

# COUNTRY: AUSTRALIA

SCORE: 79.92 | RANK: 2/24

Australia is keen to promote cloud computing through the development and reform of relevant laws, regulations, and standards. For example, Australia has a strong commitment to international cooperation, free trade, and interoperability. Key laws are based on international models, and Australia is an active participant in the development of international standards.

Australia has up-to-date cybercrime laws and ratified the Convention on Cybercrime in late 2012. Australia also has comprehensive electronic signature and electronic commerce laws in place. In 2012 Australia passed further improvements to its existing privacy legislation, including stronger powers for the regulator.

Intellectual property laws in Australia provide a comprehensive and balanced layer of protection for cloud computing services and the digital economy. However,

some uncertainty remains regarding ISP liability for copyright breaches that occur when subscribers participate in peer-to-peer sharing of copyrighted material.

In 2012 Australia dropped a long-term proposal for mandatory Internet content filtering that may have acted as a barrier for innovation in the digital economy.

Australian ICT infrastructure is reasonably well developed, and significant progress has been made in the rollout of a National Broadband Network that will provide further capacity to facilitate the digital economy.

Overall, Australia's scorecard results remained fairly stable in the 2013 report. Improvements in the country's security and cybercrime laws settings were offset by a small reduction in ICT infrastructure, and the country remained in 2nd place in the Scorecard rankings.

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<b>DATA PRIVACY</b>		
1. Are there laws or regulations governing the collection, use, or other processing of personal information?	✓	The Privacy Act 1988 (Cth) requires private-sector organizations to comply either with the Australian Privacy Principles or an industry code formally approved by the regulator in their collection, use, disclosure, and handling of an individual's personal information. The legislation was heavily amended in 2012, resulting in increased penalties and a wider range of powers for the regulator.
2. What is the scope and coverage of privacy law?	Comprehensive	The Privacy Act is relatively comprehensive, although it contains exemptions for small businesses and employee records. In addition, some states and territories have their own privacy legislation covering state government agencies and/or health providers.
3. Is the privacy law compatible with the Privacy Principles in the EU Data Protection Directive?	ⓘ	The Australian law is broadly compatible with the EU Directive, however, it contains significant exemptions for small business and employee records.
4. Is the privacy law compatible with the Privacy Principles in the APEC Privacy Framework?	✓	The current privacy legislation is compliant with the APEC Privacy Framework.
5. Is an independent private right of action available for breaches of data privacy?	Not available	An individual right of action is not available now, but the establishment of such a right has been recommended by the Australian Law Reform Commission. The government is considering this recommendation.
6. Is there an effective agency (or regulator) tasked with the enforcement of privacy laws?	National regulator	The privacy commissioner regulates privacy at the Commonwealth level. Similar bodies are in place in some states.  The privacy commissioner is part of the Office of the Australian Information Commissioner (OAIC) < <a href="http://www.oaic.gov.au">www.oaic.gov.au</a> >.
7. What is the nature of the privacy regulator?	Sole commissioner	The commissioner is a sole commissioner, although some powers are split between the Information Commissioner and the Privacy Commissioner.
8. Are data controllers free from registration requirements?	✓	There are no registration requirements for private-sector organizations in Australian privacy law.
9. Are cross-border transfers free from registration requirements?	✓	There are no registration requirements for private-sector organizations in Australian privacy law.

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10. Is there a breach notification law?	✘	Voluntary breach notification guidelines have been in place since August 2008. < <a href="http://www.privacy.gov.au/materials/types/guidelines/view/6478">www.privacy.gov.au/materials/types/guidelines/view/6478</a> > Mandatory breach notification requirements are under consideration by the government and are the subject of a current (November 2012) public discussion paper by the Attorney General's Department < <a href="http://www.ag.gov.au/Consultations/Pages/AustralianPrivacyBreachNotification.aspx">www.ag.gov.au/Consultations/Pages/AustralianPrivacyBreachNotification.aspx</a> >.
<b>SECURITY</b>		
1. Is there a law or regulation that gives electronic signatures clear legal weight?	✔	The federal Electronic Transactions Act 1999 (Cth) recognizes and enforces electronic signatures. Similar laws are in place at the state level. These laws are being amended to align the electronic signature requirements with the UN Convention on the Use of Electronic Communications in International Contracts 2005, a process that is nearly complete.
2. Are ISPs and content service providers free from mandatory filtering or censoring?	✔	At the time of writing there is no comprehensive law in place for Internet filtering or censorship. However, the Australian Communications and Media Authority (ACMA) < <a href="http://www.acma.gov.au">www.acma.gov.au</a> > can issue "takedown" notices for certain Web sites hosted in Australia.  Proposals to introduce mandatory ISP-level content filtering were withdrawn by the government in 2012.
3. Are there laws or enforceable codes containing general security requirements for digital data hosting and cloud service providers?	Limited coverage in legislation	Limited requirements are in place regarding security requirements. These are contained in Australian Privacy Principle 11 (Security) in the Privacy Act 1988.
4. Are there laws or enforceable codes containing specific security audit requirements for digital data hosting and cloud service providers?	None	No security audit requirements are in place in Australian law.
5. Are there security laws and regulations requiring specific certifications for technology products?	Limited requirements	There are no laws or regulations in Australia governing security certifications for technology products. A small number of individual procurement opportunities may express a preference for Common Criteria certification (typically in the defense and intelligence sectors).  Australia is a Certificate Authorizing Member of the Common Criteria Recognition Agreement (CCRA) < <a href="http://www.commoncriteriaportal.org">www.commoncriteriaportal.org</a> >.
<b>CYBERCRIME</b>		
1. Are cybercrime laws in place?	✔	The Cybercrime Act 2001 (Cth) commenced on April 1, 2002. It made a range of amendments to the Criminal Code in order to update the list of computer offenses. These offenses are comprehensive.
2. Are cybercrime laws consistent with the Budapest Convention on Cybercrime?	✔	Australian law is very similar to the Convention on Cybercrime.  The Cybercrime Legislation Amendment Act 2012 was passed by Parliament in August 2012. It makes minor amendments to law enforcement cooperation powers that are designed to facilitate Australia's accession to the Convention on Cybercrime. The Australian government ratified the Convention in November 2012.
3. What access do law enforcement authorities have to encrypted data held or transmitted by data hosting providers, carriers, or other service providers?	Access with a warrant	Under Section 3LA of the Crimes Act 1914 (Cth), an order may be applied from the magistrate requiring a specified person to provide any information or assistance that is reasonable and necessary to allow the officer to: (a) access data held in or accessible from a computer that is on the warrant premises; and (b) convert the data into documentary form.  The magistrate may grant the order under subsection (2) if: (d) the specified person has relevant knowledge of measures applied to protect data held in the computer; (e) there are reasonable grounds for suspecting the evidential material is held in, or is accessible from, the computer; and (f) the specified person is reasonably suspected of having committed the offense stated in the relevant warrant.

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4. How does the law deal with extraterritorial offenses?	Comprehensive coverage	Under Section 476.3 of Schedule 1 to the Cybercrime Act 2001 (Cth), the geographical scope of the computer offenses have been extended to territories outside Australia, provided that: <ul style="list-style-type: none"> <li>(i) a result of the conduct occurs wholly or partly in Australia;</li> <li>(ii) by an Australian citizen;</li> <li>(iii) by a body corporate incorporated under Australian law; or</li> <li>(iv) the offense is ancillary to a primary offense which occurs or is intended to occur, or the result of which occurs or is intended to occur, wholly or partly in Australia</li> </ul>
<b>INTELLECTUAL PROPERTY RIGHTS</b>		
1. Is the country a member of the TRIPS Agreement?	✓	Australia became a member of the TRIPS Agreement in 1995.
2. Have IP laws been enacted to implement TRIPS?	✓	Australia has implemented the provisions of the TRIPS Agreement in local laws.
3. Is the country party to the WIPO Copyright Treaty?	✓	The WIPO Copyright Treaty entered into force in Australia in 2007.
4. Have laws implementing the WIPO Copyright Treaty been enacted?	✓	Australia has implemented the measures in the WIPO Copyright Treaty in local laws.
5. Are civil sanctions available for unauthorized making available (posting) of copyright holders' works on the Internet?	✓	The right is set out in Section 31 of the Copyright Act 1968 (Cth) and the infringement is set out in Section 36.
6. Are criminal sanctions available for unauthorized making available (posting) of copyright holders' works on the Internet?	✓	Section 132AC of the Copyright Act 1968 (Cth) is a broadly based section and will catch individuals who engage in conduct that results in one or more infringements of the copyright in a work or other subject matter and the infringement or infringements have a substantial prejudicial impact on the owner of the copyright; and the infringement or infringements occur on a commercial scale. Commercial scale under Section 132AC(5) includes the consideration of the volume and value of any articles that are infringing copies that constitute the infringement or infringements and any other relevant matter.
7. Are there laws governing ISP liability for content that infringes copyright?	Undecided	The Australian High Court, in <i>iiNet v. AFACT</i> , has determined that ISP liability for infringing material does not extend to a requirement to assist in enforcement except in very limited circumstances. Refer to <i>Roadshow Films Pty Ltd v. iiNet Ltd</i> [2012] HCA 16 (20 April 2012), < <a href="http://www.austlii.edu.au/au/cases/cth/HCA/2012/16.html">www.austlii.edu.au/au/cases/cth/HCA/2012/16.html</a> >. <p>The Internet Industry Association (IIA) has begun developing a new code of conduct for ISPs concerning copyright enforcement based on the findings of the court. However, a draft code has yet to be published. See &lt;<a href="http://iia.net.au/task-forces/iia-copyright-code-development-group.html">http://iia.net.au/task-forces/iia-copyright-code-development-group.html</a>&gt;.</p>
8. Is there a basis for ISPs to be held liable for content that infringes copyright found on their sites or systems?	✓	Refer to Section 36 of the Copyright Act 1968 (Cth) for authorization of copyright infringement and to the case of <i>Cooper v. Universal Music</i> [2006] FCAFC 187 in the federal court. In that case, the ISP was found to be intimately involved in Cooper's Web site < <a href="http://mp3s4free.com">mp3s4free.com</a> >, which had links to free music.
9. What sanctions are available for ISP liability for copyright infringing content found on their site or system?	Civil and criminal	For IP infringement the only basis for criminal sanctions is where the amount of content is of a commercial scale. Refer to Section 132AC(5) of the Copyright Act 1968 (Cth). There is no other basis for criminal liability in Australian law.
10. Must ISPs take down content that infringes copyright, upon notification by the right holder?	✓	Refer to the Copyright Regulations (Cth) <ul style="list-style-type: none"> <li>Part 3A — Limitation of remedies against carriage service providers</li> <li>Division 3A.4 — Conditions — Takedown of copyright material following notice from copyright owner</li> <li>Regulation 20I. Notice of claimed infringement</li> <li>Regulation 20J. Takedown procedure</li> </ul>
11. Are ISPs required to inform subscribers upon receiving a notification that the subscriber is using the ISP's service to distribute content that infringes copyright?	✓	Refer to Regulation 20J(2) of the Copyright Regulations (Cth)
12. Is there clear legal protection against misappropriation of cloud computing services, including effective enforcement?	Comprehensive protection	Australia does not have specific legislation for cloud computing. However, Australia offers a combination of very strong IP protection and up-to-date cybercrime provisions, complemented by relatively strong privacy law. These provisions provide a high level of protection for cloud computing services.

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<b>SUPPORT FOR INDUSTRY-LED STANDARDS &amp; INTERNATIONAL HARMONIZATION OF RULES</b>		
1. Are there laws, regulations or policies that establish a standards-setting framework for interoperability and portability of data?	✓	Standards Australia < <a href="http://www.standards.org.au">www.standards.org.au</a> > has conducted some standards development work on data interoperability.
2. Is there a regulatory body responsible for standards development for the country?	✓	Standards Australia is an independent, non-profit company, not a government agency. However, a memorandum of understanding between Standards Australia and the Commonwealth government is in place.  This memorandum states that no Australian standard will contravene the World Trade Organization's requirements that national standards should not be used as non-tariff barriers to free trade. It also states that no new Australian standard will be developed where an acceptable international standard already exists.
3. Are e-commerce laws in place?	✓	The Electronic Transactions Act 1999 (Cth) sets out broad rules for the recognition of electronic records, electronic signatures and electronic contracts. Similar laws are in place at the state level.
4. What international instruments are the e-commerce laws based on?	UNCITRAL Model Law on E-Commerce	Australian law is based on the Model Law on E-Commerce but the government plans to sign the UN Convention on Electronic Contracting and is in the process of amending laws to align with the Convention text. This task is almost complete with only one state jurisdiction's laws requiring amendment.
5. Is the downloading of applications or digital data from foreign cloud service providers free from tariff or other trade barriers?	✓	There are no relevant tariffs or trade barriers in Australia.
6. Are international standards favored over domestic standards?	✓	Australia has committed to WTO and ISO best practice regarding the prioritization of international standards.
7. Does the government participate in international standards-setting process?	✓	Australia is an active participant in ISO and other standards-setting initiatives. Australia is a full member of the ISO.
<b>PROMOTING FREE TRADE</b>		
1. Are any laws or policies in place that implement technology neutrality in government?	✓	There is a high-level Commonwealth commitment to technology neutrality in government procurement. Refer to the Australian Government Information Management Office ICT Reform Program < <a href="http://www.finance.gov.au/e-government/strategy-and-governance/ict-reform-program.html">www.finance.gov.au/e-government/strategy-and-governance/ict-reform-program.html</a> >  The Department of Broadband, Communications and the Digital Economy < <a href="http://www.dbcde.gov.au">www.dbcde.gov.au</a> > has also established a Cloud Computing Task Force to review government and industry practice in relation to cloud computing.
2. Are cloud computing services able to operate free from laws or policies that mandate the use of certain products (including, but not limited to, types of software), services, standards, or technologies?	✓	There are no mandatory requirements in Australian law and policy.  In 2012, the Australian Government Information Management Office consulted with government agencies, industry, and the public to develop an Australian Government Cloud Computing Strategic Direction Paper < <a href="http://agimo.gov.au/policy-guides-procurement/cloud/">agimo.gov.au/policy-guides-procurement/cloud/</a> >.
3. Are cloud computing services able to operate free from laws or policies that establish preferences for certain products (including, but not limited to, types of software), services, standards, or technologies?	✓	There are no relevant preferences for specific products or standards in Australia.
4. Are cloud computing services able to operate free from laws that discriminate based on the nationality of the vendor, developer, or service provider?	⦿	Cloud computing services may be subject to government and agency procurement policies that encourage the involvement of local SMEs (for example, the State of Victoria requires a 40% local component in some strategic project tenders and the State of New South Wales applies a 20% price preference margin to local suppliers for some government projects).  Australia is an observer, but not a full member, of the WTO plurilateral Agreement on Government Procurement.

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<b>ICT READINESS, BROADBAND DEPLOYMENT</b>		
1. Is there a national broadband plan?	<ul style="list-style-type: none"> <li>By 2021, the National Broadband Network (NBN) will cover 100% of premises, 93% of homes, schools and businesses at up to 100 Mbps over fiber, with the remainder at up to 12 Mbps over next-generation wireless and satellite</li> </ul>	Australia has set the following broadband target: by 2021, the National Broadband Network will cover 100% of premises, 93% of homes, schools, and businesses at up to 100 Mbps over fiber, with the remainder at up to 12 Mbps over next-generation wireless and satellite. The network is being rolled out by a federal government-owned operator, NBN Co. < <a href="http://www.nbnco.com.au">www.nbnco.com.au</a> >
2. Are there laws or policies that regulate the establishment of different service levels for data transmission based on the nature of data transmitted?	No regulation and extensive public debate	Australia does not regulate the ability of service providers to discriminate among different types of network traffic. It is common practice for service providers to apply favorable pricing to different types of content. There are currently no "net neutrality" requirements.
3. Base Indicators		
3.1. Population (2011)	22,605,732	In 2011, the population of Australia increased by 1.4%. [International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (Dec 2012) < <a href="http://www.itu.int/ITU-D/ict/publications/world/world.html">www.itu.int/ITU-D/ict/publications/world/world.html</a> >]
3.2. Urban Population (%) (2011)	89%	[United Nations, Department of Economic and Social Affairs, Population Division (2012). World Urbanization Prospects: The 2011 Revision, < <a href="http://esa.un.org/unup/CD-ROM/Urban-Rural-Population.htm">esa.un.org/unup/CD-ROM/Urban-Rural-Population.htm</a> >]
3.3. Number of Households (2011)	8,623,000	In 2011, the number of households in Australia increased by 1.7%. [International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (Dec 2012) < <a href="http://www.itu.int/ITU-D/ict/publications/world/world.html">www.itu.int/ITU-D/ict/publications/world/world.html</a> >]
3.4. Population Density (people per square km) (2010)	3	[World Bank, Data Catalog, Indicators, Population Density (2012) < <a href="http://data.worldbank.org/indicator/EN.POP.DNST">data.worldbank.org/indicator/EN.POP.DNST</a> >]
3.5. Per Capita GDP (US\$ 2011)	\$60,642	In 2011, the per capita GDP for Australia increased by 1.8% to US\$60,642. [World Bank, Data Catalog, Indicators: GDP per capita, current US\$ (2012) < <a href="http://data.worldbank.org/indicator/NY.GDP.PCAP.CD">data.worldbank.org/indicator/NY.GDP.PCAP.CD</a> > and GDP growth, annual % (2012) < <a href="http://data.worldbank.org/indicator/NY.GDP.MKTP.KD.ZG">data.worldbank.org/indicator/NY.GDP.MKTP.KD.ZG</a> >]
3.6. Public Cloud Services Market Value (2011) (Billions of US\$)	\$2.09	Gartner has calculated the value of the public cloud services market in Australia in 2011 to be US\$2.09 billion. This is a 31% increase from 2010 and ranks Australia 8 (out of 20 countries) in the forecast. Gartner has projected the five-year compound annual growth rate (CAGR) to 2016 to be 17.3%, and this ranks Australia 12 (out of 20 countries) for growth in the value of the market for public cloud services to 2016. [Gartner, Forecast Overview: Public Cloud Services, Worldwide, 2011-2016 (August 2012 Update) < <a href="http://www.gartner.com/id=2126916">www.gartner.com/id=2126916</a> >]
3.7. Personal Computers (% of households) (2011)	83%	In 2011, 82.6% of households in Australia had personal computers. This is a 1.8% increase since 2010 and ranks Australia 20 out of 182 countries surveyed. The growth from 2010 is below the five-year CAGR from 2006 to 2011 of 3.4%. [International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (Dec 2012) < <a href="http://www.itu.int/ITU-D/ICTEYE/Indicators/Indicators.aspx">www.itu.int/ITU-D/ICTEYE/Indicators/Indicators.aspx</a> >]  Note: In some jurisdictions this is an estimate, and subsequent editions of the ITU ICT Indicators Database may update this indicator for prior years.



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4. ICT and Network Readiness Indicators		
4.1. ITU ICT Development Index (IDI) (2011) (Score is out of 10)	7.05	Australia's ITU ICT Development Index (IDI) for 2011 is 7.05 (out of 10), resulting in a rank of 21 (out of 161 economies). The 2011 IDI for Australia has increased by 4.4%, and the IDI ranking has remained the same since 2010.  [International Telecommunication Union (ITU), Measuring the Information Society (2012) < <a href="http://www.itu.int/ITU-D/ict/publications/idi/index.html">http://www.itu.int/ITU-D/ict/publications/idi/index.html</a> >]  Note: In some jurisdictions this is an estimate and subsequent editions of the ITU ICT Indicators Database may adjust this indicator, both for 2011 and prior years.
4.2. World Economic Forum Networked Readiness Index (NRI) (2012) (Score is out of 7)	5.11	Australia has a Networked Readiness Index (NRI) score of 5.11 (out of 7), resulting in a rank of 20 (out of 142 economies) and a rank of 20 (out of 47) in the high income grouping of economies. The 2012 NRI for Australia increased by 1% and declined from a rank of 17 since 2011.  [World Economic Forum, Global Information Technology Report (2012) < <a href="http://www.networkedreadiness.com/gitr">www.networkedreadiness.com/gitr</a> >]
4.3. International Connectivity Score (2011) (Score is out of 10)	6.93	Australia has a Connectivity Score of 6.93 (out of 10), resulting in a rank of 7 (out of 25) in the innovation-driven grouping of countries/economies.  [Nokia Siemens, Connectivity Scorecard (2011) < <a href="http://www.connectivityscorecard.org">www.connectivityscorecard.org</a> >]
4.4. IT Industry Competitiveness Index (2011) (Score is out of 100)	67.50	Australia has an IT Industry Competitiveness Index Score of 67.5 (out of 100), resulting in a rank of 8 (out of 66 countries/economies included in the index). The 2011 index score is a 1.5% decrease on the 2009 score. Australia has moved down the ranking by one place since 2009.  [Business Software Alliance (BSA) / Economist Intelligence Unit (EIU), IT Industry Competitiveness Index (2011) < <a href="http://globalindex11.bsa.org">globalindex11.bsa.org</a> >]
5. Internet Users and International Bandwidth		
5.1. Internet Users (2011)	17,858,528	[calculated from 8.3.1. and 8.5.2.]
5.2. Internet Users as % of Population (2011)	79%	In 2011, 79% of the population in Australia used the Internet, resulting in a ranking of 25 out of 199 countries surveyed. This is a 3.9% increase since 2010. The growth from 2010 is above the five-year CAGR from 2006 to 2011 of 3.7%.  [International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (December 2012) < <a href="http://www.itu.int/ITU-D/ICTEYE/Indicators/Indicators.aspx">www.itu.int/ITU-D/ICTEYE/Indicators/Indicators.aspx</a> >]  Note: There may be some variations as to how countries calculate this. Some countries base this upon all or part of the population, such as between 16 and 72 years of age.  Note: In some jurisdictions this is an estimate and subsequent editions of the ITU ICT Indicators Database may adjust this indicator, both for 2011 and prior years.
5.3. International Internet Bandwidth (bits per second per Internet user) (2011)	50,396	Australia's International Internet Bandwidth (per Internet user) has increased by 22% since 2010.  [International Telecommunication Union (ITU), Measuring the Information Society (2012) < <a href="http://www.itu.int/ITU-D/ict/publications/idi/index.html">www.itu.int/ITU-D/ict/publications/idi/index.html</a> >]
5.4. International Internet Bandwidth (2011) (total gigabits per second [Gbps] per country)	900	Australia has increased its International Internet Bandwidth by 29% since 2010 to 900 Gbps and is ranked 21 out of 188 countries surveyed. The growth from 2010 is below the five-year CAGR from 2006 to 2011 of 69.1%.  [International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (Dec 2012) < <a href="http://www.itu.int/ITU-D/ict/publications/world/world.html">www.itu.int/ITU-D/ict/publications/world/world.html</a> >]
6. Fixed Broadband		
6.1. Fixed Broadband Subscriptions (2011)	5,498,000	Australia has increased the number of fixed broadband subscribers by 2% since 2010, to 5,498,000, and is ranked 19 out of 182 countries surveyed. The growth from 2010 is below the five-year CAGR from 2006 to 2011 of 7.1%.  [International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (Dec 2012) < <a href="http://www.itu.int/ITU-D/ict/publications/world/world.html">www.itu.int/ITU-D/ict/publications/world/world.html</a> >]  Note: In some jurisdictions this is an estimate and subsequent editions of the ITU ICT Indicators Database may adjust this indicator, both for 2011 and prior years.
6.2. Fixed Broadband Subscriptions as % of Households (2011)	64%	[calculated from 8.3.3. and 8.6.1.]  Note: This may be skewed by business usage in some countries (refer to OECD comments about this).

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6.3. Fixed Broadband Subscriptions as % of Population (2011)	24%	<p>Australia has increased its fixed broadband subscriptions (as a share of the population) by 1% since 2010, which is below the five-year CAGR from 2006 to 2011 of 5.3%. This ranks Australia 19 out of 187 countries surveyed.</p> <p>The OECD figures below present a breakdown on the type of fixed broadband connections in Australia.</p> <p>In the OECD, during 2011, Australia has slipped three places and was ranked 21 (out of 34) for fixed (wired) broadband subscribers as a percentage of population [OECD Broadband Subscribers (Dec 2011) &lt;<a href="http://www.oecd.org/sti/ict/broadband">www.oecd.org/sti/ict/broadband</a>&gt;]</p> <ul style="list-style-type: none"> <li>– DSL: 20.4%</li> <li>– Cable: 4%</li> <li>– Fiber/LAN: 0.2%</li> </ul> <p>Total: 24.6% (5,490,000 subscriptions). The OECD average total for 2011 was 25.6%.</p> <p>Australia's fixed broadband growth for 2011 was 1.9% (ranked 31 out of 34 for growth), below the OECD average growth of 4.1%.</p> <p>Note: There may be minor variations in the ITU and OECD subscriber totals due to definition or timing differences.</p> <p>[International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (July 2011) &lt;<a href="http://www.itu.int/ITU-D/ICTEYE/Indicators/Indicators.aspx">www.itu.int/ITU-D/ICTEYE/Indicators/Indicators.aspx</a>&gt;]</p>
6.4. Fixed Broadband Subscriptions as % of Internet Users (2011)	31%	[calculated from 8.5.1 and 8.6.1]
7. Mobile Broadband		
7.1. Mobile Cellular Subscriptions (2011)	24,490,000	<p>In 2011, Australia increased the number of mobile cellular subscriptions by 8.8% and is ranked 43 out of 195 countries surveyed. The number of subscriptions account for 108% of the population.</p> <p>[International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (Dec 2012) &lt;<a href="http://www.itu.int/ITU-D/ict/publications/world/world.html">www.itu.int/ITU-D/ict/publications/world/world.html</a>&gt;]</p> <p>Note: This figure may be inflated due to multiple subscriptions per head of population but excludes dedicated mobile broadband devices (such as 3G data cards and tablets).</p>
7.2. Active Mobile Broadband Subscriptions per 100 inhabitants (2011)	73	<p>Australia has increased the number of active mobile broadband subscriptions (as a share of the population) by 31% since 2010. This ranks Australia 11 out of 144 countries surveyed.</p> <p>The OECD figures below present a breakdown on the type of mobile broadband connections in Australia.</p> <p>For 2011, Australia's OECD rank has not changed and was 8 (out of 34) for mobile wireless broadband subscribers as a percentage of population [OECD Broadband Subscribers (Dec 2011) &lt;<a href="http://www.oecd.org/sti/ict/broadband">www.oecd.org/sti/ict/broadband</a>&gt;]</p> <ul style="list-style-type: none"> <li>– Satellite: 0.4%</li> <li>– Terrestrial fixed wireless: 0.2%</li> <li>– Standard mobile broadband subscription: 39.6% (up from 31.2% in 2010)</li> <li>– Dedicated mobile data subscriptions: 34.3% (up from 24.4%)</li> </ul> <p>Total: 74.4% (16,626,000 subscriptions). The OECD average total for 2011 was 54.3%.</p> <p>Australia's wireless broadband growth for 2011 was 32.4% (ranked 16 out of 34 for growth), marginally above the OECD average growth of 30.5%.</p> <p>Note: The mobile broadband subscription types were first reported by OECD in 2010, and ITU data are beginning to have this granularity.</p> <p>Note: The OECD figures include mobile data subscriptions, which are not as consistently reported in the ITU indicators.</p> <p>[International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (Dec 2012) &lt;<a href="http://www.itu.int/ITU-D/ict/publications/world/world.html">www.itu.int/ITU-D/ict/publications/world/world.html</a>&gt;]</p> <p>Note: This refers to the sum of standard mobile-broadband and dedicated mobile-broadband subscriptions to the public Internet. It covers actual subscribers, not potential subscribers, even though the latter may have broadband-enabled handsets.</p> <p>Note: In some jurisdictions this is an estimate and subsequent editions of the ITU ICT Indicators Database may adjust this indicator, both for 2011 and prior years.</p>
7.3. Number of Active Mobile Broadband Subscriptions (2011)	16,491,000	<p>In 2011, Australia increased the number of active mobile broadband subscriptions by 33% and is ranked 11 out of 145 countries surveyed.</p> <p>[International Telecommunication Union (ITU), World Telecommunication/ICT Indicators Database (Dec 2012) &lt;<a href="http://www.itu.int/ITU-D/ict/publications/world/world.html">www.itu.int/ITU-D/ict/publications/world/world.html</a>&gt;]</p>