



 **2008 National
Innovation Survey**

Introduction

Over 350 Australian organizations participated in the inaugural National Innovation Survey. The major premise is that growing organisations are adept at building existing operations while creating new business initiatives. This Survey is part of the Australian Business, Innovation and Growth (ABIG) Index, established to analyse business innovation and review emerging trends that underpin sustainable corporate growth.

The ABIG index has been extensively reviewed and an eminent Advisory Board formed to review and validate survey findings at all stages. The purpose of this National Innovation Survey was to measure the relative importance of key drivers of, and barriers to, innovation across a broad spectrum of Australian organizations, identify “patterns of innovation” and particular combination of factors that lead to innovation success for different organizations.

Research Methodology

The overall market, legal, profit and other related factors that affect an organization’s ability to innovate are well documented. What is less well understood is the relative importance of each of the drivers of and barriers to innovation, and how these vary with the size, type and nature of the organization. The purpose of this research is to measure the relative importance of each of the key drivers of and barriers to innovation across a broad spectrum of Australian organizations, to identify “patterns of innovation” ... the particular combination of factors that lead to innovation success for different organizational types.

The research also looks at: the ecosystem support for innovation; the relative importance of different sources of information; the mechanisms by which intellectual property is protected, role models for “best practice” in innovation; and industry trends that are expected to affect Australian organizations’ ability to innovate and prosper.

This research is based on a study of over 350 Australian organizations that participated in a (20 minute) online survey conducted in the November 2007 - February 2008 time frame. The responding organizations represent a broad cross section of Australian organizations based on industry type (ANZSIC code), size of organization, nature of business (Commercial versus Not-for-Profit), and scope of operation (local, national, and international). The targeted respondents were senior/executive level managers in the organization and/or those who played a significant role in the formal innovation processes in the organization. The results are broadly representative of Australian organizations that have a formal focus on innovation related activities.

Drivers of Innovation

Responding organizations were asked to rate the importance of a set of profit, market and legal related factors in terms of driving innovation opportunities in their organization using a 0 to 10 scale where 0 was “Not at all important” and 10 means “Extremely important”.

Table 1 shows the overall responses to this question highlighting the factors considered to be of greatest importance, and noting the key differences in relative importance for each of the major organizational types. Note that even the “least” important of these factors received an average rating of 5.8 on a 0 to 10 point scale, demonstrating that all of these factors are important to some degree.

Table 1 : The relative importance of the key “Drivers of Innovation”

		Drivers of Innovation		
		Regulatory Related Drivers	Profit Related Drivers	Market Related Drivers
Driver Importance	Greater Importance		Improve productivity Increase revenue Reduce costs	Increase responsiveness to customer needs Be at the cutting edge of Industry Establish a new market Increase market share
	Lesser Importance	Be environmentally responsible Meet Government regulations or standards Improve safety or working conditions	Exploit new ways to manage the supply chain Increase export opportunities	
		Lesser Importance	Driver Category Importance	Greater Importance

“Increased responsiveness to customer needs” was universally the most important driver across all organizations. Small sized organizations rated “Be at the cutting edge of industry” and “Increased revenue” as their next most important factors, while medium and large sized organizations rated “Improved Productivity” as being relatively more important. Understandably, not-for-profit organizations rated “Meeting Government regulations or standards” and “Improving Productivity” as being their next-most important driver of innovation; whereas commercial organizations rated “Increase Market Share” as being an important driver.

Organizations with an international scope attached much more importance to “Establishing New Markets” than organizations with a “Local’ or “National” scope of operations. “Manufacturing” related organizations rated “Increase export opportunities” as being much more important than organizations from other industry sectors. For complete details refer to Appendix Table D.1

Barriers to Innovation

Responding organizations were asked to identify the key barriers that their organizations faced when developing new products (goods or services), or processes, via a set of open ended questions. They were then asked to rate the significance of a set of cost, knowledge, market and other related factors in terms of hampering the organization’s innovation-related activities or projects or in influencing a decision not to innovate. Table 2 provides a synthesis/summary of their responses, highlighting differences in terms of the relative significance of barriers to each key organizational profile/pattern.

Table 2: The relative significance of Barriers to Innovation

Barriers to Innovation			
	Knowledge Barriers	Market Barriers	Cost Barriers
Driver Importance	Greater Importance	Uncertain demand for innovative goods/services Market dominated by established organizations	Lack of funds within organization/group
	Lesser Importance		Lack of finance from outside sources
	Difficulty in finding co-operation partners		Innovation costs are too high
	Lack of information on markets		
	Lack of information on technology		
	Lack of information on technology		
	Lesser Importance	Driver Category Importance	Greater Importance

As expected, finance related factors “Lack of funds within the organization/group” and “Lack of finance from outside sources” were generally perceived as being among the most important barriers to innovation. However, both medium and large sized organizations rated “Lack of qualified personnel” as being their most important barrier to innovation. Organizations in technology oriented industries rated “Lack of funds within the organization” and “Uncertain demand for innovative goods and services” as being their most important barriers to innovation.

“Manufacturing” related organizations rated “Market dominated by established organizations” as being a relatively more important factor than organizations from other industry sectors. Organizations in the “Information, Media and Telecommunications” sector rated “Lack of information on markets” as being a relatively more significant barrier than organizations from other industry sectors. Organizations in the “Education and Training” sector rated “Lack of funds within their organization/group” and “Lack of qualified personnel” as being their two most significant barriers to innovation. For complete details refer to Appendix Table D.2

Sources of information and co-operation for innovative activities

Responding organizations were asked to rate a set of internal, market, institutional and other sources of information in terms of their relative importance to the organization's innovation projects. They were then asked if they had co-operated with another organization/institution in relation to an innovation project in the past 12 months, and then asked to identify the type of co-operation partner that was the most valuable to the organization's innovation activities.

Table 3 provides a synthesis/summary of their responses, highlighting differences in terms of the relative significance of barriers to each key organizational profile/pattern. For complete details refer to Appendix Table D.3

Table 3 : The relative importance of the key "Sources of Information and Co-operation"

Key Sources of Information

1. Customers and Clients
2. Partners (Channel and product development)
3. Conferences, trade fairs and exhibitions
4. Professional and industry associations
5. Competitors/Other business from the same industry

Sources of Cooperation

1. Suppliers (raw materials, processes etc.)
 2. Partners (Joint Ventures, Networking with similar organizations in the same sector)
 3. Universities
 4. Government research organizations (CSIRO, CRC's)
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“Best practice” in Innovation

Through a set of open-ended questions, responding organizations were asked to list the key components that constitute “best practice in innovation” and to identify which organizations in their industry demonstrated “best practice” in innovation.

Table 4 lists the key components of “best practice in innovation” that emerged from an analysis of the verbatim responses to these questions.

Table 4 : What constitutes “Best Practice in Innovation?”

Key Components of “Best Practice in Innovation”

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- **Deep understanding of the customer and market needs:** Engage with customers; Understand industry trends and competitive environment; Big picture perspectives; Innovation can’t be done in a vacuum.
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- **Culture of innovation:** Vision; leadership; Executive support; Openness to new ideas; supportive/encouraging of innovation; commercial imperative to innovate; Flexibility.
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- **Open Innovation:** Open collaboration model and having global partnerships
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- **Appropriate funding model for innovation:** Willingness to invest in R&D activities; Balanced investment in future versus current needs.
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- **Ability to execute:** Commitment of resources dedicated to innovation; Continuous development/improvement processes; Bench-marking; Clear goals/deadlines/strategy; Best practice evolves over time (dynamic); Flexible and quick to move.
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- **Human intellect/creativity:** Development of skills; Knowledge base; Talented Educated individuals; Willingness to learn/change.
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- **Management of Intellectual Property:** Ability to manage/protect IP that is generated through the innovation process in a practical manner.
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Innovation and Intellectual Property Protection

Responding organizations were asked a series of questions regarding their current use of formal and strategic methods of protecting their intellectual property, and were then asked to rate the importance of a range of different intellectual property protection mechanisms to their organization, using a 0 to 10 scale where 0 was “Not at all important,” and 10 means “Extremely important”.

Table 5 shows the overall responses to this question highlighting the intellectual property protection mechanisms considered to be of greatest importance to the organization. For complete details refer to Appendix Table D.4

Table 5: The relative importance of the common Intellectual Property protection mechanisms

1. Confidentiality Agreements

2. Lead time advantage on competitors

3. Secrecy

4. Copyright

5. Trademarks

6. Patents

7. Complexity of Design

Key Conclusions

The relative importance of: the drivers of; barriers to; sources of information used; and desired outcomes from the process of innovation vary markedly by industry type (technology orientation, services vs. product orientation), business nature (commercial vs. not-for-profit), and the overall size of the organization, but exhibit a common set of patterns. An organization's strategy for innovation should explicitly recognize and adapt to the pattern of innovation that best applies to its particular situation.

Innovation doesn't happen in a vacuum. Universally, organizations identified having a deep and broad understanding of the customer and market needs as being essential to the process of innovation. Although the importance of having talented creative individuals, a supportive corporate culture that fosters risk taking, and environment that encourages and rewards open innovation are important to the process of innovation. Without an established knowledge base of customer needs, market trends and the competitive environment, these innovation efforts lack direction and are less likely to lead to the desired innovation outcomes.

Macroeconomic measures of innovation although objective, are poor indicators of innovation success, and studies based purely on an analysis of macroeconomic factors provide little or no guidance in terms of identifying the organizational factors that lead to improvements in the practice of innovation within an organization. A better approach requires an in-depth assessment of the organizational culture and practices at a divisional level within an organization, to identify those practices which lead to the desired innovation outcomes.

Although patents, trademarks and registration of design are generally considered to be the best means of protecting intellectual property; this research study clearly shows that the use of confidentiality agreements, maintaining secrecy associated with new product/service innovation, and having a lead time advantage over the competition are far more important and widely used methods for protecting intellectual property. Organizations should therefore place greater emphasis on ensuring that these key foundations of IP protection are implemented and managed effectively.

Next Steps

The Survey was developed by AusInnovation, the group behind the Australian Innovation Festival and in association with Philology Pty Ltd. The next stage is a more in-depth research study in each of the key patterns of innovation, to better understand the organizational processes, culture and internal factors leading to improved innovation outcomes.

This research could then form the basis for providing detailed prescriptive guidance to organizations wanting to improve their capacity for driving innovation outcomes that is appropriate to their particular "pattern" of innovation.

References

“Patterns of Innovation in Australian Businesses – 2005”

Australian Bureau of Statistics; Brian Pink;
November 2007 (ABS Catalogue No. 8163)

“European Innovation Scoreboard – 2005”

Comparative Analysis of Innovation Performance; European Commission;
www.trendchart.org

Further Information

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Appendices

Appendix A: Profile of Organizations that participated in the Survey

- A.1 Industry Sector
 - A.2 Organizational Size
 - A.3 Location and Scope of Operations
 - A.4 Ownership of the Organization
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Appendix B: Profile of Respondents that participated in the Survey

- B.1 Respondent's Involvement with Innovation activities
-

Appendix C: Tag Cloud Analysis of Open Ended Questions

- C.1 Barriers to Innovation
 - C.2 Most valuable co-operation partner for Innovation
 - C.3 Key Global Trends (5 year horizon)
 - C.4 Key Industry Trends (5 year horizon)
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Appendix D: Cross Tabulations of Key Metrics

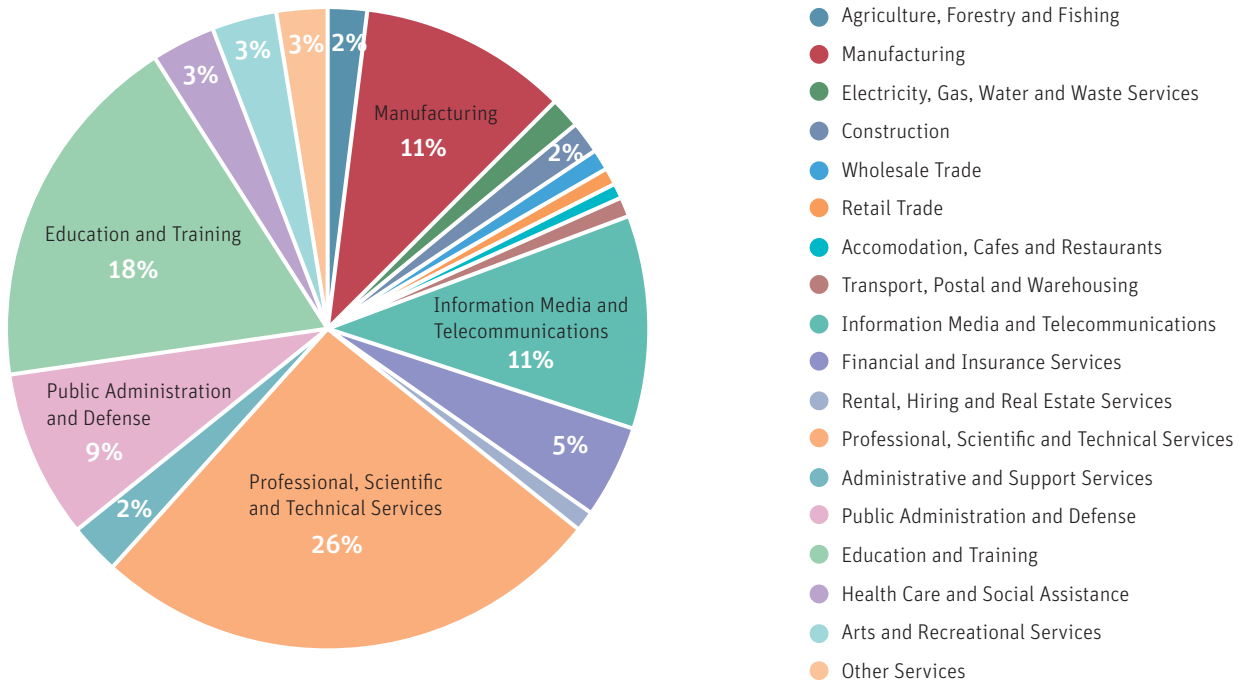
- D.1 Drivers of Innovation Cross Tabulation
 - D.2 Barriers to Innovation Cross Tabulation
 - D.3 Key Sources of Information for Innovation Cross Tabulation
 - D.4 Methods of Intellectual Property Cross Tabulation
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Appendix E: Australian Business, Innovation & Growth

- E.1 Related Research Surveys
 - E.2 ABIG Innovation Model
 - E.3 Annual Reports
 - E.4 Coordination and Advisory Board
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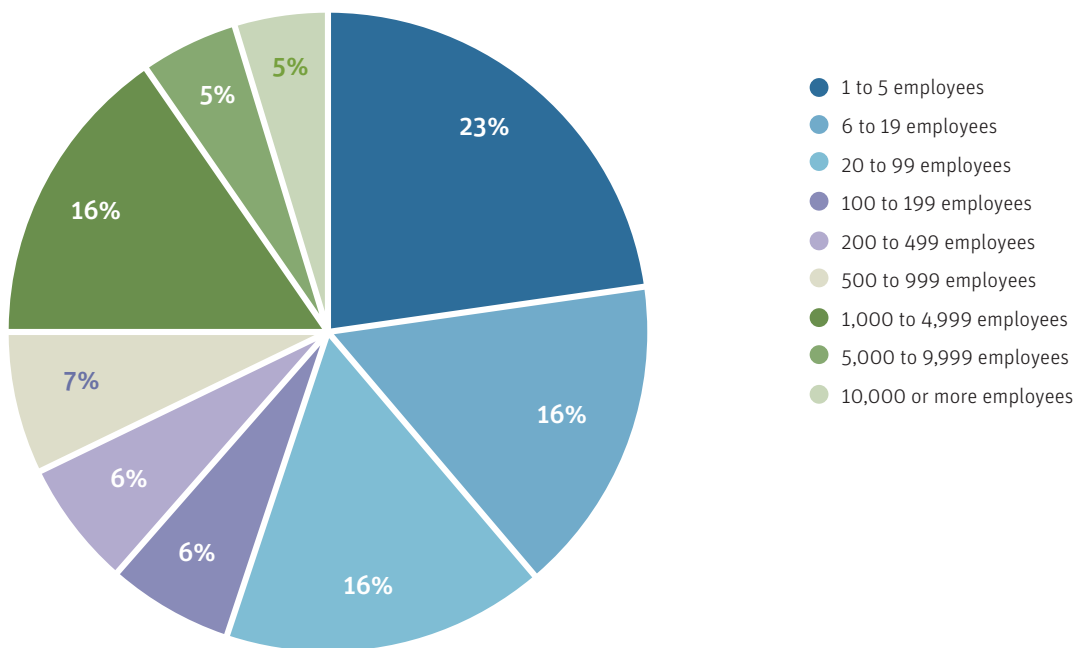
A.1 Industry Sector

Industry Sector Classification of Responding Organizations



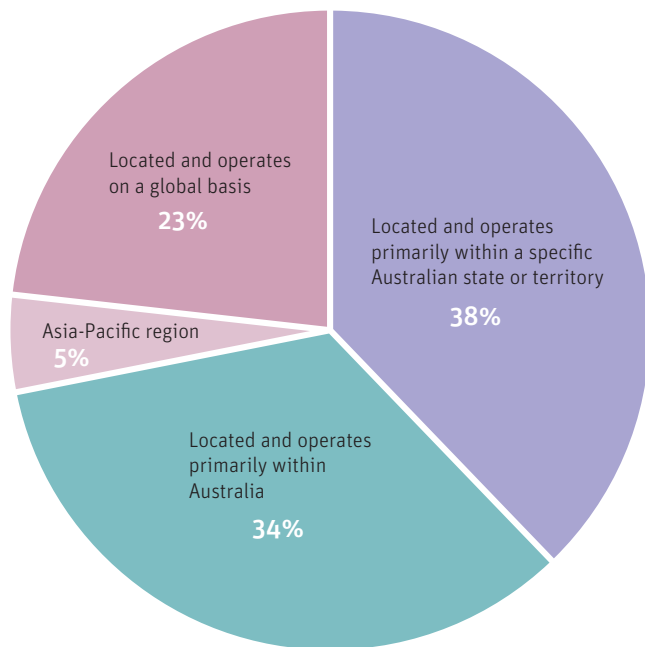
A.2 Organizational Size

Organizational Size [number of employees] in Australia



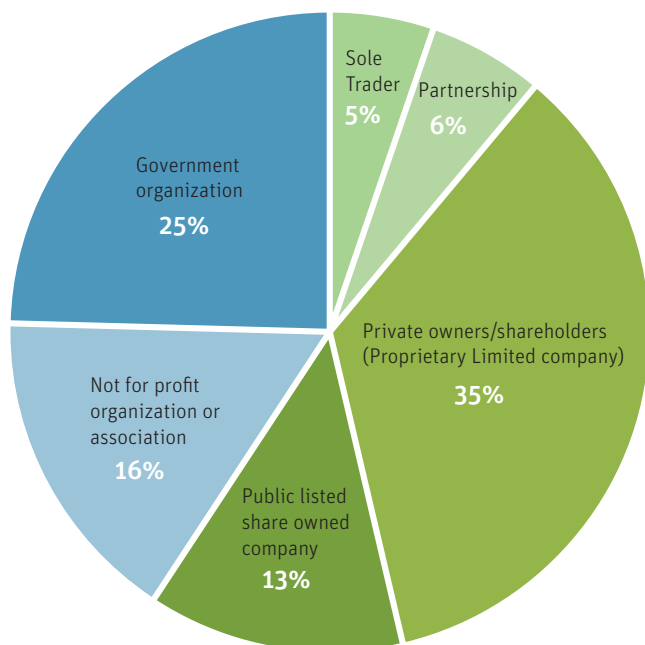
A.3 Location and Scope of Operations

Location and Scope of Operations for Responding Organizations



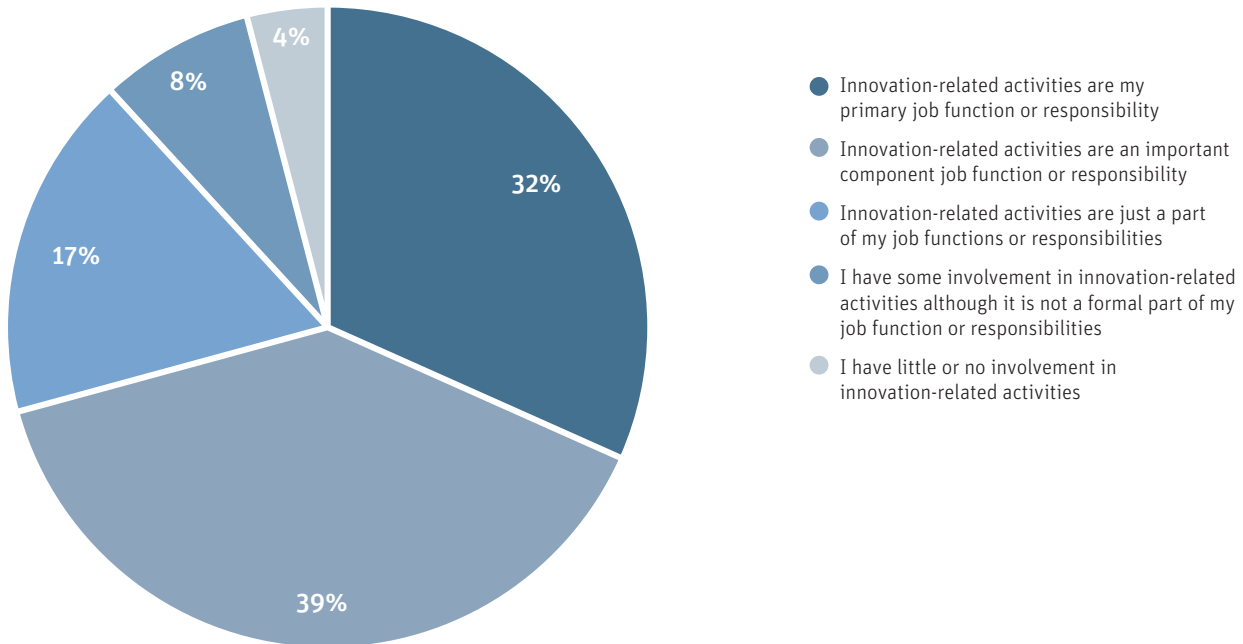
A.4 Ownership of the Organization

Ownership of Organization



B.1 Respondent Profile

Role of respondent in their organizations innovation related activities



C.2 Tag Cloud Analysis: Cooperation Partner

“Which type of co-operation partner was the most valuable for your organization’s innovation activities?”

academic agencies assisted Australian client
collaborative companies complementary
consultants crc CSIRO customers design
development funding government
industry informal innovation
institutions interests international involved joint knowledge
market national networks organisations
overseas partners private product profit
projects provided research science
sector services share similar software
state strategic suppliers support technology
university users

C.3 Tag Cloud Analysis: Major Global Trends

“Please describe any major GLOBAL trends or changes that you believe will impact your organization over the next 1 to 5 years.”

Asia **Australia** awareness based become **business**
change **China** **climate** companies
competition cost countries demand
development economic education
energy **environmental** focus
global globalisation government growing growth
impact important **India** industry **innovation**
international **market** mobile people
process **products** reducing require rise sector
services shortage skilled sustainability **technology**
trend value **water** wealth

C.4 Tag Cloud Analysis: Major Industry Trends

“Please describe any major INDUSTRY trends or changes that you believe will impact your organization over the next 1 to 5 years.

application Asia **Australian** base become
business change companies
competition continuing COSTS countries demand
development drive education environment
environmental funding **global government**
greater growth higher impact important industry
information **innovation** international internet issues
manufacturing **markets** online
opportunities people products reduced regulations
requirements **sector services** significant skills
systems **technology** trend

D.1 Drivers of Innovation

The questions in this section were designed to better understand the relative importance of the factors that drive an organization to innovate.

How important are each of the following factors **in terms of driving innovation opportunities in your organisation?**

Use a scale from 0 to 10 where 0 means that the factor was NOT AT ALL IMPORTANT and 10 means that the factor was EXTREMELY IMPORTANT

Drivers of Innovation: Category/Factor	Total		Organization size						Technology orientation		Scope of operations					
	Mean	Rank	Small (1-99)		Medium (100-999)		Large (1000+)		Mean	Rank	Local		National		International	
	N=270		N=153		N=50		N=67		N=105		N=105		N=89		N=73	
Profit Related Factors																
1. Improve Productivity	8.0	3	7.8	5	8.3	2	8.1	2	8.0	4	7.7	3	8.1	3	8.2	4
2. Increase Revenue	8.0	4	8.3	3	6.8	7	7.7	4	8.5	3	7.6	4	7.8	4	8.3	3
3. Reduce Costs	7.1	7	7.1	7	6.9	4	7.4	8	7.1	7	7.0	6	7.3	6	7.0	8
	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank
Market Related Factors																
1. Be at the cutting edge of industry	8.2	2	8.5	2	7.9	3	7.6	6	8.6	2	7.8	2	8.1	2	8.8	1
2. Increase responsiveness to customer needs	8.6	1	8.7	1	8.7	1	8.2	1	8.8	1	8.5	1	8.7	1	8.6	2
3. Establish a new market	7.5	5	8.0	4	6.6	8	6.8	10	7.8	5	7.4	5	7.4	5	7.7	6
4. Exploit new ways to manage this business's supply chain	6.0	11	6.0	12	5.3	11	6.3	11	5.6	10	5.3	11	6.2	10	6.5	13
5. Increase market share	7.2	6	7.5	6	6.4	9	7.3	9	7.5	6	7.0	8	6.8	9	8.0	5
6. Increase export opportunities	5.7	12	6.2	10	4.8	12	5.2	13	5.6	12	5.3	12	5.3	12	6.8	10
7. High degree of price competition in this business's product markets	5.2	13	5.3	13	4.1	13	5.8	12	5.2	13	4.8	13	4.7	13	6.5	12
	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank	Mean	Rank
Legal Related Factors																
1. Be environmentally responsible	6.9	9	6.6	8	6.8	6	7.7	5	6.5	8	7.0	7	6.9	7	6.9	9
2. Improve safety or working conditions	6.4	10	5.9	11	6.3	10	7.5	7	6.5	8	6.6	10	6.1	11	6.5	11
3. Meet Government regulation or standards	7.0	8	6.5	9	6.9	5	7.8	3	6.3	9	6.7	9	7.0	8	7.2	7

D.2 Barriers to Innovation

The questions in this section were designed to explore the respondent's perceptions of the barriers or constraints to innovation that are present in their organization.

In the past year how significant were each of the following factors in hampering your organization's innovation-related activities or projects or influencing a decision NOT to innovate?

Barriers to Innovation: Category/Factor	Total		Organization size						Technology orientation		Scope of operations					
	Mean*	Rank	Small (1-99)		Medium (100-999)		Large (1000+)		Mean	Rank	Local		National		International	
	N=245		N=140		N=40		N=65		N=105		N=98		N=81		N=67	
Cost Factors																
1. Lack of funds within your organization or group	7.4	1	7.9	1	6.4	2	6.7	2	7.4	1	7.6	1	7.4	1	7.4	1
2. Lack of finance from sources outside your organization	6.5	2	7.1	2	5.5	7	5.6	5	6.4	3	6.8	3	6.6	4	6.2	4
3. Innovation costs too high	6.1	6	6.1	7	6.5	3	5.9	6	5.6	8	6.4	6	5.8	6	6.0	5
	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank
Knowledge Factors																
1. Lack of qualified personnel	6.5	3	6.2	5	6.8	1	7.0	1	6.4	4	6.4	4	6.8	3	6.4	2
2. Lack of information on technology	5.5	9	5.2	9	6.3	4	5.7	8	5.4	9	5.6	9	5.6	9	5.0	9
3. Lack of information on markets	5.7	8	5.6	8	5.7	6	5.9	7	5.4	7	6.2	7	6.2	7	5.2	8
4. Difficulty in finding co-operation partners for innovation	5.8	7	6.1	6	5.2	9	5.6	9	6.2	5	6.2	8	5.8	7	5.2	7
	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank
Market Factors																
1. Market dominated by established organizations	6.4	5	6.5	4	5.8	8	6.3	3	6.0	6	6.4	5	6.2	5	6.4	3
2. Uncertain demand for innovative goods or services	6.5	4	6.8	3	5.9	5	6.4	4	6.8	2	6.8	2	6.8	2	5.6	6
	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank	Mean*	Rank
Other Factors																
1. No need due to prior innovations	4.3	10	4.3	10	4.3	10	4.3	11	4.6	10	4.4	10	4.4	10	3.8	10
2. No need because of no demand for innovations	4.2	11	4.2	11	4.1	11	4.4	10	4.6	11	4.2	11	4.4	11	3.8	11

* Adjusted to 0-10 point scale based on mapping 0-5 point Liked scale questions.

3. Sources of Information and co-operation for Innovation activities

The questions in this section were designed to better understand the sources that organizations use to help them innovate, and their relative importance.

How important are the following sources of information in developing innovation for your organization?

Use a scale from 0 to 10 where 0 means that the source was NOT AT ALL IMPORTANT and 10 means that the source was EXTREMELY IMPORTANT

Sources of Information: Category/Source	Total				Organization size			Technology orientation			Scale of operations			
	All Respondents N=240	Small (1-99) N=138	Medium (100-999) N=39	Large (1000+) N=63	Hi-Tech (I/MS/ctech) N=95	Local N=98	National N=79	International N=68	Mean	Rank	Mean	Rank	Mean	Rank
Internal Sources														
1. Within the organization	Mean 8.4 Rank 2	Mean 8.4 Rank 2	Mean 8.1 Rank 2	Mean 8.5 Rank 1	Mean 8.2 Rank 2	Mean 8.2 Rank 2	Mean 8.4 Rank 2	Mean 8.6 Rank 2	8.2	2	8.4	2	8.6	2
2. Part of a wider enterprise group that this organization belongs to	Mean 6.4 Rank 9	Mean 5.8 Rank 11	Mean 7.1 Rank 3	Mean 7.1 Rank 3	Mean 6.5 Rank 7	Mean 6.6 Rank 7	Mean 6.2 Rank 8	Mean 6.2 Rank 8	6.6	7	6.2	9	6.2	8
Market Sources														
1. Clients, customers or partners	Mean 8.6 Rank 1	Mean 8.6 Rank 1	Mean 8.8 Rank 1	Mean 8.2 Rank 2	Mean 8.9 Rank 1	Mean 8.4 Rank 1	Mean 8.8 Rank 1	Mean 8.5 Rank 1	8.6	1	8.8	1	8.5	1
2. Suppliers of equipment, materials, components or software	Mean 6.3 Rank 7	Mean 6.4 Rank 7	Mean 6.6 Rank 5	Mean 5.9 Rank 11	Mean 6.2 Rank 9	Mean 5.9 Rank 9	Mean 6.4 Rank 6	Mean 6.8 Rank 5	6.3	7	6.4	6	6.8	3
3. Consultants (including paid professionals and advisors)	Mean 6.0 Rank 11	Mean 5.9 Rank 10	Mean 6.3 Rank 7	Mean 5.9 Rank 12	Mean 5.8 Rank 10	Mean 6.2 Rank 8	Mean 6.3 Rank 10	Mean 5.2 Rank 12	6.2	8	6.3	10	5.2	12
4. Competitors and other business from the same industry	Mean 6.5 Rank 6	Mean 6.5 Rank 5	Mean 6.3 Rank 8	Mean 6.6 Rank 8	Mean 7.1 Rank 4	Mean 6.3 Rank 7	Mean 6.8 Rank 5	Mean 6.5 Rank 4	6.5	6	6.8	5	6.5	4
Institutional Sources														
1. Universities or other higher education sources	Mean 6.3 Rank 10	Mean 6.0 Rank 9	Mean 6.0 Rank 9	Mean 7.0 Rank 5	Mean 5.9 Rank 11	Mean 7.2 Rank 2	Mean 5.9 Rank 11	Mean 5.3 Rank 11	6.3	10	6.0	11	5.3	16
2. CSIRO	Mean 4.0 Rank 16	Mean 3.7 Rank 17	Mean 4.1 Rank 16	Mean 4.6 Rank 15	Mean 4.0 Rank 17	Mean 4.7 Rank 14	Mean 3.9 Rank 16	Mean 3.0 Rank 16	4.0	16	4.1	16	3.0	16
3. CRCs (Cooperative Research Centres)	Mean 4.3 Rank 14	Mean 4.0 Rank 15	Mean 4.4 Rank 14	Mean 4.9 Rank 14	Mean 4.4 Rank 15	Mean 5.0 Rank 12	Mean 4.3 Rank 14	Mean 3.4 Rank 15	4.3	14	4.3	14	3.4	15
4. Other government agencies	Mean 5.4 Rank 13	Mean 5.4 Rank 13	Mean 5.2 Rank 13	Mean 5.6 Rank 13	Mean 5.1 Rank 13	Mean 5.9 Rank 10	Mean 5.6 Rank 13	Mean 4.7 Rank 13	5.4	13	5.2	13	4.7	13
5. Private non-profit research institutions	Mean 4.0 Rank 17	Mean 3.8 Rank 16	Mean 4.1 Rank 17	Mean 4.2 Rank 17	Mean 4.3 Rank 14	Mean 4.5 Rank 15	Mean 4.1 Rank 15	Mean 3.0 Rank 17	4.0	17	4.1	17	3.0	17
6. Commercial laboratories or R&D enterprises	Mean 4.2 Rank 15	Mean 4.1 Rank 14	Mean 4.3 Rank 15	Mean 4.5 Rank 16	Mean 4.1 Rank 16	Mean 4.8 Rank 13	Mean 3.7 Rank 17	Mean 3.8 Rank 14	4.2	15	4.3	15	3.8	14
Other Sources														
1. Conferences, trade fairs and exhibitions	Mean 6.6 Rank 5	Mean 6.5 Rank 6	Mean 6.8 Rank 4	Mean 6.7 Rank 7	Mean 6.7 Rank 6	Mean 6.7 Rank 4	Mean 6.8 Rank 7	Mean 5.9 Rank 9	6.6	5	6.8	4	6.7	9
2. Scientific journals and trade/technical publications	Mean 6.3 Rank 8	Mean 6.2 Rank 8	Mean 5.7 Rank 11	Mean 6.8 Rank 6	Mean 6.5 Rank 8	Mean 6.5 Rank 6	Mean 6.5 Rank 8	Mean 6.2 Rank 7	6.3	8	5.7	11	6.2	7
3. Professional and industry associations	Mean 6.7 Rank 3	Mean 6.6 Rank 4	Mean 6.5 Rank 6	Mean 7.1 Rank 4	Mean 6.8 Rank 5	Mean 7.1 Rank 3	Mean 7.1 Rank 3	Mean 6.0 Rank 10	6.7	3	6.5	6	6.0	10
4. Technical, industry or service standards	Mean 5.8 Rank 12	Mean 5.5 Rank 12	Mean 5.7 Rank 12	Mean 6.5 Rank 9	Mean 5.6 Rank 12	Mean 5.7 Rank 11	Mean 5.7 Rank 12	Mean 6.2 Rank 6	5.8	12	5.7	12	6.2	6
5. Other sources of ideas or information	Mean 6.6 Rank 4	Mean 7.0 Rank 3	Mean 6.0 Rank 10	Mean 6.3 Rank 10	Mean 7.1 Rank 3	Mean 6.7 Rank 5	Mean 6.8 Rank 4	Mean 6.3 Rank 5	6.6	4	6.0	10	6.3	5

4. Intellectual Property

The questions in this section were designed to better understand the role that formal mechanisms for generating and protecting intellectual property have in understanding the process of innovation.

Please rate the importance of the following intellectual property (IP) related methods to your organization.

Use a scale from 0 to 10 where 0 means that the method was NOT AT ALL IMPORTANT and 10 means that the method

Methods for Protecting IP: Category/Method	Total		Organization size			Technology orientation		Scale of operations						
	All Respondents N=235	Mean	Small (1-99) N=136	Medium (100-999) N=37	Large (1000+) N=62	Hi-Tech (I/MS/ctech) N=57	Local N=74	National N=77	International N=65					
Formal Methods														
1. Registration of design	Mean 5.5 Rank 8	Mean 5.3 Rank 8	Mean 5.2 Rank 7	Mean 6.2 Rank 7	Mean 5.6 Rank 8	Mean 5.3 Rank 8	Mean 5.0 Rank 8	Mean 6.3 Rank 8	5.5	8	5.0	8	6.3	8
2. Trademarks	Mean 6.6 Rank 4	Mean 6.9 Rank 5	Mean 5.5 Rank 5	Mean 7.1 Rank 5	Mean 6.9 Rank 5	Mean 6.9 Rank 5	Mean 6.5 Rank 5	Mean 7.6 Rank 4	6.6	4	6.9	5	7.6	4
3. Patents	Mean 6.5 Rank 6	Mean 6.6 Rank 4	Mean 5.4 Rank 6	Mean 6.9 Rank 6	Mean 6.9 Rank 6	Mean 6.9 Rank 6	Mean 6.1 Rank 6	Mean 7.6 Rank 5	6.5	6	6.1	6	7.6	5
4. Confidentiality Agreements	Mean 8.1 Rank 1	Mean 8.2 Rank 1	Mean 6.8 Rank 2	Mean 8.4 Rank 1	Mean 8.5 Rank 1	Mean 8.5 Rank 1	Mean 7.8 Rank 1	Mean 8.7 Rank 1	8.1	1	8.1	1	8.7	1
Strategic Methods														
1. Secrecy	Mean 7.1 Rank 3	Mean 7.3 Rank 3	Mean 6.1 Rank 3	Mean 7.2 Rank 3	Mean 7.6 Rank 3	Mean 7.6 Rank 3	Mean 7.2 Rank 2	Mean 7.7 Rank 3	7.1	3	6.1	3	7.7	3
2. Complexity of Design	Mean 5.7 Rank 7	Mean 5.8 Rank 7	Mean 5.0 Rank 8	Mean 6.1 Rank 8	Mean 6.0 Rank 7	Mean 6.0 Rank 7	Mean 5.5 Rank 7	Mean 6.7 Rank 7	5.7	7	5.1	7	6.7	7
3. Lead time advantage on competitors	Mean 7.5 Rank 2	Mean 7.5 Rank 2	Mean 7.1 Rank 1	Mean 7.6 Rank 2	Mean 7.7 Rank 2	Mean 7.7 Rank 2	Mean 7.1 Rank 3	Mean 8.7 Rank 2	7.5	2	7.1	3	8.7	2
4. Copyright	Mean 6.7 Rank 5	Mean 6.8 Rank 5	Mean 5.9 Rank 4	Mean 7.2 Rank 4	Mean 7.5 Rank 4	Mean 7.5 Rank 4	Mean 6.6 Rank 4	Mean 7.1 Rank 5	6.7	5	5.9	5	7.1	6

E.1 Further Innovation Research

The Australian Business, Innovation and Growth (ABIG) Index has been established to analyse business innovation and review emerging trends that underpin sustainable corporate growth.

This inaugural 2008 National Innovation Survey was sent to senior executives representing leading Australian and international organisations. The major premise underlining this Survey is that growing organisations are adept at building existing operations while creating new business initiatives. Current management and industry studies support the notion that “the more innovative and entrepreneurial a company, the higher the growth orientation and performance”.

The ABIG index is based on a comprehensive and dynamic Innovation Model, as indicated on the next page. This Model and the ABIG research approach has been extensively reviewed and an eminent Advisory Board has also been established to review and validate survey findings at all stages. Research findings from this Survey will identify and showcase major innovation practices over the past financial year. Respondents will be sent the Survey Report, to be released in 2008.

This Survey has been developed by AusInnovation, the group behind the Australian Innovation Festival and Leaders of Innovation series. Philology Pty Ltd coordinated the research analysis and key findings.

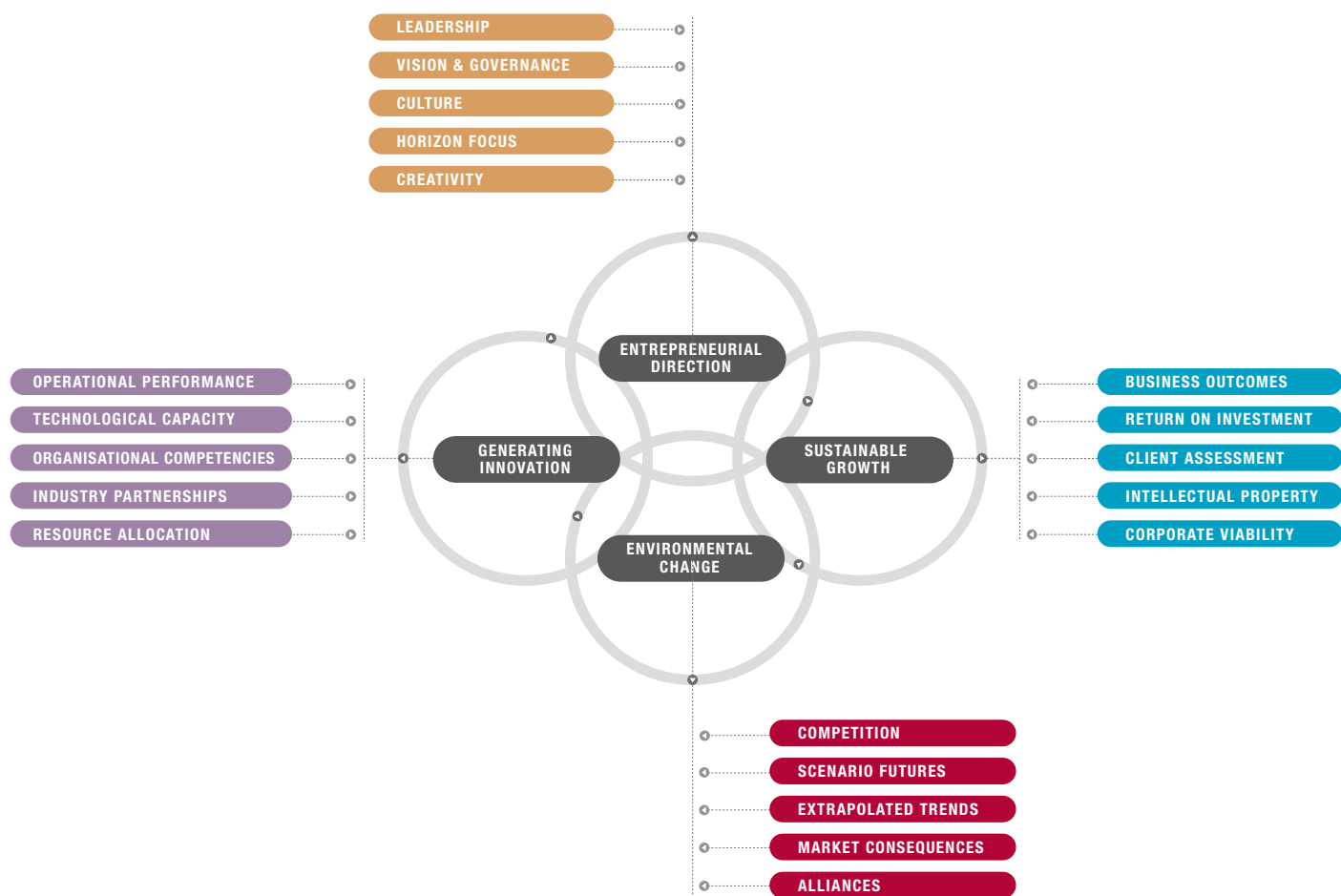
AusInnovation is Australia’s pre-eminent innovation advisory and research group. We specialise in working with medium to large business to create sustainable innovation solutions. Our highly skilled senior team has international track records in running successful innovation programs. In addition, we use our extensive network both here and overseas, to help businesses turn good ideas into long term commercial success.

The annual Australian Innovation Festival is organised with Federal, State and Territory Governments, universities and 150 national industry associations. The 2008 Festival included 17 associate innovation festivals, over 600 events and attracted over 400,000 participants throughout metropolitan and country Australia. The current Leaders of Innovation series is organised with Austrade, Business Council of Australia and international business councils from Japan, UK, India, Germany, US, China and other governments.

AusInnovation has close working relationships with government agencies throughout Australia, who are responsible for assisting and resourcing innovation initiatives that have beneficial commercial outcomes. We also work with national industry associations, all Australian universities, international partners and major media organisations.

We represent the largest network of innovative organisations in this country, through our national festivals, business events, research projects, industry benchmarking studies and advisory services. With our resources, expertise and international connections, AusInnovation can build significant innovation opportunities for your business.

E.2 ABIG innovation Model



This dynamic Innovation Model to analyse and better understand the complexity inherent with innovative organisational performance (large, SME and emerging). We continually research business innovation in Australia and overseas, so that we can advise our partners of major trends and environmental changes affecting industry sectors in the future.

E.3 Annual Reports

The ABIG Index will make an important contribution to Australian innovation, by providing benchmarks of business activity, performance indicators and outstanding examples of organisational evolution.

The three annual Reports indicated below, will use major strategic management tools to enhance business capacity and highlight best practice in Australia. Report outcomes will present different aspects of corporate growth; ranging from emerging strategies and innovative processes to significant business building activities. Further surveys will follow the National Innovation Survey including the following:

Report 1: Business Insight

Australia's leading 100 innovative organisations (large, SME and emerging) in 19 ANZSIC industry sectors. This 1st ABIG Report will showcase innovation excellence in Australian and international organisations, based on entrepreneurial direction, generating innovation and corporate growth.

Report 2: Future Growth

Major global trends and changes affecting business growth (short term to next 10 years). More than 100 national industry associations will provide further data for this 2nd ABIG Report on extrapolated trends, competition and rivalry, industry alliances, scenario futures, technology impact and market consequences.

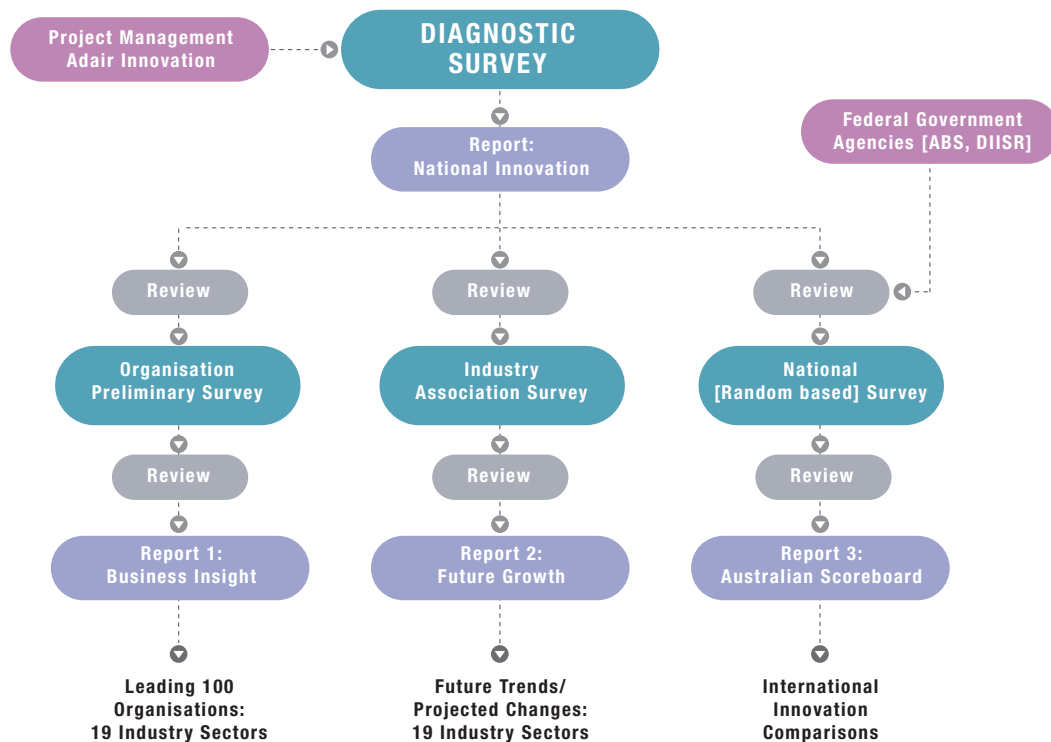
Report 3: Australian Scoreboard

An annual international comparative analysis of Australian innovation performance with selected countries. In conjunction with federal government agencies and Australian universities, there is scope to produce an Australian version of the annual European Innovation Scoreboard. This will increase innovation related economic indicators being measured from 15 to 25 in Australia. At present, 25 indicators - Input (innovation drivers, knowledge creation, innovation & entrepreneurship) and Output (applications & intellectual property) - are being used to assess innovation performance (national and major regional areas) for 27 EU countries.

Business Insight		Future Growth	
Entrepreneurial Direction	Generating Innovation	Sustainable Growth	Environmental Change
Leadership	Operational Performance	Outcomes	Competition
Vision & Governance	Technological Capacity	Return on Investment	Scenario Futures
Culture	Organisational Competencies	Client Assessment	Extrapolated Trends
Horizon Focus	Industry Partnerships	Intellectual Property	Market Consequences
Creativity	Resource Allocation	Corporate Viability	Alliances

E.4 Coordination and Advisory Board

ABIG Index



Timetable	Report National Innovation	Report 1 Business Insight	Report 2 Future Growth	Report 3 Australian Scoreboard
Review	July 2007	January 2008	January 2008	January 2008
Survey	November 2007	July 2008	October 2008	January 2009
Review	December 2007	August 2008	November 2008	February 2009
Report	June 2008	September 2008	December 2008	March 2009

ABIG Advisory Board members participate in the review process, prior to the release of each ABIG Report. This expert advice is essential in assessing the research approach, validating findings and ensuring practical conclusions for respondents, organisations, industry sectors and interested groups.

ABIG Advisory Board

Member	Position	Organisation	State
Matthew Ayres	Head	Growth & Innovation, AMP Limited	NSW
David Hanna	Deputy Secretary	Dept. of Innovation, Industry & Regional Development	VIC
Sue Bell	Director	Innovation & Knowledge Transfer, La Trobe University	VIC
Greg Boundy	Manager	SA Centre for Innovation, SA Government	SA
Kelly Claudius	Director	Business Development, CSIRO	NSW
Ian Cox	Director	Business and Industry, ACT Government	ACT
Rowan Gilmore	CEO	Australian Institute for Commercialisation	QLD
Roy Green	Professor & Dean	Macquarie Graduate School of Management	NSW
Tim Harcourt	Chief Economist	Australian Trade Commission	NSW
Philip Cookson	Director	Philology Pty Ltd	VIC
Leonie Valentine	General Manager	Innovation Marketing, Government and Enterprise, Telstra	VIC
Joe Ostojich	Director	Research & Commercialisation, WA Dept. Industry and Resources	WA
Michael O'Sullivan	Executive Director	Industry, NSW Department of State & Regional Development	NSW
Peter Pedersen	Chair	Illawarra Innovation Showcase	NSW
Tracy Scott-Rimington	Manager	Industry Clusters, Cairns REDC	QLD
Wendy Spencer	Director	Innovation, Science & Technology, TAS Dept. Economic Development	TAS
Glyn Prichard	Director	Innovation & Technology, Australian Bureau of Statistics	ACT
Peter Westfield	Chair	Australian Innovation Festival	VIC
Bruce Whan	Chair & Director	INNOVIC & Swinburne Knowledge, Swinburne University	VIC
Peter Williams	Partner	Deloitte Australia	VIC

