has led to unintended complexities. Our reform efforts should continue to be technologically neutral so far as possible. For many in the ICT industry, IP is our currency, so early and ongoing education in IP principles and commercial management of IP is essential. However, increasingly, IP is a national currency of innovation, so there is a broader need for IP education at a range of levels: • Regular judicial education and updates; • IP might be core, rather than elective, for all law students; • Short IP law courses could be offered as part of business management and entrepreneurship programs; • Basic level IP education should be introduced at a secondary level via existing curricula streams.	

Recommendation 7.4 Firms asserting or defending intellectual property should have a right to opt out of 'appellate double jeopardy'.	See generally comments made in relation to Recommendations 7.2 and 7.3 above.	
Recommendation 7.5 Explore the potential of facilitating the emergence of auditable standards to encourage better comparative voluntary reporting of the quality of firm performance. Areas where substantial gains seem likely include: • the quality of workplaces as proposed at the 2020 Summit; • the quality of clinical units in hospitals that wish to participate; and, • the performance of educational institutions at all levels in raising students' academic scores.	Our experience in the ICT industry is that many firms already actively report on a range of measures, including those pertinent to innovation, as part of their marketing and investor relations measures. For example, many in the ICT industry would readily provide information on their employee numbers, the number of employees engaged in R&D, number of R&D projects, exports and sales. Many also include external assessments ranging from informal customer references and affirmations to more formal indexes. We would be reticent to increase the red tape reporting burden on firms without clear benefits.	
Recommendation 7.6 Facilitate favourable conditions for the development and use of new and emerging technologies by establishing appropriately funded enabling technologies strategies that: • adapt or build regulatory frameworks to support the responsible and safe use of innovative services and products; • support the science and metrology required to underpin effective regulation and capitalise on opportunities; • foster public awareness and community	This recommendation includes a number of important themes in innovation, particularly prerequisite infrastructure, security, education and evidence-based policy development. AIIA strongly supports the assertion that, for innovative technologies to be used, we need to ensure that the appropriate infrastructure (in its broadest sense) and regulatory environment is in place. Many of our members are actively engaged in the provision of innovative offerings that benefit the broader economy, for example, in health, education and delivery of government services. Our community needs accessible and affordable broadband, consumer hardware and software, skills,	

engagement; and • collect data and develop metrics to support evidence based policy development, monitoring and evaluation.	trust and confidence to be able to realize these benefits. Many of these access, digital literacy and confidence issues will be explored as part of the Digital Economy process currently being led by the DBCDE. Much can be achieved if these settings are correct. One specific but pervasive issue in the ICT industry – and likely other industries – is the role that government can play as a major purchaser of ICT goods and services for often unique business issues that do require innovative solutions. As a result of culture, skills, regulatory framework and the risk adversity of external advisers, many companies have been unable to offer the government sector their more innovative offerings.	
<u>Recommendation 7.7</u> Australia should establish a National Information Strategy to optimise the flow of information in the Australian economy. The fundamental aim of a National Information Strategy should be to: • utilise the principles of targeted transparency and the development of auditable standards to maximise the flow of information in private markets about product quality; and • maximise the flow of government generated information, research, and content for the benefit of users (including private sector resellers of information).	AIIA supports initiatives that improve the flow of information, both in the Australian economy and internationally. The ICT industry plays a key role in facilitating information flows through the provision of underlying IT and communications hardware, software and services. However, there are, of course, many other potential barriers to the optimal information flow, such as access, skills and IP laws. We acknowledge that the Digital Economy process currently being undertaken by DBCDE will explore a range of these issues and many of the recommendations made elsewhere in the Report, particularly those in relation to human capital, will also assist. On the issue of information flow in private markets about product quality, our view is that there are already strong market incentives and regulatory requirements relating to product quality. AIIA supports measures that maximise the flow of government information and content, subject to appropriate protection of commercially sensitive and security interests. There is a vast wealth of government generated information that would assist innovation in the	

	private sector. In the ICT sector, companies sometimes find it difficult to obtain comprehensive information on agencies' business and ICT requirements, information that would clearly assist them develop and offer appropriate solutions. The absence of clear up to date information has seen analysts, such as ICT government market specialist, Intermedium, provide an important interpretive role for industry. Having said that, AIIA would be reticent to see the flow of government information extend to two areas, in particular: • commercial-in-confidence information provided by private firms as part of tender responses or contracts should continue to be treated as such; • where a supplier has included IP as part of a solution and the government has IP rights extending beyond a licence to use for the immediate business objective. AIIA has a strongly held belief that IP should be retained by the party best able to commercialise it. There is clearly little incentive for the originating firm to continue to develop that IP if a government client subsequently makes that IP publicly available. AIIA has engaged with the Federal Government on these issues at length over many years and would be pleased to reiterate the reasoning for our positions on these issues as necessary.	
Recommendation 7.8 Australian governments should adopt international standards of open publishing as far as possible. Material released for public information by Australian governments should be released under a creative commons licence.	Supported in principle.	

Recommendation 7.9 Funding models and institutional mandates should recognise the research and innovation role and contributions of cultural agencies and institutions responsible for information repositories, physical collections or creative content and fund them accordingly.	Whilst we recognise that there many good recommendations made in this report, we are also cognisant that there is unlikely to be sufficient funding for all initiatives to be fully realised. AIIA's view is that the various initiatives should be prioritised and funding allocated on the basis of maximum potential contribution to Australia's innovation ecosystem. We are strongly of the view that private firms, particularly those in innovation based industries such as ICT, have a strong market based incentive to be highly innovative within a short period of time. If the innovative levers and assistance is well targeted, these firms can be highly innovative within a short period of time, with an immediate positive impact on productivity.	
Recommendation 7.10 A specific strategy for ensuring the scientific knowledge produced in Australia is placed in machine searchable repositories be developed and implemented using public funding agencies and universities as drivers.	Supported in principle.	
Recommendation 7.11 Action should be taken to establish an agreed framework for the designation, funding models, and access frameworks for key collections in recognition of the national and international significance of many State and Territory collections (similar to the frameworks and accords developed around Australia's Major Performing Arts Companies).	See our comments in relation to Recommendation 7.9 above.	

Recommendation 7.12 Funding agencies should consider eligibility for cultural and collecting agencies in gaining access to contestable research funding programs.	See our comments in relation to Recommendation 7.9 above.	
Recommendation 7.13 The role of institutions such as the Australian Institute of Aboriginal and Torres Strait Islander Studies (AIATSIS) should be broadened and strengthened in recognition of the special importance of preserving indigenous collections and the unique value of indigenous traditional knowledge and practices within Australia's innovation system.	See our comments in relation to Recommendation 7.9 above.	
Recommendation 7.14 To the maximum extent practicable, information, research and content funded by Australian governments – including national collections – should be made freely available over the internet as part of the global public commons. This should be done whilst the Australian Government encourages other countries to reciprocate by making their own contributions to the global digital pubic commons.	See our comments in relation to Recommendation 7.7 above.	
Recommendation 7.15 In a similar spirit the Australian Government should initiate a process whereby countries come together to fund prizes for innovations of international significance with a particular focus on the needs of the developing world.	See generally our comments in relation to Recommendation 7.1 above. In particular, we note the regional prestige associated with the APICTA awards for the ICT industry. The commercial benefits available to winners are invaluable. We also note that Australia's ICT industry is well regarded in the	

	developing world, through a combination of having a stable democratic government, a "can do" approach supported by expertise in agriculture, natural resources and rural and remote communication, education and health issues among other assets.	
Recommendation 8.1 The set of taxation measures outlined below be considered as a package and the recommendations that may lead to cost-saving not be adopted in isolation from recommendations to restore the value of incentives to firms.	AIIA strongly supports the recommended reforms to the current R&D tax concessions. However, if we are to be truly competitive in a global industry such as ICT, Australia needs to consider whether the reforms go far enough. The rates in the Asia Pacific region (for example in New Zealand, Singapore, China and India) and Canada are more favourable. We suggest that these recommendations be further considered as part of the Henry Review and extend to considering simplification of the R&D provisions in the *Income Tax Assessment Act*. For example, ss. 73B(9) and 73CA apply different tests, but cover similar scenarios and is particularly discouraging and confusing for multinational companies.	
Recommendation 8.2 The R&D Tax Concession be changed from a tax deduction to a tax credit.	Generally, AIIA is supportive of this recommendation, however some smaller companies have expressed a preference for a deduction, rather than a credit, on the basis that they typically operate at a loss during this phase of their growth and need to maintain their cash flow. Some have queried whether companies might be able to elect one or the other.	
Recommendation 8.3 The existing R&D Tax Concession (the 125 percent R&D Tax Concession, the 175 percent Premium, the R&D Tax Offset and the International Premium) should be replaced with a	AIIA supports this recommendation as an improvement on the existing framework, particularly for small and medium sized companies. The extension of the Concession from $5M to $50M is also most welcome.	

Tax Credit in order to raise the level of business expenditure on research and development by providing a less complex and more predictable support mechanism. A 40 percent Tax Credit should be available to large firms with a refundable Tax Credit of 50 percent available to smaller firms with turnover under $50 million.	Whilst the recommendation would restore funding levels to pre 1996 levels, the mechanism needs to be considered in the context of the broader taxation system, including payroll and company tax. Care should be taken to ensure that: • the definition of eligible R&D is simplified and clear to applicants; • larger companies are not disadvantaged by a perhaps simpler, but reduced rate of return; • the relative cost of capital is considered.	
Recommendation 8.4 All R&D undertaken in Australia which meets relevant definitions be eligible for the tax credit.	This recommendation is supported and would likely benefit many ICT firms, including MNCs undertaking R&D in Australia and Australian-owned companies, which may be acquired by a foreign company in the future. We note that, under the current regime there is some doubt surrounding company valuation given the possibility of the ATO reclaiming past tax concession benefits if the beneficial ownership moves from an Australian entity to a foreign entity. Members have also suggested that the current threshold of $1M be lifted to $3M to encourage smaller, more flexible companies' appetite for R&D investment.	
Recommendation 8.5 Risk management models be developed to maximise the extent to which the refundable tax credit can be paid more regularly – at least quarterly in arrears. Regard should be had to the likely benefit relative to administrative and compliance costs and the need to manage risk.	AIIA supports this as a very sensible and practical recommendation that will assist the cash flow of smaller companies. We would similarly support any associated measures that reduce the lag between companies undertaking R&D and receiving the benefit. The more regular and timely the payment, the greater the effectiveness of the	

	measure.	
Recommendation 8.6 R&D expenditure undertaken in Australia by foreign-owned firms be eligible for the 40 percent Tax Credit but excluded from the refundable Tax Credit.	AIIA supports this measure as sensible given the innovation benefits that accrue from foreign expenditure on R&D in Australia.	
Recommendation 8.7 Refinements should be made to clarify the activities that should be supported by the Tax Concession or new Tax Credit. Further exploration may be warranted to see if there are practicable ways of expanding the definition of eligible activities to include some of the less technically risky activities involved in innovation in services. In the immediate term: • R&D on open source programs should qualify for the multiple sale test; • guidelines should be reviewed to clearly identify what is eligible activity; and • appropriate measures be taken to heavily constrain 'whole of mine' and similar claims against the existing R&D Tax Concession program or proposed Tax Credit program	AIIA sees merit in the recommendation that R&D on open source programs qualify for the multiple sales test. The use of open source solutions is widespread and represents a significant area of innovative activity. However, the AIIA does not support measures that discriminate between business development or licensing models of software. In particular the AIIA does not believe government policies should discriminate or in any way establish a legislative preference between development or licensing models as such policies have the potential to distort investment decisions and detract from economic efficiency. Tax credits for research and development should be available to all developers of software and eligibility criteria should consider only the merit of the product of the process of research and development investment rather than the development or licensing model used after the product's development. The Panel's current recommendation ignores public domain software, establishes no quality or demand threshold for the software code created and would potentially establish a tax driven process for proprietary developed software that was unable to be commercially sold to multiple purchasers. AIIA would not support incentives that merely attach to licensing models without further examination and clear evidence of the productivity and market impact benefits of such incentives. To this end, AIIA suggests that the question of the multiple sales test for software be further examined as part of the Henry Taxation System Review.	

	We also strongly support the recommendation that guidelines clearly identify eligible activity. Our experience is that many companies find it extremely difficult to work through the complexities of the criteria. As a result, they often resort to employing consultants to assist them in making a compliant application, resulting in additional time and cost. More specifically, we note that the definition of eligible activities has a large impact on the software and services industry and it is therefore of particularly importance for AIIA members. In the past, members have felt the definition of technical risk (interpreted as the generation of new algorithms underlying software code) was too restrictive. As a result, many software development projects, for example, moving an existing application to a new platform, which may involve an element of technical risk, were excluded from the tax concession. The treatment of services innovation is also important for the membership with so much development and innovation around business process, web enablement etc.	
Recommendation 9.1 A Competitive Innovation Grants Program should be introduced to assist innovative firms, with limited access to capital, in the high risk, proof-of-concept and development stages. This program would be targeted at projects addressing identified national priorities for innovation. Successful firms would be required to repay grants from the royalties or earning streams accruing from commercial success. The program would seek to assist 200 innovative firms annually at a cost of $150 million per year.	AIIA supports this recommendation on the basis that it would have an immediate and significant positive impact. In particular, the program would benefit technology focused firms that undertake high-risk projects with strong export potential and can deliver significant innovation and productivity benefits. We are however concerned that consideration be given the extending the scope or focus of the program. 200 firms across all sectors is very limiting. As a highly innovative industry, the ICT sector alone would have well in excess of 200 firms that would be eligible and could benefit immediately from participation in such a program. Furthermore, we suggest that the program be framed based on	

	learnings from prior programs such as the R&D Start Loan scheme and Commercial Ready. In particular: • ensure that administration costs and complexities are minimised; • ensure that reporting requirements are not unduly onerous; • consider a flexible means by which projects focus can be changed as it evolves if necessary; • consider adverse impact of accounting standards and representation of grant liabilities on balance sheets – this can impact the ability to raise credit, debt funding and further equity etc; • timing of repayments – repayment is required at a time when firms are typically in need of working capital; • lack of private sector matching requirement forcing higher reliance on program administrators for viability assessment. We note that member participants in the Commercial Ready program supported its: • matching funding requirements at some level; • tight definitions of eligibility; • payment only required on significant ownership change.	

Recommendation 9.2 The COMET program be expanded and continued for another five years, noting the scope for greater leverage arising from strong linkages to the Enterprise Connect initiative. A funding increase of at least 25 percent would maintain the levels of service and provide wider coverage across Australia. Further increases to extend the programme's coverage should be considered in conjunction with the evolution of the Enterprise Connect network.	Similarly, AIIA supports this recommendation as a high priority building on the successful track record of the existing COMET program. However, we suggest that the Panel consider: • strong measures to ensure that the ICT industry has access to the program, given the proposed relationship with Enterprise Connect and a historic disconnect between the ICT industry and the Innovation Program; • the importance of regularly assessing the program to ensure that it keeps pace with inflation, is internationally competitive and is adjusted for maximum results; • teviewing the business model for effectiveness; • whether the link with Enterprise Connect is warranted. There is some concern amongst our membership that program funding should be available to people who already have strategic business competencies and funds should go directly to eligible firms rather than involve a third party network.	
Recommendation 9.3 A portfolio of collaboration and linkage programs be maintained to support productive partnerships in the National Innovation System and with partners globally.	AIIA supports this recommendation given the value of global collaboration and linkages in the ICT sector. We reiterate our comments elsewhere in this response in relation to the benefits of existing industry based programs, such as CollabIT. There is scope to extend proven programs such as this to collaboration with non-ICT industry interests, end users and research facilities. For example, AIIA is currently developing a program to strengthen linkages between industry and NICTA. The development of innovative ICT companies that can compete	

	globally requires development and coaching in business skills particularly marketing. Therefore the AIIA would encourage collaboration and linkages with our most productive industries (mining, health, education and tourism) as demanding customers as well as business skills through global ICT companies supported by universities.	
Recommendation 9.4 The recommendations in the Review of the CRC Program Collaborating to a Purpose should be acted on immediately though Government should weigh carefully responses to the CRC Review drawing attention to serious anomalies arising from the recommendation encouraging cash and in-kind contributions from research providers.	AIIA strongly supports measures that provide support for the CRCs and focus on value-added returns from CRCs as they move forward. In particular, measures that focus at least in part on the difficult challenge of creating strong and sustainable links between SMEs and public sector research organisations are welcomed. Research in the ICT sector suggests that, whilst MNCs are reasonably well linked with research organisations, both research organisations and SMEs experience difficulty linking with each other. Public sector research organisations are often motivated by a desire or need to generate external funding and tend to focus on their connections with larger firms. At the same time, SMEs lack the senior management bandwidth to fully engage with the often slow moving bureaucracies in public sector research organisations. As a result, SME participation in CRCs has been minimal. Members have noted strong potential where ICT R&D focuses on end-user applications in the non-ICT sector, for example in the mining sector.	
Recommendation 9.5 A pilot linkage voucher scheme be introduced via the existing Enterprise Connect and COMET program to improve innovation linkages between small and medium	AIIA recognises the importance of supporting linkages and this recommendation appears to be a simple and creative measure to this end. However, we note that many linkages are already made	

sized enterprises and the research community. Each voucher would be worth up to $15,000 and would be used to fund collaboration between small firms and public sector research organisations. The program would link 5,000 firms per year to public research agencies at a cost of $50-$75 million per year.	"organically", through existing industry, project and geographically based networks. It may be preferable to expend this not insignificant amount, in supporting proven programs, rather than a more generic voucher system associated with programs that many firms do not access or may not be eligible for. For example, the ICT industry program, CollabIT (http://www.aiia.com.au/pages/aboutcollabit.aspx), extends to most states, already engages AIIA members, other private firms, relevant public research agencies, such as NICTA, CSIRO, clusters like ATP and end users, including government and commercial "verticals". There is clearly a role for industry associations to help drive collaboration and this should receive government funding to maximise the investment in funds provided directly to firms. The AIIA commends the report for providing funding directly to the innovative companies themselves.	
Recommendation 9.6 The Government consider strategies to attract international venture capital fund(s) to Australia as the base for investment in the Asia Pacific region, with the short term objectives of attracting a major US venture capital firm to Australia and strengthening Australian links into US capital markets.	AIIA supports this recommendation in principle, but is generally of the view that this is a matter more appropriately addressed by the market. There are complex issues at play here – perhaps the government could support a more detailed study into understanding why international VC funding is difficult to attract to Australia (and nurture domestically), taking into account the detailed accounts of various stakeholders.	
Recommendation 9.7 The ABS be appropriately resourced to undertake annual collections of venture capital data to enable effective tracking of the market and the impact of government support.	AIIA supports this recommendation as providing data for evidence based policy formation on an important issue for innovative industries. We note that recent funding cuts affecting the ABS have restricted the collection of data that is useful for the ICT industry to a mere trickle. As a result, we are forced to rely on OECD data, that is not always directly	

	applicable to Australia and a limited data set that cannot be used to support key innovative industries, such as ICT. For example, it would be useful to have more than household Internet use and broadband use, but extend the data available on the extent that decisions are made based on sustainability or energy efficiency considerations, on ICT skills and on enterprise ICT trends and decision making.	
Recommendation 9.8 The Innovation Investment Fund program be maintained, with a fourth round implemented after 2012. The primary objectives of this fourth round be: (i) to invest in high growth potential firms; (ii) to expand the pool of skilled fund managers; (iii) to build downstream investor confidence in follow on investment; and (iv) to build institutional fund confidence in supporting early stage Funds. To facilitate effective monitoring of the impact of government support to grow early stage ventures in Australia, adequate data on investee firms supported through the program should be collected to support robust longitudinal analysis. Ten new funds over five years to be established at a cost of $300 million over 15 years.	AIIA supports this recommendation in principle. There is a view within our industry that the IIF is struggling and suffers from gatekeepers in major investment and superannuation funds who have a limited understanding and interest in innovation. As super funds grow through compulsory contributions, there is pressure to make larger investments over time – the current level of subsidy is too small to attract investment into early stage funds. This trend is exacerbated by disturbances and falling confidence in financial markets. As suggested above, there is merit in undertaking a deeper study into how to best secure early investment in the Australian environment.	
Recommendation 9.9 The Australian Government immediately establish a second round of Pre-Seed Funds. In further rounds the current absolute $1 million cap per investee firm should be changed to a maximum $1 million cap on the first tranche of	AIIA supports this recommendation and the continuation of pre-seed funds. It is important that fund managers obtain early stage VC for success – and that the ABS continues to collect investment data to build the level of awareness amongst investment funds.	

investment, recognising the high risk nature of this early stage of investment where the availability and timing of alternative follow-on investment is uncertain. Four new funds should be established at a cost of $100 million over 15 years.		
Recommendation 9.10 Modest facilitating grants to organisations of angel investors should be provided to support an increased profile, networking and an ability to mount investor-education programs.	AIIA supports this as a useful modest step towards increasing awareness and linkages between angel investors and innovative industries such as ICT. Angel investors are particularly important in the lifecycle of Australian ICT firms, representing 60 – 70 percent of early stage investment. We also suggest that the Review consider extending favourable capital gains tax treatment to angel investors, in recognition of the high risks and key role that they play. The tax treatment of angel investors in the UK, US and other innovation focused nations might be explored further. Industry associations, such as AIIA, would be pleased to play a role in facilitating international speaker programs and utilising our existing networks and programs to help raise awareness of the role of angel investors. As noted above, there is also potential for Australia to better recognise and utilise its many experienced industry players, whether through formal Alumni organisations or more informal mentoring and investment roles. We note that there are a range of experienced entrepreneurial individuals in the ICT industry who might usefully be engaged in these discussions.	
Recommendation 10.1 Consideration should be given to extending the platform	AIIA agrees that measures such as this are worthy of further	

created to enforce payments and administer income contingent loans through the tax system; for instance, by extending income contingent loans for tertiary education outside universities and for sole trader entrepreneurs seeking to fund innovative projects.	consideration. Measures that can maximize cash flow and reduce balance sheet debt at crucial times in a companies' development are significant factors in their ability to focus on innovation.	
Recommendation 10.2 An advisory committee of web 2.0 practitioners should be established to propose and help steer governments as they experiment with web 2.0 technologies and ideas. At least five substantial experiments should be established in different areas within two years to be evaluated within three. The Minister for Finance and Deregulation should have carriage of the initiative.	AIIA supports this recommendation as a point of leadership and focus for Web 2.0 technologies (and supporting the recommendations relating to procurement of innovative solutions). There is already extensive activity across the ICT industry and end users, including government, in this area and no end of creative and innovative uses and ideas that can be used to enhance the delivery of government services. However, the development of a committee and focus on experiments may accelerate progress and awareness of Web 2.0, demonstrate leadership and put Australia in a better position to take a global leadership position on Web 2.0 supported e-government. AIIA also notes that Australia's strength in Web 2.0 technologies, including social networking, wikis and blogs, can be applied to the broader innovation ecosystem to enhance collaboration both nationally and internationally. We would recommend that the advisory committee comprise representatives from the industry, government and research sectors as well as people with technical, project management and government programs delivery experience. AIIA would be pleased to assist the government in identifying appropriate skills within the ICT industry – as well as playing an ongoing role in profiling the progress and outcomes of the experiments.	

Recommendation 10.3 An Advocate for Government Innovation should be established to promote innovation in the public sector. The Advocate would: • operate a scheme similar to Singapore's Enterprise Challenge; • provide a source for funds and expertise for conducting randomised policy trials; • manage a process by which agencies within government and also firms outside it were able to challenge established practices, administrative arrangements or regulation which obstructed beneficial innovation; • provide specific 'project facilitation' assistance to firms seeking regulatory approvals in order to introduce worthwhile and innovative business practices; • promote networks (including within federal, and state and territory governments) to maximise the dissemination of knowledge about worthwhile new approaches to issues faced by public agencies; • operate as a repository of knowledge and resources to the Australian Government and participating State and Territory government agencies to promote tendering practices designed to maximise the scope for innovation in the supply of goods and services to government; • establish a high profile national awards system to provide national awards for individuals, and public agencies at the Federal, State and Territory or local government level that make the greatest contribution to public sector innovation; and	AIIA broadly supports the establishment of a body that can raise awareness and adoption of innovation within government and better coordinate the myriad of issues associated with it. However, we would be reticent to see further layers of bureaucracy in an already complex and fragmented innovation environment. One AIIA member noted, "I am a great believer in putting the money in the hands of the doer. The more layers in the funding channel the greater the inefficiencies". As noted above, the establishment of a Ministerial Council may provide the necessary leadership level focus and associated agency level priority and activity. However, AIIA members certainly welcome the opportunity to engage with an informed government entity that can assist them overcome existing practices and barriers that inhibit innovation. Taken together, the government sector is by far the largest ICT customer in Australia, worth an estimated $6B annually. However, there are a range of practices that make it difficult for ICT suppliers to do business with government, let alone offer their most innovative solutions to government. Many of these are articulated in our submission to the recent Gershon inquiry. We refer you to that submission, rather than reiterate them detail here. However, the key issues include: • moving from an adversarial approach to a partnership approach; • tenders that allow firms to propose alternative innovative solutions without prejudice; • more commercially based contracting requirements, particularly in relation to risk allocation and IP ownership and licensing;	

• act in concert with an appropriate university partner(s) such as the Australia and New Zealand School of Government (ANZSOG), to hold an annual international conference on innovation in government, with the aim of it becoming the premier international conference on the subject – the Davos of public sector innovation.	• enhancing project management skills. We note that, in a devolved environment, the interagency status of any new body will be crucial to its ability to realize these recommendations. In our experience, entrenched agency cultures and lack of skills and awareness frequently obstruct adoption of good policies that would enhance innovation in government. We are supportive of the recommendations towards a high profile awards system (noting that the government already participates in the ICT industry iAwards program) and an annual international conference on innovation in government (which should include all relevant stakeholders, including industry).	
<u>Recommendation 10.4</u> A rigorous policy of evaluating all Australian Government innovation programs – and other relevant programs – be established. In a way analogous to the requirement that new regulation cannot be implemented without adequate regulatory impact analysis, a policy should be adopted whereby new programs cannot be implemented without an adequate evaluation strategy and funding for evaluation including the collection of 'base data' to evaluate the effects of the program.	AIIA supports this on the basis that it facilitates evidence-based policy making, regular adjustment of programs for maximum effect and valuable information for those in the broader innovation ecosystem who participate in the relevant programs. Many in the ICT sector were adversely impacted by the axing of the Commercial Ready program and would appreciate more systemic review to reduce the risk of firms losing their investment in programs without notice.	
<u>Recommendation 10.5</u> Experimentation in innovative policy and administration should be a major theme of the current refashioning of federal relations. States and Territories should be able to bid for federal funds to pioneer innovative approaches and to have their innovations properly and independently	AIIA supports this recommendation in principle. Innovation transcends all political and sectoral boundaries and should flow freely within and between traditional institutional silos.	

evaluated. This could be taken up within the COAG National Partnership Rewards payments currently being negotiated.		
<u>Recommendation 10.6</u> The Australian Government should recognise its role as an active participant in facilitating innovation through procurement practices. In this context, the Government should: • actively manage its ability to enable and demand innovation in procured services and products given its significant presence as a major purchaser; • in procurement, be open to participating in risk sharing in relation to innovation demanded; • explore the use of forward purchase commitments as a means of fostering more innovative approaches to government procurement; and • work with the State and Territories to implement a pilot Small Business Innovation Contracting program based on the US SBIR design principles, to strengthen the growth of highly innovative firms in Australia. The Advocate for Government Innovation should operate as a source of expertise and seed funding for the resourcing of such approaches to procurement.	AIIA strongly supports this recommendation (see generally our comments above). Over the years, AIIA's members have identified a range of issues that inhibit purchasing of innovative ICT solutions by government, many of which are set out in more detail in our response to the Gershon Review earlier this year. In recent years, the government has implemented some positive initiatives, for example, the Gateway Review Process, the use of Annual Procurement Plans and improved policy to encourage a more informed approach to risk allocation. However, there is still a long way to go, particularly on the more pervasive issues of skills, accountability and a risk-averse culture. We could be very pleased to work closely with the government and any cross-government organisation, including the APCC, towards encouraging both more innovative approaches to procurement and procurement that enhances innovation within government. Through our international network of ICT associations, WITSA, we can provide informed comment on the US SBIR and they way in which it may be best implemented in the Australian context. We note that whilst an office of the Advocate may be able to provide expertise, there are already a range of agencies that offer procurement expertise, yet in a devolved environment marked by interdepartmental power inbalances, they are not utilised to the extent desirable. Experience shows that industry and government have worked hard on tackling some of these issues creatively, but many fail at the point of implementation in a devolved environment. FMA directions are significantly more effective than the availability of useful and often creative procurement offerings.	

Recommendation 11.1 National innovation priorities as set out in this Review, be a focus of innovation policy and activities and the National Innovation Council be charged with ongoing evaluation of the alignment of public innovation policy with National Research and Innovation priorities.	AIIA supports this recommendation and as noted previously, Australia's ICT industry is very well placed to play a leading regional and global role in addressing these priorities. The ongoing review and alignment is eminently sensible. The focus on these priorities might be supported by relevant adjustments to elements such as program funding and criteria weightings.	
Recommendation 12.1 The Prime Minister's Science, Engineering and Innovation Council should be replaced by a new National Innovation Council, chaired by the Prime Minister, and supported by a small but high level Office of Innovation. An International Innovation Advisory Panel would be formed to provide advice to the Council on international engagement.	Supported in principle. See generally our comments above, particularly the need for strong visible leadership and a rallying point of focus.	
Recommendation 12.2 To more effectively coordinate the innovation activities of public sector research agencies and to provide a source of co-ordinated advice to the National Innovation Council, a Research Coordination Council should be established.	Supported in principle. See generally our comments above.	
Recommendation 12.3 The Minister for Innovation should be a joint signatory to any Cabinet proposals from across government significantly bearing on the national innovation agenda, to ensure co-ordination.	Supported. We agree that a greater level of coordination is essential. This measure is necessary, but not sufficient.	

Recommendation 12.4 Innovation Australia should be the single major agency responsible for delivering innovation program support for firms. Such programs would be delivered through the AusIndustry network.	AIIA strongly support this as an important practical coordination measure that will benefit firms and others in the innovation ecosystem. In our experience, firms are unaware of or unable to identify the programs that would assist them at crucial times in their development. A single point of delivery would clearly assist in this regard. Industry associations, such as AIIA, can also play a key information facilitation role in assisting their members identify appropriate program sources as well as participating in consultations on the outcomes of such programs.	
Recommendation 12.5 The Australian Government and State and Territory governments should adopt a framework of principles for innovation interventions (as set out in this Review) to enhance consistency in approach across governments and improve the overall accessibility and efficiency of the suite of interventions.	AIIA strongly supports this recommendation as an important measure in better coordinating programs for the benefit of both administrators and program participants. In framing the principles, AIIA broadly regards the following to be of paramount importance: • eligibility criteria to be properly targeted and framed; • cost of application/administration not to outweigh recipient benefits; • program to be targeted to assist firms that can demonstrate that "but for intervention," they could not have realised innovation benefits; • any payments to be sufficient and regular; • any program restrictions or cancellation to be conveyed in a clear and timely fashion so as not to disadvantage participants; • program participants to be engaged in program review.	
Recommendation 12.6 That governments review the existing suite of programs and	AIIA supports this as an essential means of ensuring that available	

develop any new programs in the light of these principles. All program proposals should contain clear ex ante evaluation criteria, and provide for the provision or collection of relevant base line data before program implementation. Design principles and rules should be applied consistently. (See proposed design principles in Chapter 4 and Annex 4)	programs are well conceived, well executed and updated regularly to reflect market changes and priority settings. In our experience, companies are very willing to participate in evaluations provided that the administrative resource required is relevant and reasonable.	
Recommendation 12.7 That senior government officials develop a collaborative mechanism to oversee the agreed approach and report periodically to relevant Australian Government and State and Territory ministers.	Supported. See generally comments in relation to the need for effective coordination without unnecessary bureaucracy and the possible role of a Ministerial Council.	
Recommendation 12.8 That common metrics, performance indicators and mechanisms for collecting and sharing data be developed and adopted by all jurisdictions.	AIIA supports this as a necessary input for evidence-based policy formation, as well as providing valuable information for industry participants.	
Recommendation 12.9 That governments together develop a single mechanism (such as a web portal) for providing information to clients about access to the full range of Australian and State and Territory government innovation programs.	AIIA supports this as an important practical measure that will assist firms, particularly SMEs, to quickly identify information on innovation programs. We note that industry associations, such as AIIA, can play a further dissemination role by promoting this portal (or similar) to their membership base in regular communications as well as on their own websites.	
Recommendation 12.10 The ABS should be resourced to ensure the longevity and	AIIA supports this recommendation. See generally our comments in	

international consistency of innovation data collections and their availability to facilitate effective policy development. The National Innovation Council should advise where additional data collection is required to produce its Annual Statement on Innovation.	relation to Recommendation 9.7 above.	
Recommendation 12.11 An Annual Statement on Innovation should be prepared by the National Innovation Council and incorporate a clear set of framework indicators. (An initial proposal for these indicators is set out in Annex 12).	AIIA supports this as a potentially useful measure provided that it receives adequate high profile recognition and distribution – and is used as both a leadership measure as well as an ongoing performance management measure.	
Recommendation 12.12 The Australian Government, with the guidance of the National Innovation Council, should establish rigorous and consistent evaluation processes for innovation programs in line with the principle that the function should be carried out on an arms-length and transparent basis.	AIIA supports this recommendation as an appropriate and important measure to regularly review and ensure that program settings keep pace with industry requirements. It also provides an opportunity to refocus at regular intervals. In the event that programs are to be discontinued or otherwise limited in a manner that may adversely affect interests, it is essential that participants be given reasonable notice so as to prevent adverse effects similar to those associated with the discontinuance of Commercial Ready.	
Recommendation 12.13 A National Centre for Innovation Research should be established to advance knowledge of the innovation system through high quality, independent research which is strongly relevant to policy and practice.	AIIA supports this recommendation in principle. We note that many ICT companies are also heavily involved in research on innovation and can make valuable contributions particularly on relevant on global and ICT issues.	

END.