Telecommunications competitive safeguards for 2009–10

Changes in the prices paid for telecommunications services in Australia 2009–10
ACCC telecommunications reports 2009–10

This publication contains two reports:

Report 1  Telecommunications competitive safeguards for 2009–10
Report 2  Changes in prices paid for telecommunications services in Australia, 2009–10
27 May 2011

Senator Stephen Conroy
Minister for Broadband, Communications and the Digital Economy
Parliament House
CANBERRA ACT 2600

Dear Minister

The Australian Competition and Consumer Commission (ACCC) is required under the Competition and Consumer Act 2010 (CCA) to review and report annually on:

- Competitive safeguards within the Australian telecommunications industry under subsection 151CL(1) of the CCA
- Changes in the prices paid by consumers for telecommunications services under subsection 151CM(1)(a) of the CCA.

Enclosed are the two reports for the 2009-10 financial year. As you are aware, subsections 151CL(5) and 151CM(3) of the CCA require you to table both reports in each House of Parliament within 15 sitting days of receipt.

Yours sincerely

Graeme Samuel
Chairman
# List of shortened forms

<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Full Form</th>
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<tbody>
<tr>
<td>3G</td>
<td>third-generation mobile communications</td>
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<tr>
<td>ABS</td>
<td>Australian Bureau of Statistics</td>
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<td>AD</td>
<td>Access Determination</td>
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<td>ACCC</td>
<td>Australian Competition and Consumer Commission</td>
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<td>ACMA</td>
<td>Australian Communications and Media Authority</td>
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<td>ACT</td>
<td>Australian Competition Tribunal</td>
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<td>ADSL</td>
<td>asymmetric digital subscriber line</td>
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<td>ADSL2+</td>
<td>currently deployed version of ADSL</td>
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<td>ASIC</td>
<td>Australian Securities and Investment Commission</td>
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<td>BBMs</td>
<td>building block models</td>
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<td>BCS</td>
<td>basic carriage service</td>
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<td>CACS Act</td>
<td><em>Telecommunications Legislation Amendment (Competition and Consumer Safeguards) Act 2010</em></td>
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<tr>
<td>CAN</td>
<td>customer access network</td>
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<td>CBD</td>
<td>central business district</td>
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<td>CCA</td>
<td><em>Competition and Consumer Act 2010</em></td>
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<td>CDMA</td>
<td>code division multiple access</td>
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<td>CPI</td>
<td>consumer price index</td>
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<td>CRU</td>
<td>Communications Research Unit</td>
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<td>CSP</td>
<td>carriage service provider</td>
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<td>DOCSIS 3.0</td>
<td>data over cable service interface specification 3.0</td>
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<td>DSL</td>
<td>digital subscriber line</td>
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<td>DSLAM</td>
<td>digital subscriber line access multiplexer</td>
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<td>DTCS</td>
<td>domestic transmission capacity service</td>
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<td>ESA</td>
<td>exchange service area</td>
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<td>FAD</td>
<td>Final Access Determination</td>
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<td>FHoA</td>
<td>Financial Heads of Agreement</td>
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<td>FTTH</td>
<td>fibre-to-the-home also referred to as FTP (fibre-to-the-premises)</td>
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<td>GB</td>
<td>gigabyte</td>
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<td>GSM</td>
<td>global system for mobile communications</td>
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<td>GST</td>
<td>goods and services tax</td>
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<td>HFC</td>
<td>hybrid fibre coaxial</td>
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<td>HHI</td>
<td>Herfindahl-Hirschman Index</td>
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<tr>
<td>HSPA</td>
<td>high-speed packet access (generic)</td>
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<tr>
<td>Acronym</td>
<td>Description</td>
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<td>IAD</td>
<td>Interim Access Determination</td>
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<td>IAD</td>
<td>internet access device</td>
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<td>IP</td>
<td>internet protocol</td>
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<td>IPTV</td>
<td>internet protocol television</td>
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<td>ISP</td>
<td>internet service provider</td>
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<tr>
<td>Kbps</td>
<td>kilobits per second</td>
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<td>LCS</td>
<td>local carriage service</td>
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<td>LSS</td>
<td>line sharing service</td>
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<td>LTE</td>
<td>long-term evolution</td>
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<td>LTIE</td>
<td>long-term interests of end-users</td>
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<tr>
<td>Mbps</td>
<td>megabits per second</td>
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<td>MDF</td>
<td>main distribution frame</td>
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<td>MHz</td>
<td>megahertz</td>
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<td>MIMO</td>
<td>multiple-input and multiple-output</td>
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<td>MPS</td>
<td>mobile premium services</td>
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<td>MSAN</td>
<td>multi-service access node</td>
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<td>MTAS</td>
<td>mobile terminating access service</td>
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<td>MVNO</td>
<td>mobile virtual network operator</td>
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<td>NBN</td>
<td>National Broadband Network</td>
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<td>NBN Co</td>
<td>National Broadband Network Co Limited</td>
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<td>NPTC</td>
<td>non-price terms and conditions</td>
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<td>OSP</td>
<td>operational separation plan</td>
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<td>POIs</td>
<td>points of interconnect</td>
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<td>POTS</td>
<td>plain old telephone service</td>
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<td>PSTN</td>
<td>public switched telephone network</td>
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<td>PSTN OA</td>
<td>public switched telephone network originating access</td>
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<td>PSTN OTA</td>
<td>public switched telephone network originating/terminating access</td>
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<tr>
<td>PSTN TA</td>
<td>public switched telephone network terminating access</td>
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<tr>
<td>RAF</td>
<td>regulatory accounting framework</td>
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<td>RSP</td>
<td>retail service provider</td>
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<td>RKR</td>
<td>record keeping rule</td>
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<td>SAO</td>
<td>standard access obligation</td>
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<td>SAU</td>
<td>special access undertaking</td>
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<td>SSU</td>
<td>structural separation undertaking</td>
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<tr>
<td>SIOs</td>
<td>services in operation</td>
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SMS  short messaging service
SoE  Statement of Expectations
TB  terabytes
TCP  Telecommunications Consumer Protection Code
TEA  Telstra efficient access (Telstra cost model)
TIO  Telecommunications Industry Ombudsman
TPA  Trade Practices Act 1974
TSLRIC  total service long-run incremental cost
TSLRIC+  total service long-run incremental cost plus an allocation of common and indirect costs
ULLS  unconditioned local loop service
USB  universal serial bus
VoIP  voice over internet protocol
WACC  weighted average cost per capital
WiMAX  worldwide interoperability for microwave access (a wireless broadband family of technologies)
WLR  wholesale line rental
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Telecommunications competitive safeguards for 2009–10

Report to the Minister for Broadband, Communications and the Digital Economy
1 Executive summary

Under Part XIB, Division 11, section 151 CL (1) of the *Competition and Consumer Act 2010* (the CCA), the Australian Competition and Consumer Commission (ACCC) is required to provide the Minister for Broadband, Communications and the Digital Economy (the Minister) with an annual report on competitive safeguards within the Australian telecommunications industry.

This report covers the financial year 2009–10 and major developments occurring in the 2010 calendar year. All of the ACCC publications referred to in this report are available at www.accc.gov.au.

The key outcomes over the 2009–10 period contained within this report are outlined below.

From 1 January 2011 the *Competition and Consumer Act 2010* replaced the *Trade Practices Act 1974* (TPA). The TPA was renamed and amended to include national consumer laws under the *Australian Consumer Law Act (No. 1) 2010* and the *Australian Consumer Law Act (No. 2) 2010*.

In view of the period this report covers, reference may be made to provisions under the TPA or the CCA throughout.

1.1 State of competition

Fixed and mobile services trends

Over the course of the 2009–10 period, some clear trends around fixed and mobile services have emerged.

- Subscription numbers for both fixed and mobile services suggest that while mobile take-up continues to grow, this is not necessarily at the cost of fixed line subscriptions.
  - SIO numbers for fixed line voice services have remained relatively stable, dropping from 10.67 million to 10.59 million by June 2010, while mobile subscriptions have continued to grow, rising by 7 per cent to just under 26 million by June 2010.\(^1\)
  - While wireless internet was the fastest growing subscription type (increasing by 1.4 million subscribers over 2009–10\(^2\)), high-speed fixed data services also continued to increase, with the total number of DSL services supplied over Telstra’s CAN growing by 156 555 over 2009–10.\(^3\)

- Evidence shows that consumers value the convenience of mobiles and are using these more, but this appears to be mostly in respect of voice services. Download volumes clearly demonstrate that while take-up of wireless internet has been high over 2009–10, fixed broadband remains the dominant technology for internet services—suggesting that consumers use wireless internet services primarily for convenience.

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\(^1\) Australian Communications and Media Authority, Communications report 2009–10, ACMA, Melbourne, p. 23.


The total volume of data downloaded by consumers grew by 135.8 per cent between December 2008 and December 2010 to 155,503 terabytes (excluding mobile handset downloads).\(^4\)

Fixed broadband accounted for 91 per cent of this total, despite an increase in wireless internet subscribers to 3.46 million.

In the financial year 2005–06, the total number of call minutes originating on fixed lines totalled 94.6 billion, and has steadily decreased to 45.6 billion in the financial year ending 2009–10.

This compares with mobile call origination, which has steadily grown over the same period (from financial year 2005–06 to 2009–10) from 18.6 billion to 28.2 billion minutes.

Industry restructuring

These trends in fixed and mobile services and the growing consumer preference for bundled services were reflected in the industry restructuring that took place over 2009–10.

- Over the reporting period, industry adopted a variety of approaches:
  - vertical integration (e.g. TPG’s acquisition of PIPE Networks)
  - horizontal integration (e.g. Vodafone and Hutchison merger, iiNet’s acquisition of AAPT’s retail consumer business and of Netspace)
  - vertical separation (AAPT’s sale of its retail consumer business).
- Those players that have not exited the market now appear to be exploiting economies of scope, by broadening the range of services on offer, seeking to maintain or entrench their market position:
  - Both iiNet and TPG have expanded from internet service provision to fixed voice and mobile offerings.
  - VHA has indicated an interest in participating in NBN trials as a retail service provider (RSP).
  - A number of ISPs are also taking advantage of new services, exemplified by subscription-type television delivered over the internet (IPTV).

National Broadband Network

The 2009–10 period brought greater clarity to industry as to what the structure of communications markets will look like once NBN Co commences operations. A number of regulatory reforms that the ACCC has long advocated (e.g. addressing Telstra’s vertical integration, amending the access regime) were passed by parliament and have the potential to overcome many of the structural impediments to competition.

However, NBN remains in its early implementation stage, and in the transition to an NBN environment there are still a number of significant decisions to be made by the Minister and the ACCC which will have major impacts on the medium to long term competitive outcomes in the sector.

Over the course of 2009–10:

- NBN Co began rolling out test sites for the NBN.
- Nextgen Networks commenced construction to build additional regional backbone links under the government’s Regional Backbone Blackspots Program.
- NBN Co and Telstra signed a (largely non-binding) Financial Heads of Agreement (FHoA) to provide a framework for definitive agreements on the rollout of the NBN and the migration of customers onto the NBN.

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A number of legislative reforms were introduced in the *Telecommunications Legislation Amendment (Competition and Consumer Safeguards) Act 2010* (CACS Act) to

- streamline the telecommunications-specific anti-competitive conduct and access regimes
- address Telstra’s vertical and horizontal integration
- strengthen consumer safeguard measures.

Additional developments over the period include:

- the introduction of NBN-related Bills
- the government’s response to the NBN Implementation Study (by McKinsey-KPMG), which incorporated a decision on points of interconnect (POIs), based on ACCC advice.

### 1.2 ACCC telecommunications regulatory activities

#### Anti-competitive conduct and consumer safeguards

- During the reporting period, the ACCC:
  - undertook nine investigations into alleged anti-competitive conduct under Part IV or Part XIB of the TPA (eight were concluded because there did not appear to be sufficient material to substantiate the alleged conduct)
  - successfully concluded court action against Telstra for contravention of the standard access obligations (SAOs) in Part XIC of the TPA and the facilities access regime in the *Telecommunications Act 1997* (Telecommunications Act).

- At the end of the reporting period, one investigation was ongoing. This investigation related to Telstra’s provision of a wholesale ADSL service to its retail competitors and its own retail pricing of ADSL services.

- A total of 4970 consumer protection complaints about the telecommunications industry were registered with the ACCC in 2009–10. About 30 per cent of complaints did not fall within the ACCC’s jurisdiction and therefore complainants were referred to more appropriate bodies, such as the TIO.

- The ACCC received a number of third line forcing notifications from participants in the telecommunications industry in 2009–10. All of these notifications were allowed to stand on public benefit grounds.

#### Monitoring and reporting under Part XIB

- According to its responsibilities, the ACCC:
  - published public summary data of Telstra’s Customer Access Network (CAN) Record Keeping Rule (RKR) information, and collected information from the industry under the Audit of Telecommunications Infrastructure Assets RKR
  - provided reports on a biannual basis in relation to Telstra’s current and historical costs under the telecommunications industry accounting framework
  - provided quarterly reports for imputation analysis of Telstra’s retail prices in view of the costs faced by access seekers, and quarterly reports for key performance indicators on non-price terms and conditions
- revised the RKR on retail telecommunications prices following Vodafone’s merger with Hutchison Australia, and published its report on *Changes in the prices paid for telecommunications services in Australia 2009–10*
- continued the monitoring of bundling arrangements that Telstra offers to its residential customers under the Bundled Service RKR
- required Telstra to report monthly in relation to access to its exchange facilities, including information on the number of capped exchanges, the types of construction works required to access specific exchanges, and the queued access seekers at exchanges
- collected tariff filing information from Telstra to monitor changes in its prices
- continued to monitor carriers who have vertically integrated operations, and who can potentially exercise market power, by collecting data under the regulatory accounting framework (RAF) Record Keeping Rule (RKR) from five companies
- monitored developments across all media sectors to ensure effective competition is not hindered by anti-competitive conduct.

**Access to telecommunications services under Part XIC**

**Public declaration inquiries**
- The ACCC conducted two inquiries in relation to declared services during the reporting period:
  - The first inquiry extended declaration for six fixed line services to 31 July 2014.
  - The second inquiry followed a review of the domestic capacity service (DCTS) description in late 2009; following this review, the ACCC varied the description to cover all commonly used network interfaces used on transmission networks.

**Exemptions**
- In the reporting period, the ACCC published a list of 129 metropolitan exchange service areas (ESAs) in which Telstra is exempted from the standard access obligations (SAOs) in relation to the provision of the wholesale line rental (WLR), local carriage service (LCS) and public switched telephone network originating access (PSTN OA) services, under orders issued by the Australian Competition Tribunal (ACT). Class exemptions in relation to each service were varied to apply in the same ESAs.
- During the reporting period, the ACT affirmed the ACCC’s decision to exempt Telstra from the SAOs in 17 CBD ESAs in relation to its provision of PSTN OA services. A class exemption also applies to the same 17 CBD ESAs.

**Access undertakings**
- The ACCC did not receive any access undertakings under Part XIC of the TPA, the relevant Act, for the reporting period.
Access disputes
- At the start of the reporting period, the ACCC was arbitrating 32 access disputes concerning fixed line services. Over the following 12 months, this number was reduced to eight: the ACCC finalised 19 disputes, was notified of three new access disputes and was advised of the withdrawal of eight fixed line access disputes.
- The ACCC also received two new MTAS access disputes in the 2009–10 period, in addition to the six disputes being arbitrated at the commencement of the period. Four disputes were withdrawn after the parties successfully reached a commercial agreement.

Pricing principles and indicative pricing
- On 3 December 2009 the ACCC commenced a review of its 1997 access pricing principles for fixed line telecommunications services. On 17 September 2010 a draft report was released for public consultation proposing the use of a Building Block Model approach to pricing fixed line telecommunications services. On 21 December 2010 the ACCC suspended the review as a result of the legislative changes under the CACS Act 2010.

Activities under the Telecommunications Act
- The ACCC continued to monitor and report on Telstra’s compliance with the operational separation plan (OSP). This includes the price equivalence framework which was established under the OSP. This framework is used to test the revenue margin resulting from changes in wholesale and/or retail prices as a guide to identifying possible anti-competitive pricing conduct by Telstra.
- Structural reforms provided for in the CACS Act will result in the repeal of the current operational separation regime following either the ACCC’s acceptance of a structural separation undertaking from Telstra or the introduction of a functional separation regime.

Activities under the Radiocommunications Act
- The ACCC monitored compliance by digital radio multiplex operators with undertakings that determine the terms and conditions by which radio stations can obtain access to the digital radio multiplex service during the 2009–10 financial year.
2 State of competition in telecommunications markets

2.1 Overview

The ACCC has observed clear trends around the take-up and use of fixed and mobile services over the 2009–10 period. Fixed line subscriptions remained relatively stable over the reporting period as mobile services increased by almost two million subscribers (to just below 26 million). While wireless internet access grew considerably over the reporting period, by 1.4 million subscribers, fixed data services accounted for just over 90 per cent of all downloads, and continued to see increased subscriber numbers (by around 157 000 DSL services on Telstra’s CAN).

Consumer behaviour appears to be moving towards a preference for mobile voice usage, most likely driven by the convenience of mobility and overall narrowing of price differences between fixed and mobile voice. Total call minutes originating from fixed voice services has declined over time while call minutes originating from mobile services have increased. In the 2005–06 financial year, call minutes from mobile services totalled 18.6 billion and in 2009–10 totalled 28.2 billion. Over the same period, call minutes from fixed voice services decreased from 94.6 billion to 45.6 billion. While fixed call minutes are still greater than mobile call minutes, the trend indicates that this may change in the coming years. Voice services also remain an important revenue source for providers: the ACCC estimates that voice only services account for at least 40 per cent of all fixed network SIOs.

Consumer demand for content and devices (equipment used to deliver content) and an apparent preference for bundled service offerings are advancing the availability and range of services and packages offered by service providers. Internet protocol television (IPTV) is also gaining popularity among providers and consumers—TPG offers both free and subscription IPTV, while Fetch TV is currently offered by two providers—iiNet (launched in July 2010) and Internode (launched February 2011). The number of providers offering these services is likely to increase further—Adam Internet announced in late 2010 that it had formed a partnership with Fetch TV. Telstra also now delivers IPTV via its T-Box device, a digital set-top box, which offers both free to air TV and a range of content services through a Telstra BigPond internet service.

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5 Australian Communications Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, p. 23.
7 Division 12 Record Keeping Rule (RKR) report 2009–10, available on the ACCC website.
Industry restructuring that has occurred over 2009–10 appears to be at least in part a response to consumer preferences and a desire to grow revenue streams. This is taking a variety of forms:

- greater vertical integration: e.g. TPG’s acquisition of PIPE Networks
- horizontal integration: e.g. Vodafone and Hutchison merger
- consolidation at a retail level: e.g. iiNet’s acquisition of Netspace, and AAPT’s retail consumer business
- wholesale service provider consolidation: e.g. AAPT’s divestiture of its retail business.

At this stage there remains, in some cases, a distinction between fixed and mobile providers. However, there are indications that this could change both in response to a consumer preference for bundled services and greater use of fixed internet and mobile voice services. It could also be a possible response to the new telecommunications landscape heralded by the National Broadband Network (discussed further below). For instance, the industry has seen both iiNet and TPG expand from internet service provision to fixed voice and mobile offerings, while mobile network operator VHA has indicated an interest in participating in NBN trials as a retail service provider (RSP).

At the same time, the industry is experiencing an expansion in the scope of services available, driven in part by consumer demand for content and significant technological development, particularly in respect of devices used to deliver services (e.g. smartphones, tablets).

These changes in industry behaviour are also reflected in the pattern of industry investment seen over 2009–10. Some companies appear to be responding to consumer demand by building scale, such as increased investment within some segments of the industry to address capacity constraints (e.g. in relation to mobile infrastructure). On the other hand, there are also signs of a slowdown in investment in fixed networks (such as provision of ULLS over a greater geographic area) and retail voice services in particular.

Industry restructuring may also reflect parties positioning themselves for the entry of NBN Co into the market. Given that it is anticipated that many consumer telecommunications (and content) services will be delivered over the NBN, RSPs may be expected to offer a variety of services and packages to meet consumer communication needs.

The high number of complaints within the telecommunications industry suggests that competing to retain customers on the basis of customer service may not yet be a key priority for providers. The increased level of telecommunications-related enforcement activities by the ACCC, and the significant number of complaints made to the Telecommunications Industry Ombudsman (167 955 over 2009–10), suggests that there are inadequate incentives for telecommunications providers to deliver good customer service.12

The persistent presence of customer service complaints and enforcement action highlights the need for the ACCC (and other telecommunications regulators and policy-makers) to remain vigilant in protecting and promoting competition—particularly during the transition to an NBN environment. The entry of NBN Co and the implementation of the government’s associated legislation create an opportunity to address the underlying structural features that are a key factor in the level of customer service complaints.

The government’s April 2009 announcement, establishing NBN Co to build a ‘superfast’ National Broadband Network, represented a major shift for the telecommunications industry. The 18 months following this announcement saw a degree of crystallisation of what this will mean in the years ahead. Of particular significance have been the passage of the Telecommunications Legislation Amendment

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12 Telecommunications Industry Ombudsman, 2010 annual report.

The CACS Act addresses a number of issues that the ACCC has previously highlighted regarding the interactions between industry structure and the access regime. The CACS Act introduced reforms which complement the rollout of the NBN, containing three primary elements:

- to address Telstra Corporation’s vertical and horizontal integration by giving priority to a structural separation process
- streamlining the anti-competitive conduct and access regimes under the Competition and Consumer Act 2010
- strengthening consumer safeguards measures, such as priority assistance.

The reforms to the access regime were designed to address concerns regarding delays and uncertainty surrounding the terms of access under the previous negotiate/arbitrate model and the delays associated with certain processes under the telecommunications-specific anti-competitive conduct provisions. The CACS Act introduced new powers for the ACCC to make access determinations to provide greater regulatory certainty. It is intended that this will allow a smoother transition to the NBN for industry and consumers.

The CACS Act amendments also aim to address Telstra’s vertical integration through encouraging Telstra to submit a structural separation undertaking (SSU) pursuant to which it will cease supplying fixed line carriage services to retail customers using a telecommunications network it is in a position to control.

As noted previously, the ACCC has long advocated reform of the access regime to reduce the scope for gaming and delay, along with the structural separation of the dominant vertically integrated network operator (Telstra) in order to enhance competition within the telecommunications environment. During the reporting period, these views appeared to receive broad political support, as reflected by the passage of the CACS Act through both houses of parliament.

However, the ACCC notes that these reforms are intended to assist in the rollout of the NBN, which will be wholesale-only and government-owned, aiming to deliver an open access telecommunications market structure, transforming the competitive dynamics in the Australian telecommunications industry. In designing a model that aims to inhibit vertical integration of wholesale and retail entities, and provide open access to retail providers, this is expected to encourage RSPs to deliver innovative and desirable products, compete on pricing and improve consumer outcomes.

Telstra and NBN Co signed a largely non-binding Financial Heads of Agreement (FHoA) in June 2010 that provides a framework for definitive agreements to be reached between the parties that are in turn expected

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14 ibid., p. 1.
15 ibid., p. 4.
16 ibid., p. 6.
19 ibid., p. 9.
to facilitate the rollout of the NBN. The NBN Co/Telstra FHoA has provided the industry with an indication of the direction in which the NBN rollout and migration of customers will occur.

The Telecommunications Legislation Amendment (National Broadband Network Measures—Access Arrangements) Bill 2011 (Access Bill) and the National Broadband Network Companies Bill 2011 (Companies Bill) will also contribute to a greater degree of clarity around the NBN rollout. The Access Bill aims to amend the CCA and the *Telecommunications Act 1997* to set out, among other things, the access regime that will apply to an NBN corporation. The Access Bill places open access, transparency and non-discrimination obligations on NBN Co, but also places almost identical obligations on the providers of other specified services. It also introduces a range of measures aimed at facilitating the government’s policy objective of uniform national pricing. The Companies Bill will create a standalone Act to establish the regulatory framework covering the ownership and operation of NBN Co, including provisions relating to NBN Co’s wholesale-only nature and enforcement measures to ensure that it meets its wholesale-only obligations.

The NBN policy, and related legislation, anticipates a number of roles for the ACCC during the transition period. These include the assessment of a structural separation undertaking (SSU) expected from Telstra and a special access undertaking (SAU) from NBN Co.

In assessing any SSU, the ACCC must have regard to broad criteria, including: the national interest in structural reform of the telecommunications industry; the impact of this reform on consumers and competition in telecommunications markets; and other matters set out by the Minister and any other matters the ACCC considers relevant. The ACCC must not accept the SSU unless effective and appropriate interim arrangements are in place to ensure equivalence and transparency in the supply by Telstra of regulated services.

Telstra may also submit a draft migration plan specifying the action it will take to: cease supplying fixed line carriage services to customers using a telecommunications network which Telstra controls; and commence supplying fixed line carriage services to customers using the NBN. The ACCC’s assessment of any draft migration plan will be limited to considering whether the plan satisfies the Migration Plan Principles, which are to be issued by the Minister.

While many of the preparatory steps in developing the NBN have been taken, there are a number of key events that have yet to occur. Definitive agreements between Telstra and NBN Co and decisions around construction of the NBN have yet to be finalised.

In the transition to the NBN, the ACCC will continue to promote a climate of competitiveness within communications markets in order to ensure the public policy objectives of structural reform are achieved. Critically, the ACCC will be vigilant in continuing to regulate access to the legacy network and fulfilling its new regulatory responsibilities. In particular, the ACCC will focus on:

- arbitrating access disputes until the first final access determination relating to the relevant service comes into force
- establishing access determinations for declared services
- assessing any structural separation undertaking, and any draft migration plan if a structural separation undertaking is in force, from Telstra
- scrutinising the Definitive Agreements between NBN Co and Telstra should the transaction be concluded.

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20 *Telecommunications Act 1997* (Cth), s. 577A(6).
In addition, the ACCC expects to assess a special access undertaking (SAU) from NBN Co with respect to price and non-price terms of services offered (which will include a public inquiry) in preparation for the NBN rollout.

2.2 Competition in telecommunications markets

When looking at competition in a market, regulators look at structural features such as the number of sellers, their market shares, the service concentration levels and the barriers to entry and exit (such as the high sunk costs traditionally associated with the communications services).

Telecommunications markets typically exhibit a number of factors that can impede the development of competition. The high fixed and sunk costs of building certain networks can deter or prevent potential competitors from entering markets, or limit the extent to which those that enter markets can compete.

At the same time there are many aspects of telecommunications that are by their nature highly dynamic, characterised by technological advances. This can provide entrants with the means and opportunity to compete for business.

In 2009−10, the indications are that the supply of data (or internet) services is the more obviously dynamic and growing part of telecommunications markets. Overall data downloads by consumers continue to grow, having increased by almost 60 per cent between June 2009 and June 2010.²¹ Within this broad market segment, it is clear that wireless data services are the newer more rapidly developing sector. Data services delivered by wireless mobile increased by 1.4 million subscribers to 3.46 million as at June 2010²²—possibly driven by the growing diversity of device options (e.g. smartphones, tablets such as iPads), and falling prices for wireless internet, which decreased by around 14.7 per cent over the 2009−10 period.²³

That said, fixed broadband remains the dominant source of data for consumers: fixed broadband was responsible for just over 91 per cent of total internet downloads (excluding mobile handset downloads) in the quarter to June 2010, wireless 8.6 per cent and dial-up 0.2 per cent.²⁴ The fixed broadband market segment has also seen some competitive progress in terms of concentration and number of participants in 2009−10. Although Telstra remains the dominant provider of fixed broadband services (which includes both digital subscriber line (DSL) and hybrid fibre coaxial (HFC) services) its market share declined from 44 per cent to 41 per cent during the reporting period. Other providers made up the remaining 59 per cent—Optus 16 per cent, iiNet 10 per cent, TPG 8 per cent, Primus 3 per cent, and the remaining small providers in total 21 per cent.²⁵ The Herfindahl-Hirschman Index (HHI) (a metric used to estimate the level of market concentration—see appendix C) for fixed broadband services declined from 2838 to 2554, indicating an improvement in competition in the sector over the reporting period.

This improvement in competition in the supply of fixed broadband services appears likely to have come from the entry of competitors in the supply of DSL services through DSLAM investment in local exchanges.

²² Australian Communications Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, p. 23.
²⁵ Estimates based on ACCC Division 12 RKR report 2009–10, available on the ACCC website and data obtained from carriers.
in recent years. Over the 2009–10 period, the ACCC observed some slowing of this investment in respect of (previously expanding) geographic coverage, and investment remains largely confined to metropolitan areas. However, in those areas where access seeker DSLAMs are present, the ACCC notes that access seekers appear to be continuing to invest to deepen their networks and to meet growing consumer demand for data services.

The provision of mobile services (both data and voice) is fairly concentrated across the three main providers (Telstra, Optus and VHA) with a HHI measure of 3126.²⁶ However, the supply of mobile services reflects a greater balance across the three major providers and a greater level of competition than exists in relation to the supply of fixed voice services. In respect of mobile services, Telstra has 40 per cent of total market share, Optus 30 per cent and VHA 25 per cent²⁷ and although the HHI for 2009–10 had a modest increase following the Vodafone and Hutchison Australia merger, it remains significantly lower than the HHI for fixed voice services (5287²⁸).

Telstra continues to supply around 70 per cent of all fixed voice services. However, the ACCC notes that there was some improvement in competition in the supply of fixed voice services in 2009–10, with Telstra experiencing a slight loss of market share (around 2 per cent), which was taken up by smaller players who in total held 18 per cent of the market over 2009–10. (Optus had a fixed voice market share of around 12 per cent in 2009–10).²⁹

These levels of competition are reflected in the degree of price competition observed in telecommunications markets over 2009–10. Over this period the telecommunications industry experienced a degree of price competition, with an overall decline in the average real price of fixed voice and internet services, and, although 2G GSM (2G) mobile prices increased, prices are declining for the increasingly popular 3G mobile services (by around 3.6 per cent over 2009–10). This decline is coupled with an increase in the types of mobile service offers available. (Contained within this volume is the ACCC’s report, *Changes in the prices paid for telecommunications services in Australia 2009–2010*, which provides detailed information on the changes in prices paid by consumers for telecommunications services over the 2009–10 period).

However, the ACCC considers that one of the significant trends observed in 2009–10 has been the industry restructuring that has occurred and the changing business models that have been adopted—apparently to meet increasing consumer demand for bundled services³⁰ and possibly in preparation for the changes anticipated in an NBN environment. Models have ranged from greater vertical integration and horizontal integration to consolidation at a retail level or at a wholesale level. Over recent years the industry has experienced, among other things, the following changes:

- iiNet purchased Westnet Pty Ltd in May 2008
- Soul and TPG merged in April 2008
- Vodafone and Hutchison 3G merged in June 2009
- TPG acquired Pipe Networks in April 2010

²⁶ ACCC Division 12 RKR report 2009–10, available on the ACCC website.
²⁷ Estimates based on ACCC Division 12 RKR report 2009–10, available on the ACCC website, and data obtained from carriers.
²⁸ Figure based on ACCC Division 12 RKR report 2009–10, available on the ACCC website, and Australian Communications Media Authority, *Communications report 2009–10*, ACMA, Melbourne 2010, p. 30.
³⁰ Bundled services have been adopted by 52 per cent of Australian household consumers with a fixed-line telephone. Source: Australian Communications Media Authority, *Communications report 2009–10*, ACMA, Melbourne 2010, p. 15.
• iiNet acquired Netspace in April 2010, and
• iiNet purchased AAPT Ltd’s consumer division in September 2010.

iiNet indicated in its annual report that during the 2009–10 period it pursued a strategy to reach 15 per cent DSL market share to become the second largest DSL provider behind Telstra, and has approached this through the acquisition of the AAPT consumer base and of Netspace. Similar strategies are evident in smaller companies, such as Internode’s expansion of ADSL services in Launceston, Hobart and Brisbane during 2010, and its commitment to provide NBN services as the network is rolled out.

The number of telecommunications companies totalled approximately 1160 at June 2010. Over the 2009–10 period, the number of internet service providers declined by around 110 to approximately 530 in total and the number of fixed voice providers declined by 85 to 306.

Traditional business models within the telecommunications industry appear to be adapting to changes in consumer preferences, with an increasing concern to deliver content services. Providers are beginning to offer subscription television via broadband internet (such as Fetch TV) and ‘unmetered’ internet access to certain television channels, enabling consumers to access content on websites without impacting on monthly data allowances. Concurrently, companies are developing devices to deliver content services to offer subscription television over the internet and to allow delivery of fixed voice, internet and content services through integrated units (such as those offered by iiNet and Telstra).

In addition to these content services, at the time of writing iiNet announced the introduction of mobile services to its suite of products, while TPG has recently started offering fixed voice services.

The industry is also finding alternate means to deliver traditional services. Voice over internet protocol (VoIP) services are being offered by an increasing number of providers with take-up appearing to grow most notably among younger consumers (aged 25–35). Over time, in an NBN environment, public-switched telephony network (PSTN) services may well become obsolete as voice becomes one of many broadband-enabled applications.

Investment within the industry is also responding to these trends, and in particular consumers’ increasing appetite for data rich content. Investment in telecommunications infrastructure has been made by both government and industry over the reporting period.

In the 2009–10 period, NBN Co rolled out parts of the NBN in Tasmania, and released a list of five test sites for mainland Australia. At the same time, the government contracted Nextgen Networks, which

34 Australian Communications and Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, p. 23.
35 Such as Microsoft’s Xbox, which has partnered with pay television company FOXTEL to offer subscription television over the internet, delivered to the consumers’ television set via the Xbox device. See Microsoft, 20 May 2010, FOXTEL and Microsoft sign ground-breaking Xbox agreement, Microsoft, viewed 17 December 2010, http://www.microsoft.com/australia/presspass/post/FOXTEL-and-Microsoft-sign-ground-breaking-Xbox-Agreement.
has begun construction to build the government’s regional backbone links under the Regional Backbone Blackspots Program, which aims to address apparent shortfalls in fibre infrastructure in unprofitable regional areas.39

All three mobile network operators—Telstra, Optus and VHA—continue to upgrade their mobile networks to achieve broader coverage and greater data speeds. Providers also need to invest in infrastructure upgrades in order to respond to and prepare for increased demand on networks—driven, for example, by considerable take-up of smartphones over the reporting period (in 2010, smartphones represented 43 per cent of all mobile phones sold in Australia).40

Providers are investing in the research and development of equipment that delivers content services, and makes better use of limited spectrum. This is evident in trials conducted with long term evolution (LTE) technology, or government—industry co-investment in WiMAX, wireless technology to deliver broadband to residences in broadband blackspots.41

Consistent with this ongoing investment to deliver data services, another area which has attracted investment is HFC and cable networks. Both Telstra and Optus have also invested in their HFC and cable networks, completing upgrades in order to increase download speeds.42 Investment has also occurred in the areas of information technology (IT) and core and transmission networks.

The table below summarises a number of major infrastructure investments made in 2009–10, including upgrades and extensions undertaken, completed or announced with respect to existing networks, and the rollout of the NBN.

39 Department of Broadband, Communications and the Digital Economy, Ministerial speeches: ‘Address to RBBP milestone event’, delivered 11 November 2010.
42 Telstra, Telstra unveils Australia’s fastest cable broadband and new digital set top box, 19 November 2009; and Optus, Optus upgrades cable broadband to deliver supersonic speeds in Brisbane, Melbourne and Sydney, 2 August 2010.
Table 2.1: Selection of infrastructure investment recently undertaken, completed or announced

<table>
<thead>
<tr>
<th>Wireless</th>
<th>DSL</th>
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<tbody>
<tr>
<td><strong>Telstra</strong> completed upgrade of its Next G HSPA+ network with Dual Carrier technology in Feb 2010, which doubles theoretical peak network speeds to 42 Mbps. It plans to further double its theoretical peak network speeds to 84 Mbps through implementation of HSPA+ Dual Carrier plus MIMO technology during 2011. (Telstra media release 15 Feb 2010)</td>
<td><strong>iiNet</strong> announced in Nov 2009 that it would install DSLAMs in eight new regional communities by June 2010, which was made possible due to the new competitive backhaul transmissions provided by <strong>Optus</strong>. (iiNet media release 2 Nov 2009)</td>
</tr>
<tr>
<td><strong>Telstra</strong> continues to invest in spectrum licences to provide additional capacity at both its existing and future Next G network sites. (Telstra media release 25 Oct 2010)</td>
<td></td>
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<tr>
<td><strong>Optus</strong> continued its investment in its 3G dual-band network which covers 97 per cent of the population as at Sept 2010. <strong>Optus</strong> plans to extend coverage to 98 per cent of the population. (Optus investor fact sheet Sept 2010)</td>
<td></td>
</tr>
<tr>
<td><strong>Optus</strong> investment in spectrum licences doubled its 2100 MHz paired spectrum holdings in the eight capital cities from 10 MHz to 20 MHz as at Feb 2010. (Optus media release 5 Feb 2010)</td>
<td></td>
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<tr>
<td><strong>Optus</strong> also announced on 14 July 2010 that it acquired new regional licences in a combination of 10 MHz and 5 MHz of paired spectrum in the 2100 MHz band at almost 1000 sites across regional Australia. (Optus media release 14 Jul 2010)</td>
<td></td>
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<tr>
<td>Vodafone continued rolling out its 3G network in regional areas. First stage of the upgrade was completed in May 2009, which extended 3G coverage to 80 per cent of the population. The second stage of the upgrade will extend 3G to 94 per cent of the population. (Vodafone media release 24 Mar 2009)</td>
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<tr>
<td>VHA plans to install 1150 new sites in its new 850 MHz 3G network in 2011 and plans to install 1400 new sites in its current 3G network. (VHA media release 21 Oct 2010)</td>
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<tr>
<td>Vividwireless plans to continue expanding its existing Sydney, Melbourne and Perth WiMAX network coverage to Brisbane, Canberra and Adelaide, predominantly to inner city and university areas. (Vividwireless media release 10 February 2010)</td>
<td></td>
</tr>
</tbody>
</table>
### HFC and Cable

**Telstra** completed upgrade of its HFC in Melbourne as part of its $300 million upgrade of its cable network in calendar year 2009. The upgrade aims to increase peak download speed to 100 Mbps. (Telstra media release 19 Nov 2009)

**Optus** upgraded its HFC network to DOCSIS 3.0 to deliver to its cable customers in Brisbane, Melbourne and Sydney speeds up to four times faster than before. (Optus media release 2 Aug 2010)

**Telstra** largely completed its $1.5 billion upgrade of its core network—Next IP network. (ZDNet 11 Aug 2009)

**Telstra** continued its ongoing investment in Ethernet backhaul technology, which services base stations covering over 90 per cent of the population. (Telstra media release 25 Oct 10)

**Telstra** continued investment ($240 million in 2009–10) in its transmission capacity. (Telstra annual report 2009–10)

**DBCDE** — Regional Backbone Blackspots Program: construction of the Darwin, Emerald and Longreach route and the Geraldton route have commenced and are expected to be completed by September 2011. (DBCDE website)

### Transmission/ backhaul

**Telstra** also completed an upgrade to its Velocity fibre-to-the-home network, offering to more than one million Melbourne homes a download speed of up to 100 Mbps. (Telstra media release 19 Nov 2009)

**iiNet** announced that it would provide FTTH to 1500 home sites in the Villawood Properties development in Victoria, offering residents broadband speed of up to 100 Mbps. (iiNet media release 2 Nov 2009)

### Satellite/NBN

**Optus**’s D3 satellite was launched on 22 Aug 2009, which would increase Optus’s fleet capacity by more than 30 per cent. It also marks the first use of the Broadcast Satellite Service spectrum in Australia. (Optus media release 22 Aug 2009)

**NBN** is being rolled out among its first release sites which include five in mainland Australia and seven in Tasmania. (Mike Quigley presentation 13 Oct 2010)

The **NBN** network in Tasmania was officially launched on 12 August 2010 with more than 200 kilometres of optic fibre having been laid. (NBN media release 21 Sept 2010)
The following sections look at competitive developments concerning particular telecommunications services over the reporting period, including infrastructure developments, service take-up and usage, market concentration and price trends.

Telecommunications services have been grouped into two broad categories: voice and data services, in line with the typical billing and marketing approaches of providers. Revenue shares also reflect this broad dichotomy. During the 2009–10 financial year, the ACCC estimates that revenue derived from fixed voice services accounted for at least 40 per cent of all fixed line revenue.43

Section 2.2.1 discusses the state of competition in voice services. Section 2.2.2 turns to a similar discussion around data and connectivity.

2.2.1 Voice services

The ways in which voice services are provided continue to evolve in response to changing consumer needs. At present, voice services are supplied over a number of platforms, which include fixed networks (both copper and cable networks), mobile networks and VoIP.

Mobile voice services continue to expand both in take-up and usage. In contrast, fixed voice services appear relatively stable, although some decline has been observed in terms of both subscriptions and, more particularly, usage.

Table 2.2 shows the take-up of fixed voice services and mobile services (voice and data) since 2001–02. The decline in fixed voice SIOs slowed to a 1 per cent decrease in 2009–10 compared to a reduction of around 3 per cent in 2008–09.

Table 2.2: Number of fixed voice and mobile SIOs (millions), 2001–02 to 2009–10

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</tr>
</thead>
<tbody>
<tr>
<td>Fixed</td>
<td>11.4</td>
<td>11.6</td>
<td>11.7</td>
<td>11.5</td>
<td>11.3</td>
<td>10.9</td>
<td>11.0</td>
<td>10.7</td>
<td>10.6</td>
</tr>
<tr>
<td>Mobile</td>
<td>12.7</td>
<td>14.3</td>
<td>16.5</td>
<td>18.4</td>
<td>19.8</td>
<td>21.3</td>
<td>22.1</td>
<td>24.2</td>
<td>26.0</td>
</tr>
</tbody>
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Figure 2.1: RAF reporting companies: fixed and mobile call minutes 2005–06 to 2009–10

![Bar chart showing RAF reporting companies: fixed and mobile call minutes 2005–06 to 2009–10]

Source: ACCC RAF RKR reports 2005–06 to 2009–10 and Telstra annual reports.

Figure 2.1 demonstrates that consumer behaviour appears to be moving towards a preference for mobile voice usage over fixed. This is likely driven by the convenience of mobility and by an overall narrowing of price differentials. Although there is a trend towards greater use of mobile services for voice calls, there has not been a corresponding decline in fixed voice SIOs. Rather, consumers appear to be obtaining more services (that is, both a fixed and mobile voice subscription), also reflected in the increasing number of bundled services.45

The 2009–10 reporting period has seen a decline in the average real price paid for fixed voice services, which fell by 5.8 per cent.46 In contrast, mobile voice services experienced a slight price increase of 1.8 per cent over the same period, driven by a higher average real price paid for 2G services.47 Consumers are increasingly turning away from those 2G services as they take up 3G services in greater numbers.

**Fixed voice services**

‘Fixed voice services’ generally refers to voice services provided over a dedicated access line on a fixed network, plus the provision of one or more of the following calling functions:

- local calls
- national long-distance calls
- international calls
- fixed to mobile calls.

The vast majority of fixed voice services are provided via Telstra’s copper CAN. Optus also provides some fixed voice services over its HFC network.

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44 Note that one of the reporting companies for the 2009–10 financial year has not yet supplied complete data at the time of writing. The 2009–10 figure for total calling minutes is an aggregate of total reported figures plus an estimate for the remaining service provider.

45 Australian Communications Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, p. 15.

46 ACCC Division 12 RKR report 2009–10, available on the ACCC website.

47 ibid.
**Infrastructure developments**

Infrastructure developments relating to fixed voice services are now rarely ‘stand-alone’ fixed voice developments. Instead, developments that may impact on the delivery of fixed voice services will typically relate to investment and industry restructuring that affects the delivery of all fixed services—both voice and data.

In June 2010, Telstra and NBN Co signed a largely non-binding FHoA, which foreshadows progressive migration of Telstra’s CAN and HFC network customers to the NBN in the future. Once the FHoA is implemented, fibre technology (i.e. the NBN) is expected to gradually replace Telstra’s CAN as the main platform for supplying fixed voice services (among other things) to existing customers.

Fibre technology will also be used to supply fixed voice services (as well as data services) to customers in new developments under a policy directive announced by the Minister in December 2010. The directive requires that NBN Co be responsible for the installation of fibre at the development stage in new estates of a particular size, and will be the wholesaler of last resort (Telstra will be the retailer of last resort). 48

**Take-up and usage**

Fixed voice subscription numbers appeared relatively stable over the reporting period. The number of SIOs for fixed voice services dropped slightly, from 10.67 million to 10.59 million in the 12 months to June 2010. 49

Figure 2.2 illustrates that the number of ‘fixed voice only’ SIOs declined further in 2009–10, continuing a trend since September 2007 (when reporting commenced under the Telstra CAN record keeping rules (RKRI)) and consistent with the proposition that consumers are increasingly consuming bundles of telecommunications services—both fixed and mobile voice and data services.

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49 Australian Communications and Media Authority, Communications report 2009–10, ACMA, Melbourne, p. 23.
Unlike the increasing call minutes from mobile services observed, total call minutes from fixed line services declined from 94.6 billion in 2005–06 to 45.6 billion minutes in 2009–10.\(^\text{51}\) The decline in call minutes appears to reflect a preference for using mobile services. However, the overall decline in combined call minutes (that is, from mobile and fixed voice services), by almost 35 per cent between 2005–06 and 2009–10, may also be attributable to a concurrent decline in dial-up subscriptions, approximately 2.8 million at June 2006, as compared with 0.8 million subscriptions at June 2010\(^\text{52}\), and the greater array of alternative forms of electronic communication that have been made available and taken up between 2005–06 and 2009–10.

Fixed voice services can also be obtained using technologies alternative to Telstra’s CAN—for example, the Telstra and Optus HFC networks or using VoIP services often on Naked DSL lines. In the reporting period, the proportion of ISPs that offered Naked DSL increased slightly, from 27 per cent of all providers at June 2009 to 30 per cent at June 2010.\(^\text{53}\) Overall take-up of VoIP services (which includes all VoIP services, not just carrier-grade VoIP supplied using a Naked DSL line) also increased, reaching 2.9 million home VoIP users over the 2009–10 period, an increase of approximately 20 per cent over the previous financial year.\(^\text{54}\) (VoIP usage appears more popular with younger users, with VoIP take-up and usage levels reaching 29 per cent and 25 per cent among those aged 25–34 and 35–44 respectively.\(^\text{55}\))

\(^{50}\) These figures may be overstated: the number of fixed voice only SIOs are Telstra fixed voice only connections on its CAN; however, there may be customers who obtain internet services by means of dial-up, HFC or wireless and separately connected a fixed voice service. At the same time, voice only services are categorised as Telstra voice only, which means that ULLS services, capable of supplying broadband but which may provide voice only, are not included in the total voice only figure.

\(^{51}\) RAF RKR 2003–04 to 2009–10 reports, available on the ACCC website and Telstra annual reports.


\(^{53}\) ibid.

\(^{54}\) Australian Communications Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, p. 23.

Concentration

Over the 2009–10 financial year, the level of concentration in the provision of fixed voice services has been subject to two opposing influences. A number of ISPs are seeking to broaden their product offerings, adding fixed voice services to their suite of products, thereby increasing the number of fixed voice providers. At the same time, there has been consolidation among and withdrawal of fixed service providers. Overall, a decline in the total number of players in the industry has been observed during the 2009–10 period: the number of providers of fixed voice services reduced by 85 from the previous financial year totalling 306.\(^{56}\)

Figure 2.3 illustrates Telstra’s continued dominance within the retail fixed voice market with a market share at or above 70 per cent over the past four years. Optus, Telstra’s nearest fixed voice services rival, maintained a market share of around 12 per cent during the same period, while AAPT dropped from 4 per cent of market share to 2 per cent over 2009–10 and has since sold its consumer business to iiNet.\(^{57}\)

Figure 2.3: Fixed voice service shares by subscriber numbers 2006–07 to 2009–10

Sources: ACCC Div. 12 RKR reports and ACMA, Communications report 2009–10.

Although Telstra clearly dominates the provision of fixed voice services, the ACCC notes that smaller providers have increased their combined market share from 12 per cent to 15 per cent over 2009–10.

Consistent with this, Table 2.3 shows that, while Telstra continues to dominate the provision of fixed voice services over its copper CAN, its retail share has declined while the proportion of ULLS SIOs has grown. Further, the ACCC notes that the number of Telstra wholesale SIOs dropped by around 2.5 per cent over the same period, from approximately 1.3 million to just over 1.25 million.\(^{58}\)

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\(^{56}\) Australian Communications Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, p. 23; and Australian Communications Media Authority, Communications report 2008–09, ACMA, Melbourne 2009, p. 21.

\(^{57}\) iiNet, iiNet shareholders overwhelmingly vote in favour of the acquisition of AAPT’s Consumer Division; iiNet will become the clear leading challenger brand in telecommunications, 29 September 2010.

Table 2.3: Telstra retail and wholesale PSTN and ULLS provided over the Telstra copper CAN and total number of fixed voice SIOs—2005–06 to 2009–10

<table>
<thead>
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<tbody>
<tr>
<td>Telstra total retail SIOs</td>
<td>77%</td>
<td>78%</td>
<td>79%</td>
<td>80%</td>
<td>78%</td>
</tr>
<tr>
<td>Telstra domestic wholesale SIOs</td>
<td>21%</td>
<td>20%</td>
<td>15%</td>
<td>13%</td>
<td>13%</td>
</tr>
<tr>
<td>ULLS SIOs</td>
<td>1%</td>
<td>2%</td>
<td>5%</td>
<td>7%</td>
<td>9%</td>
</tr>
<tr>
<td>Total number of lines on Telstra’s CAN (million)</td>
<td>10.06</td>
<td>10.00</td>
<td>9.90</td>
<td>9.72</td>
<td>9.49</td>
</tr>
<tr>
<td>Total number of fixed line telephone SIOs (million)*</td>
<td>–</td>
<td>10.92</td>
<td>11.00</td>
<td>10.67</td>
<td>10.59</td>
</tr>
</tbody>
</table>

Source: Telstra financial reports.

*ACMA, Communications report 2009–10.

The take-up of the ULLS service rose to 827,333 in 2009–10, up by almost 20 per cent over the previous financial year, on top of the strong growth of 33 per cent in 2008–09. This is likely a result of access seekers migrating their customers from other services (e.g., wholesale line rental services) to ULLS services, leveraging off the investment they have made in this network infrastructure. However, this appears restricted to more profitable metropolitan and central business districts, with access seekers’ strategies for competition appearing to focus on ‘deepening’ their coverage by increasing capacity at exchanges where they already have equipment installed, rather than ‘broadening’ their footprint. This is discussed further at 2.2.2.

Overall, the concentration level of the fixed voice sector as measured by the HHI declined from 5559 in 2008–09 to 5287 in 2009–10 (discussed in appendix C). This, along with the growth observed in access seeker presence in exchanges, confirms that competition on the CAN appears to be increasing, if only marginally, and suggests that the ULLS-based model continues to bring competitive benefits to the retail sector.

However, despite continued investment in some network infrastructure by access seekers, in 2009–10 Telstra’s retail and wholesale services (combined) accounted for 82 per cent of the total number of fixed voice services (albeit a decrease from 85 per cent in 2008–09).

Price trends

In 2009–10, consumers continued to benefit from lower prices with the average real prices for fixed voice services declining by 5.8 per cent, considerably greater than the 2.6 per cent drop experienced in the year before.

Residential customers again experienced a greater price reduction than business customers, continuing a trend since 2007–08. Average real prices for residential and business customers fell by 6.4 and 4.7 per cent respectively in 2009–10, compared to declines of 3.1 and 1.7 per cent in 2008–09.

It is likely that residential customers benefited from the increasing popularity of ‘cap plans’ as well as the additional discounts provided to them in service bundles. Lower prices may also be a response to some

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60 Telstra CAN RKR report, September 2007 to June 2010, available on the ACCC website; Telstra ADSL enabled exchange list as at September 2010, found at www.telstrawholesale.com/products/data/adsl-reports-plans.htm.
competitive tension from alternate services such as mobile voice and VoIP services, representing an effort to limit fixed line losses.

Business customers have experienced greater price declines since 1997–98, with their average real prices falling by around 45.6 per cent, compared with average real prices for residential customers which dropped by 33.2 per cent over the same period.

In 2009–10, prices for every type of fixed voice service fell. Among them, international calls, fixed to mobile calls, and national long distance calls experienced the greatest declines with average real prices falling by 13.8 per cent, 9.7 per cent, and 9 per cent respectively.

Average real prices for basic access services declined by 2 per cent in 2009–10, following a small increase of 1.1 per cent experienced in the financial year before.

Local calls continued a downward trend with their average real prices falling by 7.5 per cent, exceeding the 2.5 per cent drop observed in 2008–09.

For further analysis of the average real prices for fixed voice services, refer to chapter 4 of Changes in the prices paid for telecommunications services in Australia 2009–10, in this volume.

**Mobile voice services**

A ‘mobile voice service’ refers to a voice service based on radiofrequency technology operating on a cellular basis. A mobile voice service has the advantage of mobility over a fixed voice service, allowing end-users to move between cells while operating their voice service. There has been evidence suggesting that consumers value the convenience afforded by this mobility and their increasing demand for mobile services generally continue to drive significant investment in mobile networks.

**Infrastructure developments**

In 2009–10, all major mobile network operators continued to upgrade their networks to meet consumer demand (for voice and data). Specifically:

- Telstra completed its upgrade of its Next G HSPA+ network with Dual Carrier technology in February 2010, which doubles theoretical peak network speeds to 42 Mbps. It plans to further double its theoretical peak network speeds to 84 Mbps through implementation of HSPA+ Dual Carrier plus MIMO technology during 2011.62
- Optus expanded its 3G dual-band network to cover 97 per cent of the population as at September 2010. Optus plans to further extend coverage to 98 per cent of the population.63 Optus has stated that during the 2009–10 period it devoted 57 per cent of its total capital expenditure to mobile infrastructure.64
- VHA continued rolling out its 3G network in regional areas, with the first stage of the upgrade completed in May 2009, extending 3G coverage to 80 per cent of the population. The second stage of the upgrade will extend 3G coverage to 94 per cent of the population.65

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62 Telstra, Telstra launches world’s first HSPA+ Dual Carrier network, 15 February 2010.
In addition, VHA also announced plans to install 1150 new sites to its new 850 MHz 3G network, as well as 1400 new sites to its current 3G network in 2011.66

Investment also occurred in purchasing additional spectrum licences. Telstra continued to invest in spectrum licences to provide additional capacity at both its existing and future Next G network sites.67 Optus doubled its 2100 MHz paired spectrum holdings in the eight capital cities from 10 MHz to 20 MHz as at February 2010.68 Optus also acquired new regional licences in a combination of 10 MHz and 5 MHz of paired spectrum in the 2100 MHz band at almost 1000 sites across regional Australia.69

**Take-up and usage**

Unlike fixed voice services, mobile service take-up continues to increase year-on-year. There were close to 26 million mobile subscriptions (including mobile data services)—up by 7 per cent from just over 24 million as at June 2009.70 However, this appears driven primarily by mobile data services, which accounted for approximately 1.4 million additional subscribers over the financial year.71

Figure 2.4 shows that the penetration of mobile services (voice and data) continues to increase and is now around 117 per cent of the total population.

**Figure 2.4: Penetration of fixed voice and mobile services 2001–02 to 2009–10**

![Graph showing penetration of fixed voice and mobile services 2001–02 to 2009–10](image)


Mobile voice service use is also on the increase. At the end of the 2005–06 financial year, RAF RKR data indicated that the total number of call minutes from mobile services came to approximately 18.6 billion; this

70 Australian Communications Media Authority, *Communications report 2009–10*, ACMA, Melbourne 2010, p. 23.
71 ibid.
figure increased by almost 10 billion over the period to 2009–10, when the total number of calls made from mobile services totalled 28.2 billion at June 2010.

There is also evidence of a clear shift away from 2G mobile services to 3G mobile services, as illustrated in figure 2.5.

**Figure 2.5: Total 3G and 2G connections 2003–2010**

![Graph showing total 3G and 2G connections 2003–2010](image)


**Concentration**

The provision of mobile services in Australia is dominated by three carriers (mobile network operators): Telstra, Optus and VHA, possessing 40 per cent, 30 per cent and 25 per cent share of the retail business respectively (smaller providers hold the remaining share).72

Similar to previous years, Telstra remained the carrier with the largest number of subscribers (around 9.5 million), although its market share dropped slightly to around 40 per cent in 2009–10 and the number of Telstra retail mobile voice services declined. Subscribers of 3G services accounted for 75 per cent of Telstra's mobile subscribers, up from 60 per cent in 2008–09.73

Optus has increased its market share slightly, back to around 30 per cent while VHA maintained its combined market share (Vodafone and Hutchison) at 25 per cent in 2009–10.74

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72 Australian Communications Media Authority, *Communications report 2009–10*, ACMA, Melbourne 2010.

73 Estimates based on data collected under ACCC Division 12 RKR 2009–10, available on the ACCC website.

74 The sum of the percentage shares may not add up to the total market due to rounding.
Other mobile service providers, including mobile virtual network operators (MVNO) and resellers, accounted for the remaining 6 per cent of the retail business, up by 2 per cent from 2008−09. These providers purchase wholesale services from the three mobile network operators, and include: Macquarie Telecom, Dodo, TPG, People Telecom, AAPT, Comtel and TransACT. The entry of additional MVNOs over the reporting period—such as Woolworths, Amaysim and Lycamobile—suggests that the mobile carriers are willing to explore revenue opportunities in the provision of wholesale services and suggests that there may be some degree of competition in the provision of these services.

VHA was formed in the last financial year through a merger between Vodafone and Hutchison (which also operated the ‘3’ network). This merger was approved by the ACCC as, although the merger would increase the concentration of the mobile market, the ACCC considered that the merger would not result in substantial lessening of competition in the retail mobile telecommunications market and, absent the merger, the parties (Vodafone and Hutchison) would be unlikely to sustain the significant investment in their mobile networks to provide competitive services.

The level of market concentration increased moderately post the Vodafone-Hutchison merger, with the HHI rising to 3126 in 2009−10 compared to 2933 recorded in 2008−09.

Price trends

Overall, the average real price for all mobile services increased by 1.8 per cent, in contrast to the decline of 7.8 per cent in the previous financial year.

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75 Estimates based on data collected under ACCC Division 12 RKR 2009−10, available on the ACCC website.
78 The figure in the previous report has been revised.
The slight increase in the average real price is a result of an increase in the average real price for 2G services (of 10.5 per cent), which offsets the decrease for 3G services (of 3.6 per cent). In comparison, both 2G and 3G services experienced declines in average real prices in the 2008–09 financial year (of 10.8 per cent and 4.2 per cent respectively).

The average real price for post-paid 2G services increased by 14.7 per cent in the 2009–10 reporting period, which follows a decrease by 7.4 per cent in the 2008–09 period. Prepaid 2G services also experienced an increase in average real price in 2009–10 by 5.9 per cent, in contrast to a 14.3 per cent decrease in the previous financial year.

The downward trend in average real price for 3G services continued in 2009–10. The average real price for post-paid 3G services declined by 3.8 per cent and 0.3 per cent for prepaid 3G services. This compares with declines over the 2008–09 financial year of 3.3 per cent for post-paid services, and 10.5 per cent for prepaid services.

For further analysis of the average real price for mobile voice services, refer to chapter 5 of Changes in the prices paid for telecommunications services in Australia 2009–10, in this volume.

### 2.2.2 Data and connectivity

In addition to voice services, the other broad category of telecommunications services relate to services which provide data access and connectivity to the internet. There are a range of technology platforms capable of delivering these services (the majority of which are broadband)\(^\text{79}\) to Australian households, as outlined below.

**Dial-up:** uses the voice band frequency to transmit internet data over the copper network and has a headline data download transmission rate at a theoretical maximum of 56 kilobits per second (Kbps).

**DSL, including asymmetric DSL (ADSL):** like dial-up, uses the copper network to provide an internet service. DSL operates at distinctly separate and much higher frequencies than voice services, and therefore is a form of broadband which operates independently of and simultaneously with the provision of voice services over the same copper pair.

**HFC:** is a combination of optical fibre and coaxial cable, which can be used to provide high-speed broadband services, in addition to pay TV and voice services.

**Fibre:** refers to optical fibre which can be used to provide high-speed broadband services by transmitting information as light pulses. Optical fibre is capable of carrying much more information than conventional copper wire and is in general not subject to electromagnetic interference and the need to retransmit signals.

**Wireless** broadband is offered over fixed and mobile wireless:

- **Fixed wireless** has evolved out of extensions of fixed services (such as internet). The access network is provided by means of a radio channel (air interface) using point-to-point or point-to-multipoint technology. This technology usually requires a fixed antenna at the receiving point.

- **Mobile wireless** has evolved from mobile phone technology. The access network is provided by means of a radio channel (air interface) using cellular technology which offers roaming from...

\(^\text{79}\) Broadband is a relative term. It refers to a variety of internet access speeds. However, a common feature of broadband internet, regardless of access technology, is that it offers faster theoretical peak network speeds than those offered by dial-up and can be used concurrently with a voice service.
interconnected regions of services. Users can access this network either via a 3G voice handset or via non-voice service equipment such as a universal serial bus (USB) modem or datacard over HSPA or WiMAX networks.

**Satellite broadband:** utilises geostationary orbiting satellites to relay data signals sent and received via a satellite dish by isolated end-users to and from a ground station connected to a broadband network.

Although there are a variety of technological platforms capable of delivering data services, DSL (including ADSL) remains the predominant technology accounting for 44 per cent of the total number of internet service subscribers. Wireless broadband significantly deepened its penetration with 36 per cent of the total subscribers, up from 11 per cent in 2008. However, it should be noted that ABS subscriber numbers for each platform include subscribers who also have other types of internet services. The ACCC expects that many of the subscribers who took up wireless broadband services in 2009–10 already had, and continue to have, DSL or another form of fixed broadband service.

**Figure 2.7:** Dial-up, DSL and wireless proportions of internet service subscribers June 2006 to December 2010

[Graph showing proportions of internet service subscribers]

Source: Australian Bureau of Statistics.

That said, the ACCC considers that the declining use of dial-up, now less than 10 per cent (down from over 20 per cent in 2008) of all internet subscriptions as at June 2010, suggests that it is being replaced by alternative technologies such as DSL.

Such dynamics are also reflected in observed price changes, with dial-up experiencing around a 13 per cent increase in average real price in 2009–10. Meanwhile, the average real price for wireless services was down by around 13 per cent over the same period, following a drop of 18.5 per cent in 2008–09. Overall, the average real price for all internet services fell by 4.4 per cent over the reporting period.

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81 ibid.
Infrastructure developments

Industry investment over 2009–10 appeared to be focused on building network capacity to meet increased demand for data and data-intensive applications, such as video-streaming, peering\(^{82}\) and online gaming. This investment has been observed across competing platforms, including mobile networks, HFC/cable networks, transmission networks, as well as satellite networks.

Section 2.2.1 of this report outlines the mobile operators’ investment strategies over 2009–10. While relevant to the provision of voice services, these strategies appear to be aimed primarily at increasing their capabilities to supply mobile data services.

While current allocations of spectrum may act as a constraint if consumer demand for content-heavy devices continues to grow rapidly, the industry’s capacity to develop technologies further may be facilitated by two significant new bands of spectrum being made available for wireless communications. The government’s decision over the digital dividend, for instance, is expected to have a considerable impact on the future capabilities and competition within mobile markets.\(^{83}\)

In addition, the government’s decision over 15-year spectrum licences currently held by telecommunications providers (used for 2G and 3G services) may influence the future of communications; these licences are due to expire between 2013 and 2017.\(^{84}\) At the time of writing, the government is considering its options regarding the reissue of these licences.

In 2009–10, the following developments occurred or were announced in relation to HFC/cable networks:

- Telstra completed a $300 million upgrade of its HFC network in Melbourne in 2009. The upgrade aims to increase the peak download speed to 100 Mbps. Telstra also completed an upgrade to its Velocity fibre-to-the-home network, offering a network download speed of up to 100 Mbps.\(^{85}\)
- Optus upgraded its HFC network to DOCSIS 3.0 to deliver to its cable customers in Brisbane, Melbourne and Sydney speeds up to four times faster than previously.\(^{86}\)

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\(^{82}\) Peer-to-Peer (or user to user) networking is generally used for file sharing applications such as the distribution of music and video files. These applications use more network capacity than small interactive transaction applications like e-mail, web browsing, e-bay, banking, etc. As demand for these larger file transfers increases, more and more network capacity is consumed with average user data rates (and subsequent information throughput) being substantially reduced.

\(^{83}\) The switchover to digital-only television is due to occur in December 2013, and will free up spectrum known as the ‘digital dividend.’ Following public consultation, the Minister announced in June 2010 that the government would release 126 MHz of digital dividend spectrum. The Minister also stated that the government expected to allocate the spectrum under the digital dividend in late 2012. Similarly, during 2009–10 the ACMA undertook further public consultation on whether the 2.5GHz band, almost exclusively licensed for electronic news gathering applications at the time of writing, could be re-allocated for wireless access services such as high-bandwidth communications services. Source: Department of Broadband, Communications and the Digital Economy, size and location of the digital dividend, 24 June 2010, viewed 17 December 2010 http://www.minister.dbcde.gov.au/media/media_releases/2010/062; and Australian Communications and Media Authority, ACMA to re-plan part of the 2.5GHz band and retain capacity for electronic news gathering, 21 October 2010, viewed 17 December 2010, http://www.acma.gov.au/WEB/STANDARD/pc=PC_312322.


A number of developments also took place in respect of transmission capacity and backhaul networks, specifically:

- Telstra largely completed its $1.5 billion upgrade of its core network—Next IP network.\(^{87}\)
- Telstra continued its on-going investment in Ethernet backhaul technology, that services base stations covering over 90 per cent of the population.\(^{88}\)
- Telstra invested $1.8 billion in its transmission networks over the last four years.\(^{89}\)
- Nextgen Networks commenced construction of the Darwin, Emerald and Longreach route and the Geraldton route under the Australian Government’s Regional Backbone Blackspots Program. The routes are expected to be completed by September 2011.\(^{90}\)

Optus’s D3 satellite was launched on 22 August 2009, which would increase Optus’s fleet capacity by more than 30 per cent. It also marked the first use of the Broadcast Satellite Service spectrum in Australia.\(^{91}\)

In addition, the government’s investment in the fast speed fibre network continued with the NBN being rolled out among its first release sites, which include five in mainland Australia and seven in Tasmania.\(^{92}\) The NBN network in Tasmania was officially launched in August 2010, with more than 200 kilometres of optic fibre having been laid by late September 2010.\(^{93}\) iiNet also announced plans to roll out FTTH to 1500 home sites in the Villawood Properties development at Alamanda in Victoria, offering residents broadband speed of up to 100 Mbps.\(^{94}\)

**Take-up and usage**

According to the Australian Bureau of Statistics, there were 9.6 million active internet subscribers at the end of June 2010, 92 per cent of whom were non dial-up subscribers.\(^{95}\) Over the reporting period, the total number of DSL services supplied over Telstra’s CAN grew by 156,555 (4 per cent) to almost four and a half million SIOs.\(^{96}\)

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96 Telstra CAN RKR report, September 2007 to June 2010, available on the ACCC website.
Unsurprisingly, however, mobile wireless internet appears to be the fastest growing subscription type, with a growth of approximately 1.4 million subscribers over the financial year to 3.5 million.\textsuperscript{97} This is also reflected in Telstra’s reported mobile data revenue growth of 21.7 per cent, and 34 per cent in wireless broadband subscriber growth (with more than 1.6 million subscribers) as at June 2010.\textsuperscript{98}

While wireless internet services are the fastest growing subscription type, the greatest volume of data download occurs over fixed broadband services. Fixed broadband was responsible for 174 665 terabytes in the quarter ending December 2010, compared with wireless broadband at 16 990 terabytes and 4029 terabytes in mobile handset data downloads.\textsuperscript{99} As illustrated by figure 2.8, there has been considerable growth in the total downloads from consumers over time, increasing by 36 433 terabytes in the quarter between June 2010 and December 2010, or almost 140 per cent from December 2008 to December 2010.

Figure 2.8: Total downloads (TB) per quarter June 2008 to December 2010

![Figure 2.8: Total downloads (TB) per quarter June 2008 to December 2010](image)

Source: ABS, Internet Activity Australia (8153.0).

Consumers are also increasingly moving toward a preference for faster access speeds, demonstrated by figure 2.9 which reflects trends in broadband subscription take-up since June 2006.

\textsuperscript{97} Australian Communications Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, p. 23.


Figure 2.10 illustrates that, in the 2009–10 financial year, Telstra’s DSL market share declined to around 39 per cent, compared to 43 per cent posted in the previous two years. In contrast, access seekers successfully increased their market share largely at the expense of Telstra. However, despite this apparent increase in competition in the sector on a national basis, a more detailed examination of the available data shows that during 2009–10 there were two stories of competition in the provision of DSL broadband services. In CBD and metropolitan areas, there has been a considerable amount of market entry in the form of DSLAM investment, contributing to a greater degree of competition in these areas. In contrast, little market entry had been seen in regional and rural areas by the end of June 2010.

In 2009–10, iiNet surpassed Optus as the number two DSL provider with a market share of 12 per cent, closely followed by Optus and TPG, each with 10 per cent market share. Other smaller providers accounted for the remaining 25 per cent, a slight decrease from 2008–09.
Figure 2.10: DSL broadband share 2007–08 to 2009–10

<table>
<thead>
<tr>
<th>Year</th>
<th>Telstra</th>
<th>Optus</th>
<th>iiNet</th>
<th>TPG</th>
<th>Primus</th>
<th>Other</th>
</tr>
</thead>
<tbody>
<tr>
<td>2007–08</td>
<td>43%</td>
<td>30%</td>
<td>11%</td>
<td>6%</td>
<td>6%</td>
<td>5%</td>
</tr>
<tr>
<td>2008–09</td>
<td>43%</td>
<td>27%</td>
<td>11%</td>
<td>8%</td>
<td>4%</td>
<td>4%</td>
</tr>
<tr>
<td>2009–10</td>
<td>39%</td>
<td>27%</td>
<td>10%</td>
<td>12%</td>
<td>10%</td>
<td>4%</td>
</tr>
</tbody>
</table>

Source: ACCC Division 12 RKR reports, Telstra CAN RKR reports, and data from carriers.

Many access seekers’ strategies for competition appear to focus on ‘deepening’ their coverage by increasing capacity at exchanges where they already have equipment installed, rather than ‘broadening’ their footprint by deploying DSLAMs in new exchange service areas (ESAs).

The ESAs are divided into four ‘bands’:
- Band 1: ESAs located in selected central business districts
- Band 2: predominantly metropolitan areas; also includes large regional towns
- Band 3: regional areas, and
- Band 4: rural areas that contain small populations or no residents at all.

While expansion into new ESAs has slowed, access seekers have increased the number of DSL services they provide over the past three years, predominantly in Bands 1 and 2. Over the reporting period, the total number of ULLS and LSS services in operation (SIOs) increased by 292,266 to 1,561,488, up by 23 per cent. The greater part of this growth occurred in Band 2, with an increase of 269,543 SIOs over 2009–10.

Over 65 per cent of retail ADSL SIOs in Band 1 and over 45 per cent of retail ADSL SIOs in Band 2 are provided by access seekers on unbundled lines (see table 2.4 below). In contrast, less than 5 per cent of retail ADSL SIOs in Band 3 and less than 1 per cent of retail ADSL SIOs in Band 4 are provided by access seekers on unbundled lines.

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Table 2.4: Access seekers’ DSL SIOs as percentage of total DSL SIOs

<table>
<thead>
<tr>
<th>Financial year</th>
<th>Band 1 (%)</th>
<th>Band 2 (%)</th>
<th>Band 3 (%)</th>
<th>Band 4 (%)</th>
<th>All bands (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2007–08</td>
<td>53.4</td>
<td>30.4</td>
<td>1.8</td>
<td>0.3</td>
<td>23.0</td>
</tr>
<tr>
<td>2008–09</td>
<td>60.4</td>
<td>39.0</td>
<td>2.7</td>
<td>0.4</td>
<td>29.2</td>
</tr>
<tr>
<td>2009–10</td>
<td>66.7</td>
<td>45.9</td>
<td>4.1</td>
<td>0.4</td>
<td>34.7</td>
</tr>
</tbody>
</table>

Source: Telstra CAN RKR reports.

Table 2.5 shows that access seeker presence in Bands 3 and 4 reached 11.1 per cent and 0.8 per cent respectively, which was significantly lower than Bands 1 and 2, with 77 per cent and 100 per cent access seeker presence respectively.102

Table 2.5: Percentage of ESAs with access seeker DSLAM presence

<table>
<thead>
<tr>
<th>Financial year</th>
<th>Band 1 (%)</th>
<th>Band 2 (%)</th>
<th>Band 3 (%)</th>
<th>Band 4 (%)</th>
<th>All bands (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2007–08</td>
<td>100</td>
<td>72.6</td>
<td>9.2</td>
<td>0.8</td>
<td>18.9</td>
</tr>
<tr>
<td>2008–09</td>
<td>100</td>
<td>75.5</td>
<td>9.6</td>
<td>0.8</td>
<td>19.5</td>
</tr>
<tr>
<td>2009–10</td>
<td>100</td>
<td>76.9</td>
<td>11.1</td>
<td>0.8</td>
<td>20.1</td>
</tr>
</tbody>
</table>

Source: Telstra CAN RKR reports.

The total number of ULLS and LSS SIOs increased by around 0.92 million across all bands to a total of approximately 1.6 million as at June 2010, illustrated in figure 2.11.103 Meanwhile, the total number of voice only SIOs over the copper network fell by 0.75 million.104

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103 ibid.
104 ibid.
Figure 2.11: Number of ULLS and LSS SIOs across all bands and quarterly change September 2007 to September 2010

Source: Telstra CAN RKR reports.

Fixed broadband (DSL plus HFC)

Both Telstra and Optus provide broadband internet services via their HFC networks with over 400,000 subscribers each. Figure 2.12 shows that when HFC broadband services are also taken into account, Telstra supplied around 41 per cent of retail fixed broadband services in 2009–10, followed by Optus with a 16 per cent share.

Figure 2.12: Fixed broadband (DSL plus HFC) market share 2007–08 to 2009–10

Source: ACCC Division 12 RKR reports, Telstra CAN RKR reports, and data from carriers.

105 ACCC Division 12 RKR report 2009–10, available on the ACCC website.
The level of concentration in this sector measured by the HHI dropped from 2838\(^{106}\) in financial year 2008–10 to 2554 in 2009–10, suggesting increased competition, which is likely to be driven by strong access-based competition in providing DSL services.

**Wireless broadband**

Figure 2.13 shows that Telstra remained the largest provider of wireless broadband services, with an increased market share of 47 per cent. VHA replaced Optus as the number two provider with over 22 per cent market share, followed by Optus (at around 21 per cent).

**Figure 2.13: Wireless broadband market share 2007–08 to 2009–10**

![Figure 2.13: Wireless broadband market share 2007–08 to 2009–10](image)

<table>
<thead>
<tr>
<th></th>
<th>2007–08</th>
<th>2008–09</th>
<th>2009–10</th>
</tr>
</thead>
<tbody>
<tr>
<td>Telstra</td>
<td>51%</td>
<td>46%</td>
<td>41%</td>
</tr>
<tr>
<td>Optus</td>
<td>17%</td>
<td>22%</td>
<td>21%</td>
</tr>
<tr>
<td>Hutchison</td>
<td>7%</td>
<td>6%</td>
<td>0%</td>
</tr>
<tr>
<td>Vodafone/VHA</td>
<td>7%</td>
<td>3%</td>
<td>1%</td>
</tr>
<tr>
<td>Unwired</td>
<td>5%</td>
<td>5%</td>
<td>8%</td>
</tr>
<tr>
<td>Others*</td>
<td>0%</td>
<td>1%</td>
<td>1%</td>
</tr>
</tbody>
</table>

Source: ACCC Division 12 RKR reports, and data from carriers.

* All wireless broadband service providers

The wireless broadband sector became somewhat more concentrated post the Vodafone–Hutchison merger with the HHI increasing to 3247 in the reporting period—higher than the 3039\(^{107}\) recorded in 2008–09.

**Price trends**

The ACCC introduced an internet services index to its *Changes in the prices paid for telecommunications services in Australia 2007–08* report. This index shows how average real prices have changed for consumer-grade internet services. Wireless services were included in the internet services index for the first time in the 2008–09 report.

The average real price paid for internet services fell by 4.9 per cent during 2009–10. The reduction was a result of declines in average real prices for every type of internet service, except dial-up services. Wireless internet became increasingly competitive, offering lower prices and higher data downloads, with average real price reducing by 14.7 per cent over the period (following a decline of 18.5 per cent in 2008–09).

\(^{106}\) The figure in the previous report has been revised.

\(^{107}\) The figure in the previous report has been revised.
Average real prices for DSL services also fell in 2009–10 by 2 per cent, following a 0.4 per cent drop in 2008–09. This suggests increased price competition in the DSL sector is occurring.

For cable services, the average real price fell by 1.1 per cent in 2009–10, in contrast to an increase of 0.5 per cent observed in 2008–09.

### 2.3 Telecommunications complaints

The ACCC receives complaints relating to issues of consumer protection. Within the telecommunications industry, the ACCC recorded 4970 complaints during the reporting period, which is an increase of approximately 9 per cent from 2008–09. Approximately 30 per cent of complaints received were not within the ACCC’s jurisdiction, and so were referred to more appropriate agencies such as the Telecommunications Industry Ombudsman (TIO).

During this reporting period, there were 23 major investigations into consumer protection issues in the telecommunications industry. More detail regarding ACCC investigations can be found within chapter 4.

Over the 2009–10 period, the TIO recorded 167,955 new complaints; compared with the previous period, this is a reduction of 4.6 per cent in new complaints. Despite this decrease over the financial year, the TIO saw a significant resurgence of new complaints in the half year to December 2010, up by almost 7000 new complaints on the previous half to 87,264.

| Table 2.6: TIO complaints received by service type 2007–08 to 2009–10 |
|---------------------------------|---|---|---|
| **Type of service** | 2007–08 | 2008–09 | 2009–10 |
| Mobile premium | 10% | 8% | 2% |
| Internet | 23% | 24% | 25% |
| Mobile | 31% | 37% | 44% |
| Fixed voice+ | 36% | 32% | 28% |
| **Total number** | 119,248 | 175,963 | 167,955 |

The TIO suggested that a decline of around 16 per cent in fixed voice complaints was likely to be a result of the trend towards fixed voice to mobile substitution. This decrease in fixed voice complaints was accompanied by an increase in new mobile service complaints by just over 14 per cent, and, for internet services, an increase of almost 3 per cent. Since the 2007–08 reporting period, mobile complaints have almost doubled. The second half of 2010 also saw a barrage of mobile complaints, accounting for

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108 The TIO's previous figures represented all contacts recorded, which include general enquiries. Table 2.7 is a reflection of all contacts, and not 'new complaints' (a 'new complaint' is when the TIO first receives an expression of grievance or dissatisfaction from a consumer where their telecommunications company has had an opportunity to consider the matter).


52 per cent of all new complaints, which the TIO considered were related in some part to difficulties with VHA’s Vodafone network.\(^{112}\)

Of particular note over 2009–10 was a decline of just over 70 per cent in complaints relating to mobile premium services (MPS).\(^{113}\) The MPS Code is currently being reviewed by the Communications Alliance. The ACCC is participating in the code review, and provided a submission to the Communications Alliance in August 2010. The submission noted that, whilst there has been significant decrease in complaints about MPS since the introduction of the code in mid-2009, the ACCC has some outstanding concerns about the operation of the MPS Code in relation to particular advertising practices, information provision, and complaint handling that need to be addressed. The review is ongoing.

Although there was a modest decline in new complaints registered, customer service complaint issues\(^{114}\) recorded by the TIO experienced a growth of 1.4 per cent between the 2008–09 and 2009–10 periods. Combined, complaint handling and customer service issues for the 2009–10 period came to 166 817. The most common complaint handling issue recorded was ‘Failure to action undertakings made to resolve a customer’s complaint’ at 61 per cent from this category, and for customer service complaints, the most common issue was ‘Incorrect/Inadequate advice provided to customer’ at 60.5 per cent.\(^{115}\)

The TIO reported a decrease over 2009–10 financial year in the number of cases that required facilitated TIO resolution, or TIO investigation, by 6.5 per cent from the previous financial year.\(^{116}\) However, the ACCC is mindful that the actual level of consumer detriment is likely to be higher than complaint statistics indicate, given that complaints are also received by a number of bodies (the TIO, the ACMA, and state and territory consumer protection agencies), and given there are many consumers who typically do not complain, such as younger consumers and consumers from non-English speaking backgrounds.

The lock-in nature of consumer contracts and high transactional and financial costs involved in changing service providers discourage many dissatisfied customers from taking their business elsewhere. As a result, there appears to be inadequate market incentives for telecommunications providers to deliver good customer service. This is reflected in the TIO’s complaint statistics, and is of particular concern as technology drives a greater variety of products and services, requiring greater customer service both at the point of sale and post-sales support.

The ACCC notes that while there was a decrease in the number of new complaints recorded by the TIO over the 2009–10 financial year, this comes on the back of the significant increases in complaints witnessed over the period between 2006 and 2009. Complaints increased by 21 per cent in 2006–07, 40 per cent in 2007–08 and approximately 48 per cent in 2008–09. Even with the decline in complaint numbers in the reporting period, complaint numbers have increased by roughly 168 per cent since the 2004–05 period, illustrated by the below table, and over the second half of December 2010 grew by 8.7 per cent on the previous half to 87 264 new complaints.\(^{117}\)

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\(^{114}\) The TIO records and reports on ‘issues’ at each case level. Every case includes at least one issue, and most cases include more than one issue.


\(^{116}\) ibid.

Table 2.7: Total TIO complaints since 2004–05

<table>
<thead>
<tr>
<th>Period</th>
<th>Total complaints</th>
</tr>
</thead>
<tbody>
<tr>
<td>2004–05</td>
<td>62,766</td>
</tr>
<tr>
<td>2005–06</td>
<td>70,391</td>
</tr>
<tr>
<td>2006–07</td>
<td>85,188</td>
</tr>
<tr>
<td>2007–08</td>
<td>119,248</td>
</tr>
<tr>
<td>2008–09</td>
<td>175,963</td>
</tr>
<tr>
<td>2009–10</td>
<td>167,955</td>
</tr>
</tbody>
</table>

Source: Telecommunications Industry Ombudsman.

In July 2010, the ACMA initiated a public inquiry, titled ‘Reconnecting the customer’, in response to the significant complaint numbers recorded by the TIO. The ACMA states that the purpose of its inquiry is to:

- identify systemic causes of dissatisfaction with complaint handling and related customer service matters within the telecommunications industry
- identify ‘best practice’ standards in complaint handling and customer service
- assess the extent to which current regulatory and institutional arrangements support or hinder the adoption of adherence to best practice, and
- identify enduring solutions to systemic problems having regard to the nature of the rapidly changing communications environment.

The ACMA released a progress report of its public inquiry in December 2010, and while the progress report does not aim to conduct a detailed analysis, it made two key observations. Firstly, the ACMA observes that there is a need for considerable improvement in complaint handling and customer service within the telecommunications industry. Secondly, that the challenges faced by the industry in delivering acceptable customer service are not unique, and incentives to drive improvements within other regulatory frameworks will inform the ACMA in making its final recommendations.

The ACCC made a public submission to the inquiry in October 2010, noting that the increased level of telecommunications-related enforcement activities is evidence of broader concerns regarding industry misconduct and persistent problems for consumers. The nature of complaints received by the ACCC indicate that firms often match poor practice by a competitor for fear they may otherwise be disadvantaged in the market and/or would bear higher costs if they maintained better practices. The ACCC’s experience in receiving and investigating consumer complaints about telecommunications services indicates the existence of systemic and persistent problems in the way information is provided to consumers at different stages of the consumer–provider relationship.

Consumer protection issues in the telecommunications industry, particularly advertising practices, also continue to be of major concern to the ACCC. The current self-regulatory approach, relying mostly on industry codes such as the Communications Alliance’s Telecommunications Consumer Protection Code (TCP Code), is not providing adequate consumer protection safeguards. The ACCC considers that

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118 These figures have been revised by the TIO—it has adopted a new approach to reporting statistics which highlight the number of new complaints received by the TIO, thereby representing the individual consumers whose complaints have not been resolved by service providers.

there are deficiencies in the structure and operation of the self-regulatory telecommunications consumer protection framework. These deficiencies relate to the lack of appropriate incentives for industry members to comply with the framework’s obligations, including a lack of consequences for engaging in poor conduct; and a lack of regular visibility of emerging and systemic issues that cause, or have the potential to cause, widespread consumer harm.

Whilst it is possible that some of the problems apparent in this sector can be dealt with more effectively if there are genuine improvements to the TCP Code, the ACCC believes that careful consideration should be given to whether other regulatory tools are more appropriate, more transparent and more efficient in addressing industry problems.

2.4 National Broadband Network and legislative developments

National Broadband Network

During the reporting period, a number of foundations for the National Broadband Network were established. Through the range of announcements from the government, Telstra and NBN Co, the telecommunications industry gained greater clarity in relation to the network topology and use of existing infrastructure to deliver the NBN.

The key events and announcements relating to the rollout of the NBN include:

- Telstra and NBN Co signing a largely non-binding FHoA
- the release of the NBN Implementation Study, prepared by McKinsey-KPMG
- the introduction of two NBN-related Bills: the National Broadband Network Companies Bill 2011 (the Companies Bill)\(^{120}\) and the Telecommunications Legislation Amendment (National Broadband Network Measures—Access Arrangements) Bill 2011 (the Access Bill)\(^{121}\)
- the government providing its final response to the Implementation Study with its Statement of Expectations (SoE) relating to the NBN
- the government’s agreement with the ACCC’s advice on the initial location and number of points of interconnect (POIs) to the NBN\(^{122}\), and
- the government releasing public versions of NBN Co’s Corporate and Business Plans.

The June 2010 Telstra/NBN Co FHoA was a significant development over the reporting period, providing the industry with greater understanding of the likely manner in which the NBN rollout and customer migration will occur. The FHoA, if finalised, will allow:

- NBN Co to obtain access to particular Telstra facilities and infrastructure, such as ducts and pits, and provide for NBN Co’s right to acquire Telstra’s backhaul services and space in Telstra’s exchanges, and

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\(^{121}\) ibid.

\(^{122}\) Statement of Expectations letter from Senator the Hon Penny Wong and Senator the Hon Stephen Conroy to Mr Harrison Young, 17 December 2010, p. 7.
• Telstra to progressively migrate its customer traffic onto the NBN and decommission use of its copper and HFC networks for the delivery of voice and broadband services.\(^\text{123}\)

The ACCC will have a role in considering the consequences on competition and consumer interests of any binding agreement between the parties.

During the early stages of the NBN project, the government commissioned an independent study, the NBN Implementation Study by McKinsey and Company and KPMG. Delivered in May 2010, the NBN Implementation Study made 84 recommendations to the government relating to the technology, financing, ownership, policy framework, and market structure of the NBN project. This report informed a number of the decisions made by the government.

In December 2010, the government announced its continuing progress and development of the NBN under its SoE. The SoE outlines the government’s expectations in relation to coverage and the premises to be served by the NBN, the location of points of interconnect (POIs), uniform national pricing, NBN Co’s compliance with the proposed regulatory framework (contained within the Companies and Access Bills) as well as service offerings, pricing, funding and privatisation. The government’s adoption of the ACCC’s semi-distributed POIs recommendation has also led to the identification of the initial location and number of POIs to best meet the long-term interests of end-users (LTIE). NBN Co has at this point identified 121 POIs that meet the criteria set out in the ACCC’s advice.

The release of NBN Co’s Business and Corporate Plans alongside the government’s SoE provided access seekers and the public with information in relation to the products and pricing that will be offered to RSPs. NBN Co’s Business and Corporate Plans have provided the public with information in relation to:

• products and pricing
• network rollout and connections
• financial forecasts and funding arrangements, and
• key assumptions relating to issues such as greenfield developments, FHoA and definitive agreements, and legislative arrangements.

Work also began in 2009 to install and connect the NBN to 200,000 premises in Tasmania, while on the mainland NBN Co selected five ‘first release’ sites as part of its live trials of the network design and construction methods.\(^\text{124}\) At the same time, the government initiated a $250 million Regional Backbone Blackspots Program to address shortfalls in fibre infrastructure in unprofitable regional areas, preparing the way for the NBN by rolling out what it considers necessary key infrastructure. In December 2009 Nextgen Networks was commissioned to construct 6,000 kilometres in regional backbone links.\(^\text{125}\)

### Legislative developments

In the 2009–10 period, the industry continued to operate under a considerable degree of uncertainty regarding future legislation. While a number of Bills were introduced in late 2009, debate did not resume until the Bills were reintroduced in late 2010. With the passage of the *Telecommunications Legislation Amendment (Competition and Consumer Safeguards) Bill 2010*, Explanatory Memorandum, House of Representatives, 2010, p. 2.


\(^{125}\) Department of Broadband, Communications and the Digital Economy, Ministerial speeches: ‘Address to RBBP milestone event’, delivered 11 November 2010.
Amendment (Competition and Consumer Safeguards) Act 2010 (CACS Act) in December 2010, and the reintroduction of two NBN-related Bills, the industry has greater clarity as to the regulatory framework under which it is to operate into the future.

That said, there are a number of decisions that need to be made pursuant to legislation, which are likely to have a major impact on competition in the years ahead. Examples include a Telstra structural separation undertaking and migration plan, ministerial determinations and exemptions, and NBN access terms and conditions.

The reforms introduced by the CACS Act provide major structural change to the regulatory framework, and are likely to also affect industry substantially. The CACS Act contains a series of reforms in three primary segments:

- to address Telstra Corporation’s vertical and horizontal integration by giving priority to a structural separation process126
- streamlining the anti-competitive conduct and access regimes under the Competition and Consumer Act 2010
- strengthening consumer safeguards measures, such as priority assistance.127

**Addressing Telstra’s vertical and horizontal integration**

The CACS Act amends the Telecommunications Act 1997 (Telecommunications Act) to provide for the ACCC to assess a structural separation undertaking and migration plan if submitted by Telstra, or an undertaking in relation to its HFC network or subscription television licence.

Telstra may submit a voluntary, although enforceable, undertaking to the ACCC to structurally separate. Amendments in the CACS Act enable the Minister to provide guidance to the ACCC regarding the matters to take into account when considering the undertaking. In addition, the undertaking must provide for transparency and equivalence in relation to the supply of regulated services by Telstra to its wholesale customers and retail business units in the period leading up to separation.

Arrangements or agreements between NBN Co and Telstra that would otherwise raise competition concerns may be authorised, if the conduct is required to fulfil obligations arising from Telstra’s structural separation. However, the ACCC retains some regulatory oversight of the arrangements in that it must approve an undertaking prior to the authorisation taking effect.

The Minister may impose upon Telstra mandatory functional separation in the event Telstra does not submit a structural separation undertaking. However, at the time of writing, it is expected that Telstra will submit a structural separation plan.

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127 ibid., p. 1.
Aspects of the Part XIC access regime under the *Competition and Consumer Act 2010* remain unchanged from the regime that existed under the *Trade Practices Act 1974*. The objective of promoting the LTIE remains the same. The access regime also remains applicable to declared services only, and the ACCC’s ability to declare a service has not altered. However, the following aspects of the regime have changed as a result of the CACS Act:

- A declaration must still specify an expiry date—the expiry date should occur between three and five years after declaration, unless in the ACCC’s opinion the declaration should be for a longer or shorter period.\(^{128}\)

- If the ACCC declares a service and no access determination has previously been made in relation to that service, it must hold a public inquiry regarding the making of an access determination for that service within 30 days of declaration.\(^{129}\)

- For services which are already declared and no access determination has previously been made in relation to that service, a public inquiry regarding the making of an access determination must be made within 12 months of the commencement of the relevant amendment.\(^{130}\)

- A final access determination must be made within six months of the commencement of the public inquiry (it can be extended for six months, on multiple occasions).\(^{131}\)

- While the ACCC no longer determines pricing principles and model terms and conditions, an access determination must specify price or a method of ascertaining price, and may cover a broad range of terms and conditions.\(^{132}\)

- The ACCC may make binding rules of conduct in relation to access to a declared service with an expiry date occurring in the 12-month period beginning when the rules were made—binding rules of conduct may only be made if the ACCC considers that there is an urgent need to do so.\(^{133}\)

- Standard access obligations (SAOs) will be affected by a structural separation undertaking from Telstra; for instance, if Telstra commits, as part of a structural separation undertaking, to cease the supply of services in a particular area using certain fixed line assets and in accordance with a particular timeframe, then Telstra’s ability to meet that timeframe will not be affected by access seekers requesting access to services using those assets under Part XIC.

- Access agreements must be lodged with the ACCC.\(^{135}\)

- Ordinary access undertakings will no longer be available and only special access undertakings in respect of a service which has not yet been declared can be submitted to and accepted by the ACCC.\(^{136}\)

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128 *Competition and Consumer Act 2010*, s. 152ALA(2).
129 id., s. 152BCI(1).
130 ibid., s. 152BCI(2).
131 ibid., s. 152BCX(2).
132 ibid., s. 152BCX(3).
133 ibid., s. 152BDC.
134 ibid., s. 152AB.
135 ibid., s. 152BEA.
136 ibid., s. 152CBA(1).
• Certain exemption provisions of the CCA have been repealed and accordingly ordinary individual exemptions and ordinary class exemptions from the SAOs for declared services are no longer available (consistent with the new regime whereby the ACCC is to set up-front price and non-price terms and conditions for declared services).  

Compliance with access determinations (ADs) is a condition of a carrier licence and a service provider rule. The ACCC can seek enforcement of an AD under the Telecommunications Act 1997, or parties can seek private enforcement in the Federal Court.

There will be a period of transition from the old to the new access regime.

National Broadband Network policy and legislation

Two NBN-related Bills were introduced to the House of Representatives in November 2010: the National Broadband Network Companies Bill 2011 (the Companies Bill) and the Telecommunications Legislation Amendment (National Broadband Network Measures—Access Arrangements) Bill 2011 (the Access Bill).

The Companies Bill provides for a standalone Act to provide a regulatory framework for the wholesale-only structure of NBN corporations, and aims to address issues of government ownership and potential sale of its stake. The Companies Bill states that the objects of the Bill, when read together with Part XIC of the CCA, are to:

• ensure that the supply of an eligible service by an NBN corporation is on a wholesale basis
• ensure that an NBN corporation does not supply a content service
• ensure that an NBN corporation does not supply goods that are not for use in connection with the supply of an eligible service by the NBN corporation
• provide a framework for the functional separation of NBN corporations and a framework for the divestiture of assets of NBN corporations
• ensure that an NBN corporation provides open access to eligible services on a non-discriminatory basis.

The NBN Access Bill amends the CCA and the Telecommunications Act to introduce new access, transparency and non-discrimination obligations relating to the supply of wholesale services by an NBN corporation. Key objectives of the access arrangements for NBN Co are to ensure:

• services needed by its wholesale customers are available
• information about the services and the terms and conditions of supply is available and transparent
• there is open, non-discriminatory access to those services, and
• there is scrutiny by, and recourse to, the ACCC in relation to access issues.

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137 Items 137 and 144 of the Telecommunications Legislation Amendment (Competition and Consumer Safeguards) Act 2010 (CACS Act).
141 ibid., pp. 9–10.
The access obligations set out under the Access Bill state that NBN Co cannot supply a service unless the service is declared. Declaration can occur in the following ways:

- the ACCC has declared the service
- NBN Co has published a standard form of access agreement on its website, or
- a special access undertaking relating to the service is in operation.  

The Access Bill also introduces a range of measures aimed at facilitating the government’s policy objective of uniform national pricing. This includes authorisations for NBN Co to engage in particular forms of conduct that might otherwise be considered anti-competitive under Part IV and Part XIB of the CCA, provided the conduct is reasonably necessary to achieve uniform pricing.  

In addition, the Access Bill amends:

- the Telecommunications Act to restrict a network owner using its network to supply superfast fixed line telecommunications services if the same network is capable of, but is not used to supply, Layer 2 bitstream services 
- the Telecommunications Act to require those network operators to only supply to carriers or services providers (i.e. on a ‘wholesale-only’ basis)
- the CCA to require the declaration of a Layer 2 bitstream service (by the ACCC) as well as its supply on a non-discriminatory basis.  

Another Bill of relevance to the NBN fibre rollout, which came before the parliament within the reporting period, was the Telecommunications Legislation Amendment (Fibre Deployment) Bill 2010, dealing with the rollout of fibre communications networks in new housing estates. This Bill lapsed, and was reintroduced in early 2011. In the interim, the Minister released a policy statement on fibre in new developments, including that yet to be announced regulatory changes will give effect to the new policy. 

This policy statement specified that NBN Co will be responsible for the installation of fibre at the development stage at new developments within its fibre footprint and will also be the wholesaler of last resort (while Telstra was named the retailer of last resort).
3 Anti-competitive conduct provisions

This chapter examines activities undertaken by the Australian Competition and Consumer Commission (ACCC) in 2009–10 in dealing with anti-competitive behaviour under the Trade Practices Act 1974 (TPA), both under telecommunications specific and general provisions.

These provisions have changed with the introduction of the Telecommunications Legislation Amendment (Competition and Consumer Safeguards) Act 2010 (CACS ACT). In addition, the TPA was renamed the Competition and Consumer Act 2010 and changes were made to incorporate the Australian Consumer Law from 1 January 2011. For the purposes of this chapter, however, reference has continued to be made to the provisions under the TPA that were in place over the reporting period.

The telecommunications specific anti-competitive conduct provisions are contained under Part XIB of the TPA. These provisions prohibit a carrier or carriage service provider (CSP) from engaging in anti-competitive conduct—this prohibition is also known as the ‘competition rule’. Section 151AJ of the TPA sets out the two circumstances where a carrier or CSP is considered to have contravened the competition rule.

The first of these circumstances is where a carrier or CSP takes advantage of a substantial degree of market power in a telecommunications market with the effect, or likely effect, of substantially lessening competition in that or any other telecommunications market. It is not necessary to examine the purpose of the conduct under the competition rule, unlike the general section 46 misuse of market power provision (in Part IV of the TPA).

The second circumstance is where a carrier or CSP engages in conduct relating to a telecommunications market that contravenes the general anti-competitive conduct provisions in Part IV of the TPA. In particular, these provisions include:

- s. 45—contracts, arrangements or understandings that restrict dealings or affect competition
- s. 45B—covenants affecting competition
- s. 46—of market power
- s. 47—exclusive dealing
- s. 48—resale price maintenance.

3.1 Investigations conducted in 2009–10

The ACCC undertook nine investigations into alleged anti-competitive conduct under Part IV or Part XIB of the TPA during the reporting period. Eight of these nine investigations were concluded because the ACCC’s inquiries suggested that there was insufficient material to substantiate the alleged conduct as requiring action under Part IV or Part XIB of the TPA.

During the reporting period, the ACCC was successful in a court action against Telstra for contravention of the standard access obligations (SAOs) in Part XIC of the TPA and the facilities access regime in the Telecommunications Act 1997 (Telecommunications Act), that is administered by the ACCC. This matter is discussed below at 3.1.1.

150 ibid.
The remaining anti-competitive conduct investigations included allegations of misuse of market power, exclusive dealing and agreements lessening competition.

At the end of the reporting period, one investigation was ongoing. This investigation related to Telstra’s provision of a wholesale ADSL service to its retail competitors and its own retail pricing of ADSL services. Further detail regarding this matter is at 3.1.2.

### 3.1.1 Exchange capping litigation

In early 2009 the ACCC instituted proceedings against Telstra in the Federal Court for contraventions of the standard access obligations (SAOs) under the TPA and the facilities access regime under the Telecommunications Act.

The ACCC alleged that Telstra refused access seeker requests for interconnection at seven key metropolitan exchanges by claiming that these exchanges were ‘capped’. The ACCC alleged that there was capacity available, or that capacity could have been made available.

The ACCC also alleged that Telstra engaged in misleading and deceptive conduct in contravention of section 52 of the TPA, by representing to access seekers individually and on lists published on the Telstra Wholesale website that certain exchanges were capped when there was space available.

The ACCC sought a pecuniary penalty, declarations and injunctions. The ACCC had put a penalty of $40 million to the court while Telstra submitted that the appropriate penalty was in the order of $3−5 million.

In handing down the decision, the court noted that Telstra was in an overwhelming position of bargaining strength and ‘has control over its exchanges and the power to allow or refuse access’ to those exchanges. The court noted that Telstra had shown ‘no true remorse’ for its conduct, ‘nor an appreciation of the seriousness of the admitted contravention.151

On 28 July 2010, the Federal Court declared that Telstra had contravened conditions of its carrier licence. The total penalty imposed by the Federal Court was $26.5 million; however, the Federal Court granted Telstra a 30 per cent discount for cooperation, acceptance of responsibility and for implementing a compliance program. Telstra was therefore fined $18.55 million.152

### 3.1.2 Wholesale ADSL service

During July and August 2010, the ACCC received complaints from a number of wholesale ADSL access seekers about a series of recent retail price reductions by Telstra for its fixed broadband and for its bundled broadband and fixed voice plans.

The ACCC subsequently investigated the alleged price squeeze under Part XIB of the TPA—the fourth such investigation since 2001. Vertical price squeeze conduct occurs when a vertically integrated firm uses its power over the supply of a key wholesale input to reduce the margin available to access seekers which it also competes with in the downstream retail market.

152 ibid.
The ACCC currently has concerns about the impact of the following on retail fixed broadband and fixed voice competition:

- the ability and incentive for Telstra to leverage its position as the sole wholesale ADSL supplier in many rural/regional areas to discourage the use of competitive infrastructure in CBD/metropolitan areas
- the significant delays between release of new retail broadband pricing and the finalisation of negotiations with access seekers for wholesale ADSL pricing
- the level and structure of prices for wholesale ADSL and wholesale line rental services relative to Telstra's retail pricing.

On 20 October 2010 the ACCC wrote to Telstra and several ISPs outlining its concerns and providing a final opportunity for industry to resolve the issues commercially. Responses to the ACCC’s open letter and further inquiries made in early 2011 will assist the ACCC in determining what further action, if any, is necessary.

### 3.1.3 Competition and advisory notices

The ACCC did not issue any competition notices to carriers or CSPs in the 2009–10 financial year.

The ACCC’s primary objective in administering the competition notice provisions of the TPA is to stop and prevent anti-competitive conduct. Under the TPA, the ACCC may issue either a Part A or B competition notice in response to alleged anti-competitive conduct by a carrier or CSP, when it has reason to believe that the carrier or CSP has engaged, or is engaging in, anti-competitive conduct and has contravened the competition rule. When exercising this discretion the ACCC must consider the guidelines it has issued under section 151AP(2) of the TPA and any other matters it considers relevant.\(^{153}\)

The ACCC may also issue a notice advising a carrier or CSP of the action that it should take, or consider taking, to ensure that it either ceases to engage or does not commence to engage in anti-competitive conduct. This is known as an advisory notice.

The ACCC did not issue any advisory notices in the 2009–10 period.

### 3.2 Exemption orders

A carrier or CSP proposing to engage in conduct that may normally breach the competition rule can apply to the ACCC for an exemption order.\(^{154}\) An exemption order may be granted if the ACCC is satisfied that:

- the resulting public benefit outweighs any public detriment of lessened competition
- the conduct will not breach the competition rule.

An exemption order means that the conduct specified will not be anti-competitive for the purpose of the competition rule.

To date the ACCC has not received an application for a competition rule exemption.

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\(^{154}\) Section 151AS of the *Trade Practices Act 1974*. 
3.3 Third line forcing notifications

Third line forcing is a specific form of exclusive dealing prohibited outright by the TPA. It is not subject to the substantial lessening of competition test. It involves the supply of goods or services on condition that the purchaser buys goods or services from a particular third party, or a refusal to supply because the purchaser will not agree to that condition.

Third line forcing conduct can be notified under Part VII of the TPA and authorised by the ACCC on public benefit grounds. Sections 47(6) and 47(7) of the TPA make third line forcing a per se breach of the TPA unless it relates to products or services provided by a related body corporate.

The ACCC received a number of third line forcing notifications from participants in the telecommunications industry in 2009–10. All of these notifications were allowed to stand on public benefit grounds.
4 Consumer safeguard provisions

This chapter provides a brief summary of the Australian Competition and Consumer Commission’s (ACCC’s) major investigations into potential breaches of the consumer protection provisions contained in Part V of the Trade Practices Act 1974 (TPA). As of 1 January 2011, the TPA was renamed the Competition and Consumer Act 2010, and incorporates the Australian Consumer Law. For the purposes of this chapter, however, the provisions under the TPA will be discussed as these were in place at the time of the reporting period.

The sections relevant to potential breaches of consumer protection include sections 52 and 53 of the TPA. Section 52 prohibits a corporation in trade or commerce from engaging in misleading or deceptive conduct or conduct that is likely to mislead or deceive. Section 53 of the TPA prohibits a corporation in trade or commerce from making false or misleading representations in connection with the promotion or supply of goods or services.

The TPA does not contain consumer protection provisions specific to the telecommunications sector.

A total of 4970 consumer protection complaints about the telecommunications industry were registered with the ACCC in 2009–10. This was a 9 per cent increase from the 4559 complaints and queries received in the previous year. About 30 per cent of complaints did not fall within the ACCC’s jurisdiction, therefore complainants were referred to more appropriate bodies, such as the Telecommunications Industry Ombudsman (see 2.3).

A significant number of complaints received may relate to the same issue, particularly where the conduct affects a large number of consumers. Many of the issues identified were resolved through initial ACCC investigation or by ACCC contact with the relevant parties.

4.1 Investigations conducted in 2009–10

- The ACCC undertook 23 major Part V investigations during 2009–10, a slight decrease compared with 27 investigations for the 2008–09 reporting period.155
- The ACCC continued its broader initiative launched in 2008–2009 to ‘clean up’ telecommunications advertising. This had culminated in September 2009 with the ACCC accepting a court enforceable undertaking from industry leaders Telstra, Vodafone Hutchison Australia (operating under the Vodafone, 3 and Crazy John’s brands) and Optus (also on behalf of Virgin Mobile) agreeing that they would review and improve their advertising practices so that consumers are better informed about telecommunications products and services.
- In the undertaking, the ACCC identified the 12 most prevalent types of potentially misleading representations made in telecommunications marketing. The three industry leaders have undertaken that their advertising will not make these claims in circumstances where they are likely to be misleading to consumers.

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155 If a number of parties were investigated for the same or similar conduct, this was counted as one investigation; however, where separate proceedings were instituted against individual parties, these were counted as separate investigations.
In late 2009, the ACCC also held ‘truth in advertising’ workshops to deliver the messages contained in the undertaking directly to the second-tier industry participants to encourage compliance. As a result, providers serving 90 per cent of the telecommunications industry have been directly advised of the ACCC’s concerns and proposed action, and can be considered on notice as to the ACCC’s position on truth in advertising.

- The reduction in investigation numbers may be attributed to greater compliance as a result of the court enforceable undertaking accepted by the ACCC from the three industry leaders. The undertaking also provides for faster resolution of ACCC concerns, requiring the telecommunication service provider to respond to notice of ACCC concerns promptly (within five business days) or risk Federal Court proceedings. Consequently, various matters have been resolved by the provider either amending or withdrawing advertising quickly, whereas in the past these concerns may have led to major investigations.

- In the meantime, ACCC investigations into the advertising conduct of telecommunication service providers have continued. The major ACCC investigations in 2009–10 were:
  - In March 2010, the ACCC accepted a court enforceable section 87B undertaking from People Telecom. People Telecom admitted that it had transferred customers from rival carriers without consent and that its sales agents made potentially misleading claims in order to sign-up customers. People Telecom provided an undertaking to offer affected consumers refunds and waive debts arising from telemarketing and door-to-door sales on its behalf.
  - In June 2010, the ACCC instituted proceedings in the Federal Court against SingTel Optus, alleging that various television, radio and print advertisements which promoted ‘unlimited’ calls to mobiles, ‘unlimited’ SMS, ‘unlimited’ home phone and/or ‘unlimited’ broadband were misleading because each of the offers were subject to a number of limitations and restrictions. The Federal Court hearing was held on 5 October 2010 and 26 October 2010. In February 2011, the Federal Court declared that Optus had contravened s 52 of the TPA as it failed to sufficiently and prominently disclose conditions on the offer.\textsuperscript{156}
  - In August 2010, the ACCC instituted proceedings in the Federal Court against EDirect, alleging that it had engaged in misleading, deceptive and unconscionable conduct in connection with the supply of mobile phone plans to customers in Australia through its telemarketing system. This telemarketing system was designed to obtain positive affirmation from the customer. The Federal Court hearing is scheduled for 18–22 April 2011.

In addition to the above actions, the ACCC instituted proceedings in the Federal Court in September 2010 against SingTel Optus, alleging that advertising by SingTel Optus promoting certain ‘Think Bigger’ and ‘Supersonic’ broadband plans were misleading and deceptive, in breach of sections 52, 53(aa) and/or 55A. The ACCC alleged that the advertising campaigns for internet broadband plans failed to sufficiently disclose (or did not disclose at all) that, once the peak period allowance had been exceeded, the customer’s speed would be limited to 64kbps for the remainder of the month. This was the case for both peak and off-peak periods which meant that a consumer would not receive the plan’s promised headline total allowance of broadband usage.

The Federal Court found that Optus had engaged in misleading and deceptive conduct. The outcomes included an injunction restraining Optus from engaging in similar conduct for three years and corrective advertising orders including in-store posters and website notices.

\textsuperscript{156} Australian Competition & Consumer Commission v Singtel Optus Pty Limited [2011] FCA 87.
4.1.1 Mobile phone retail warranties

During the 2009–10 period, the ACCC took action against a number of companies relating to warranties for mobile handsets provided pursuant to a service contract.

On 12 January 2010, the ACCC accepted a section 87B undertaking from VHA, addressing representations to consumers about their statutory rights to remedies for faulty mobile phone handsets. Consumers only received the benefit of a 12 month warranty (normally mirroring the manufacturer’s warranty) despite being tied into a 24 month service contact. Pursuant to the undertaking, VHA agreed to offer an express repair warranty for mobile handsets for the entire length of the consumer’s service contract.

In April 2010, the ACCC accepted administrative undertakings from Fone Care Pty Ltd (the operator of Nokia Care Centres), and Nokia Australia Pty Ltd. The outcome was that Fone Care undertook to cease using its service agreement that restricted consumers’ rights to statutory warranties, cease using a refund policy which imposed a 14 day limit on statutory warranty claims, and refrain from making other false or misleading representations regarding statutory warranty rights.

And finally, in October 2010, after discussions with the ACCC, Telstra announced that it would strengthen its handset warranties by rolling out 24 month warranties for mobile handsets supplied with 24 month service contracts (excluding Apple products).

4.1.2 Mobile premium services

Communications Alliance initiated a review of the Mobile Premium Service (MPS) Code in July 2010. The ACCC made a submission to this review, recommending that the following concerns be addressed:

- information provision and advertising practices
- double opt-in arrangements
- complaint handling processes.

The ACCC continues to be involved in this review.

To date, the ACCC has instituted eight separate actions against mobile premium service provider advertisers.

4.1.3 Phone calling cards

Following on from legal action undertaken in 2008–2009 against Tel.Pacific Limited and Cardcall Pty Ltd, the ACCC has continued to focus on misleading phone card claims.

In July 2009, the ACCC instituted legal proceedings in the Federal Court against Prepaid Services Pty Limited (a wholly owned subsidiary of Optus Mobile Pty Ltd) and Boost Tel Pty Limited in relation to the sale of their pre-paid phone cards. The ACCC alleged a number of misrepresentations including that Prepaid Services and Boost misrepresented that certain phone cards would provide consumers with a specified amount of call time. A Federal Court hearing occurred on 10 December 2009. The outcomes included declarations that the respondents had made false representations.
4.1.4 Other activities

The ACCC also participated in a number of initiatives during the reporting period. In July 2010 the ACMA released the Terms of Reference and a consultation paper for its ‘Reconnecting the Customer’ inquiry into complaint handling and customer service. The ACCC provided its submission to the ACMA on 19 October 2010, in which the ACCC recommended that the inquiry investigate overarching issues that contribute to consumer detriment and, ultimately, complaints to service providers.

The ACCC’s submission noted that information deficiencies about complex telecommunications products and services are key contributors to consumer detriment in the sector. The submission also noted that service providers will need strong incentives to improve their customer service and complaint handling practices, and that the ACMA should consider whether some form of direct regulation could more effectively address industry problems that are apparent under the current self-regulatory framework.

The ACCC was also involved in the Communications Alliance review of the Telecommunications Consumer Protection Code, commencing June 2010. Communications Alliance released an issues paper, canvassing areas for improvement.

In addition, Communications Alliance assembled the NBN Consumer Dialogue and Education Initiative working group, which was initiated in June 2010 under the NBN-related work program to examine consumer/end-user issues. The ACCC continues to participate and provide input into the working group.
5 Monitoring and reporting

The ACCC is responsible for overseeing the development of a competitive telecommunications industry within Australia. Under the regime which existed during the reporting period, this involved investigating anti-competitive practices and arbitrating access price disputes as necessary important functions within these responsibilities. The new regime, established under the *Telecommunications Legislation Amendment (Competition and Consumer Safeguards) Act 2010* (CACS Act), continues to hold investigating anti-competitive practices as an integral function of the ACCC’s, but replaces the arbitration system with a declaration model whereby the ACCC establishes the terms and conditions of access to declared services.

Under both the old and new models, the legislation has recognised that appropriate information is key to discharging the ACCC’s duties successfully. The ACCC has the power to establish RKRs which define the data and information that telecommunications carriers are required to keep and provide to the ACCC on an ongoing basis.

The ACCC collects information in order to monitor the behaviour of communications industry participants and to develop appropriate regulatory responses. Over the 2009–10 period, the ACCC has exercised its powers to obtain information under section 155 of the TPA and through telecommunications-specific powers under Part XIB of the TPA. For example, section 151BU in Part XIB enables the ACCC to make an RKR by written instrument and to require that carriers and CSPs comply with it. The rule may specify what records are kept, how reports are prepared and when these reports are to be provided.

The Minister can require that the ACCC monitor and report on various aspects of competition within the industry. The Minister has also given the ACCC the responsibility of monitoring Telstra’s compliance with its retail price controls, which are decided through ministerial determination.

While the TPA was renamed the *Competition and Consumer Act 2010* (CCA), incorporating a number of changes as of 1 January 2011, these changes do not affect this report given the reporting period covers the financial year 2009–10.

5.1 Ongoing and new monitoring and reporting activities

5.1.1 Telstra’s compliance with its retail price controls

Since 1989, Telstra has been subject to arrangements that limit its ability to increase its retail prices. The controls are set by government through ministerial determination and were most recently amended in January 2006.\(^{157}\)

The central framework of Telstra’s retail price control arrangements consists of a series of price caps that apply to specified ‘baskets of services’.

- The first basket of services consists of local calls, trunk calls (which include national long-distance and fixed-to-mobile calls), international calls and line rentals. This basket is subject to a price cap of consumer price index (CPI)–CPI per cent. This means that Telstra is entitled to change the individual

\(^{157}\) At the request of the Minister, the ACCC conducted a review of the retail price controls and submitted a report in March 2010. Following this, the DBCDE announced that price controls would remain in place until June 2012.
prices of the services within the basket as it wishes, but the aggregate price of all services in the basket must not increase in nominal terms.

- The second and third baskets consist of Telstra’s most basic line rental product offered to residential customers and to business customers respectively. In 2009–10 these baskets were subject to a price cap of CPI–0 per cent.
- The fourth basket consists of connection services and is subject to an annual price cap of CPI–0 per cent.

All PSTN services are subject to the price caps, except those supplied to large business customers on individual contracts.

Telstra is able to claim credits for investing to improve the quality of the services within the baskets, which are offset against actual price movements.

Also, if Telstra prices below the maximum level permissible, the difference may be carried forward as a credit into the next price cap period. The price control arrangements also require the charges for Telstra’s most basic line rental product and untimed local calls to be broadly similar for metropolitan and non-metropolitan end-users, and Telstra to comply with other specific pricing and notification requirements.

Under the retail price control arrangements, the ACCC is responsible for developing a methodology to measure price changes, assess the accuracy and completeness of Telstra’s report, and report annually to the Minister on the adequacy of Telstra’s compliance.

In early 2010, the ACCC conducted an inquiry, at the request of the Minister, into Telstra’s price control arrangements and reported back to the Minister in March 2010. Following the review, the Minister extended the operation of Telstra’s price control arrangements until 30 June 2012.

Under clause 13(5) of the Ministerial Determination, the value of a price movement for a basket of services may be determined in accordance with a methodology developed by the ACCC. The methodology for calculating yields has recently been changed for the 2010–11 financial year and now requires that Telstra calculate the carry-in credits from the 2009–10 price cap period using the average number of services in operation, rather than the method used previously. As a result, the carry-in credit may differ.

In November 2009 the ACCC submitted to the Minister’s office its assessment of Telstra’s compliance with the retail price controls for 2008–09.

5.1.2 Communications infrastructure

In order to facilitate improved regulatory decisions, the ACCC requires industry data on telecommunications network infrastructure. This information is intended to assist the ACCC in administering its regulatory functions under Part XIC of the TPA.

Following a strategic review of the regulation of fixed network services, the ACCC formed the view that a consistent and coherent database of communications infrastructure was necessary. The ACCC concluded that this would further inform the effectiveness and timeliness of future regulatory processes. As a result of this review, the ACCC established a communications infrastructure audit in 2007–08. This audit aims
to collect data on the nature and location (including take-up in certain circumstances) of competing communications infrastructure by issuing two RKRs:

- The Telstra CAN RKR requires Telstra to disclose key information about the ULLS, the LSS and its own voice and DSL services, disaggregated on an ESA basis for each quarter. The information is used for a number of purposes, such as assessing a Telstra application for exemption from SAOs. The ACCC also publishes summary data from the Telstra CAN RKR periodically.

- The Audit of Telecommunications Infrastructure Assets RKR requires 22 specified carriers to report on the locations of their core network and CAN infrastructure. The first response was received from industry in 2008. The purpose of this RKR is to provide the ACCC with a consistent and coherent database to inform regulatory decisions. Seventeen responses were received from industry during the 2009–10 period.

- The ACCC has taken a flexible and cooperative approach to the reporting requirements and, while some trade-offs have been made to minimise the reporting burden, there remains the capacity with this information to continue to improve the efficiency and effectiveness of regulatory decisions.\(^\text{158}\)

### 5.1.3 Accounting separation

The aim of accounting separation is to increase competition by making the comparative treatment of the retail business and wholesale customers more transparent. In 2002, the government made provision for an enhanced accounting separation of Telstra’s wholesale and retail operations with the passage of the *Telecommunications Competition Act 2002*. In accordance with this Act, the Minister made a direction instructing the ACCC to issue RKRs requiring Telstra to provide reports on:

- current and historical costs under the telecommunications industry accounting framework
- imputation analysis comparing Telstra’s retail prices and the costs faced by access seekers in buying core telecommunications services—LCS, public switched telephone network originating/terminating access (PSTN OTA) and ULLS—from Telstra, to indicate whether margins are sufficient to allow efficient firms to compete against Telstra in the retail market
- key performance indicators on non-price terms and conditions (NPTC) that compare Telstra’s customer service performance in specified retail and wholesale supplied services.

The ACCC reports on a biannual basis for current cost accounting and on a quarterly basis for imputation and NPTC.

### 5.1.4 Annual report on retail telecommunications prices

Published jointly with this report, the ACCC also reports on telecommunications prices as part of monitoring and reporting requirements outlined under Division 12 (in Part XIB) of the TPA. This ministerial report specifies charges paid by end-users of telecommunications services.

In December 2004 the ACCC issued an RKR specifying that information for this purpose be provided by telecommunications carriers and CSPs. Carriers and CSPs reporting under this RKR are: Telstra, Optus, AAPT, Primus, Hutchison, Vodafone, Virgin Mobile, and iiNet. In 2009–10, these carriers and CSPs supplied additional data necessary to commence reporting on various internet data services.

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\(^{158}\) Australian Communications and Media Authority, Australian Competition and Consumer Commission, *Communications infrastructure and services availability in Australia 2008*, ACMA, Melbourne, 2008.
The RKR was also revised in 2009–10 because of market changes. Following the merger between Vodafone and Hutchison to form Vodafone Hutchison Australia (VHA), the RKR was revised to include the new company name as a carrier.

### 5.1.5 Bundling RKR

Since 2003, the ACCC has monitored the bundling arrangements that Telstra offers to its residential customers. This monitoring requirement grew from a concern about the effects of bundling on competition in telecommunications markets.

Telstra supplies quarterly reports on its bundling arrangements, including data on the number of customers on each arrangement, associated revenue and the discounts given. In June 2009, Telstra was granted an exemption from the requirement to produce information in relation to associated revenue and discounts given.

The data shows a continuation in the upward trend in residential customers choosing to bundle additional services with fixed line voice services. However, there has been a decrease in the number of residential customers using fixed voice services. The data shows that during 2009–10 the number of Telstra residential customers choosing to bundle additional products with fixed line voice services declined by 4.2 per cent. Further, there has been an 8.6 per cent decrease in the number of residential customers using Telstra’s fixed voice only services. The ACCC also notes a significant increase (33.8 per cent) in bundling wireless broadband products with other products and a decrease (7.3 per cent) in bundling mobiles with other products.159

### 5.1.6 Access to Telstra exchange facilities RKR

The ACCC became concerned with Telstra’s record keeping following a spate of claims from Telstra that it was unable to provide access to access seekers in particular exchanges, stating that these were ‘capped’ due to insufficient space. Under these circumstances, access seekers were unable to interconnect with ULLS and LSS, raising competition concerns in these ESAs. In addition, access seekers had complained to the ACCC that they were experiencing delays in gaining access to exchange buildings to install DSLAM equipment.

In July 2008, following public consultation, the ACCC issued an RKR requiring Telstra to keep and retain records and give reports to the ACCC relating to access to Telstra exchange facilities.

The RKR requires Telstra to give monthly reports to the ACCC about decisions to cap and uncap exchanges and the amount of space in an exchange reserved by Telstra for its own anticipated future requirements. The RKR also requires Telstra to report on the details of queued access seekers, their position in the queue and any progress in the queue.

The ACCC considers that the RKR provides independent oversight of Telstra’s processes to ensure that access is not unreasonably denied. The RKR is also intended to provide confidence to access seekers investing in competitive DSLAM infrastructure about the accuracy of Telstra’s processes.

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159 Telstra, Residential bundled services report—June 2009, Section 3; Telstra, Residential bundled services report—June 2010, Section 3, Residential bundled services report.
On 5 December 2008, the ACCC issued a disclosure direction to Telstra to publicly disclose certain RKR information. The information to be disclosed included both:

- the number of capped exchanges
- the types of construction works required to access specific exchanges, and the queued access seekers at exchanges.

The first public report was made available in February 2009. During the 2009–10 financial year, the report was published monthly. At the beginning of the 2009–10 financial year, there were 14 exchanges where racks were capped, nine exchanges that were potentially racks capped and no exchanges where the racks and the main distribution frame (MDF) were capped. At the end of June 2010, the report shows there were 18 exchanges that were racks capped, 17 exchanges that were potentially racks capped, and three exchanges where both racks and MDF were capped.

5.1.7 Tariff filing

Tariff filing refers to the provision of certain information about changes in prices. The ACCC’s tariff filing powers can be divided into two distinct parts:

- general telecommunications tariff filing (Part XIB, Division 4 of the TPA)
- Telstra-specific tariff filing (Part XIB, Division 5 of the TPA).

**Tariff filing directions**

Under Part XIB (Division 4) of the TPA, the ACCC may direct a carrier or CSP to provide information on charges for specified carriage services and/or ancillary goods and services, or information on its intentions regarding those goods or services. The ACCC may request this information if it is satisfied that the carrier or CSP has a substantial degree of market power in a telecommunications market.

During the 2009–10 period, the ACCC did not issue any tariff filing directions under this division.

**Tariff filing by Telstra**

Part XIB (Division 5) of the TPA requires Telstra to provide the ACCC with a written statement setting out any proposed pricing changes for a basic carriage service (BCS) seven days before the change occurs. A BCS allows for communication between two or more distinct places, supplied by fixed line or satellite-based facilities, but does not include the supply of customer equipment.

A strict interpretation of Division 5 would require Telstra to provide complete details of all offerings, both standard and individualised (non-standard), along with all variations. However, in order to reduce the administrative burden of this requirement on Telstra and the ACCC, both parties have agreed that relevant information would be provided only for those BCSs identified by the ACCC as assisting to detect potential anti-competitive behaviour.

Under the agreement:

- Telstra is to provide its standard form of agreement on a weekly basis, along with a list of all amendments (additions, variations, and withdrawals) that have taken place during that week.
- Telstra is to provide a monthly summary report of any non-standard form of agreement entered into for that calendar month.
• Telstra is to brief the ACCC if it has introduced, varied or withdrawn an offer for a BCS and considers that change to be significant.

• The ACCC may also request a briefing to obtain information about any amendments to Telstra’s standard form of agreement or about a non-standard form of agreement.

Exemptions exist for particular BCSs when:

• the likelihood of anti-competitive conduct is limited
• information is already available to the ACCC through the access regime
• information is otherwise available from the previous tariff filing agreement between Telstra and AUSTEL.

During the 2009–10 period, Telstra complied with the requirements to give the ACCC tariff-filing information.

5.1.8 Regulatory accounting framework

Accounting separation allows information relating to the retail and wholesale businesses of telecommunications services carriers to be obtained by the ACCC. This in turn assists the ACCC with investigations of anti-competitive conduct, arbitration of access disputes and the establishment of access prices. The RAF RKR were established to meet the objective of facilitating the accounting separation regime by targeting carriers who have vertically integrated operations and who can exercise market power.

The RAF RKR consists of 23 rules that detail the financial reporting requirements that apply to a carrier notified by the ACCC. The reporting carriers at this time are Telstra, Optus, VHA, Primus and AAPT.

The RAF RKR applies a vertical and horizontal accounting separation model that allows revenue and cost information for wholesale and retail services to be reported. The RAF RKR also requires notified carriers to report on service usage information, such as the number of local calls and the number of national long distance minutes.

The core financial reports required by the RAF RKR are:

• capital adjusted profit and loss statements
• capital employed statements
• fixed asset statements
• weighted average cost of capital (WACC) report
• service usage reports.

Only Telstra and Optus are required to prepare all the core financial reports. VHA, Primus and AAPT are required to prepare only profit and loss statements, fixed asset statements and service usage reports.

All reporting carriers are also required to prepare a Regulatory Accounting Procedures Manual that provides a detailed explanation of how the carrier will comply with the RAF RKR. In addition, reporting carriers are required to lodge the following reports with the ACCC:

• a report for the first-half of the financial year, which is to be provided within two weeks after the carrier lodges its half-yearly reports with the Australian Securities and Investment Commission (ASIC), and
• a report for the second-half of the financial year, and for the full year financial year. These need to be supplied within four weeks of the carriers’ lodgement of second-half and the full year reports with ASIC.
RAF RKR data has also been utilised by the ACCC in assessing undertakings and establishing indicative prices for regulated services. Most recently, the RAF RKR data has been used to determine cost and asset values as part of determining indicative prices under the Building Block Model framework.

5.1.9 Media content monitoring

The ACCC recognises that access to compelling content may be a critical factor in developing a viable business case in existing and emerging media markets. During 2009–10 the ACCC continued to monitor developments in relation to the acquisition of exclusive rights for compelling content in new media sectors, free-to-air and subscription television sectors. The ACCC will continue to monitor developments across all media sectors to ensure effective competition is not foreclosed by anti-competitive conduct.
6 Access to telecommunications network services

This chapter outlines how the ACCC regulated access to telecommunications networks during the reporting period, including the declaration of telecommunication services, the arbitration of access disputes and the development of pricing principles for particular services.

The Telecommunications Legislation Amendment (Competition and Consumer Safeguards) Act 2010 (CACS Act) implements considerable changes to the role of the ACCC under Part XIC of the Trade Practices Act 1974 (TPA), retitled the Competition and Consumer Act 2010 as of 1 January 2011. Some of these changes are outlined below. However, because this report covers 2009–10, the discussion in this chapter is primarily based on the regime that existed during the relevant financial year, prior to legislative changes.

Part XIC under the Trade Practices Act 1974

Part XIC of the TPA, the regime that existed during the reporting period, established the industry-specific access regime for the telecommunications industry. The primary objective of Part XIC of the TPA was to promote the long-term interests of end-users (LTIE), achieved by:

- promoting competition in telecommunication markets
- achieving any-to-any connectivity (ensuring communication between end-users, whether or not the end-users are connected to the same network
- encouraging the economically efficient use of, and investment in:
  - infrastructure by which listed services are supplied
  - any other infrastructure by which listed services are, or are likely to become, capable of being supplied.

The Part XIC access regime under the TPA applied to declared services only (declaration is the process of determining whether a service should be subject to access regulation). Services could only declared after the ACCC had conducted a public inquiry. The ACCC’s ability to declare a service is not changed under the new regime.

Once a service was declared, the access provider was subject to standard access obligations (SAOs) requiring that it provide the declared service, on request, to the access seeker in accordance with the SAOs set out in s.152AR of the TPA. Exemptions from SAOs were provided for under the TPA. There are also certain exemptions introduced by the CACS Act in relation to SAOs.

While under the TPA the terms and conditions of access were not specified, it did provide three ways in which they could be determined:

- by commercial negotiation between the access provider and access seeker
- through the ACCC setting the access terms and conditions in an arbitration determination—but only if commercial negotiation was unsuccessful and a dispute was notified to the ACCC
- by the access provider lodging an undertaking with the ACCC that would determine the terms and conditions of access, and the ACCC accepting that undertaking.
Under this regime, industry participants were encouraged to negotiate and settle their own disputes (the ‘negotiate/arbitrate’ model).

The following within this chapter refers to matters that took place prior to the introduction of the CACS Act, which, as discussed in detail at 2.4, introduced a number of changes to the access regime. The following should be considered within the context of the regime that existed under the TPA.

6.1 Public inquiries into the declaration of telecommunications services

Telecommunications services–declaration provisions: A guide to the declaration provisions of Part XIC of the Trade Practices Act explains the ACCC’s approach to declarations, including the matters that it must consider and how it will consider them. The guide also contains a section dealing with procedural issues, such as the public inquiry process.

The following is an outline of the public inquiries that the ACCC has conducted in the relevant period.

6.1.1 Fixed services review–declaration inquiry and variation inquiry for ULLS service description

On 15 July 2009, the ACCC issued a final decision for the fixed services review declaration inquiry and variation inquiry for the ULLS service description.160

The final decision was to extend the declarations for six fixed line services: the unconditioned local loop service (ULLS), line sharing service (LSS), public switched telephone network originating access (PSTN OA), public switched telephone network terminating access (PSTN TA), wholesale line rental (WLR) and local carriage service (LCS). The declarations were due to expire on 31 July 2009 but have now been extended to 31 July 2014.

The ACCC considered that extending the declarations would provide regulatory certainty regarding the access arrangements that apply to the fixed line services, particularly given ongoing developments in the industry such as the government’s NBN proposal.

The ACCC also decided not to vary the ULLS service description. The ACCC was not satisfied that varying the ULLS description at that time would promote the long-term interests of end-users (LTIE).161

6.1.2 Variation of the DTCS service description

In November 2009 the ACCC initiated a review of the domestic transmission capacity service (DTCS) description. The DTCS declaration covers all transmission routes (except those excluded by the ACCC due to the existence of effective competition) and is intended to cover all transmission interface protocols commonly used over the Australian transmission network.

On 30 September 2010 the ACCC released its final report announcing that the ACCC had decided to vary the DTCS service description to cover all commonly used network interfaces used on transmission


161 The variation inquiry commenced in May 2007 following a request to the ACCC. The inquiry was suspended in April 2008 and recommenced in November 2009.
networks in Australia, including Ethernet. Ethernet interface protocols are currently widely used in the Australian telecommunications network and are likely to be common in future roll-outs and upgrades. The variation to the DTCS declaration service description was published in the Gazette on 13 October 2010.

### 6.2 Exemptions from declarations

The SAOs require, among other things, an access provider to supply a declared service to an access seeker if requested, subject to certain exceptions. Under the now repealed section 152AT of the CCA, a carrier or CSP could apply to the ACCC for a written order exempting it from the SAOs that apply to a declared service.\^162\footnote{The CCA also enables an access provider (or potential access provider) to apply for an exemption from the SAOs before that service or potential service becomes an active declared service.}

The CACS Act has repealed certain exemption provisions of the CCA.\^163\footnote{Items 137 and 144 of the Telecommunications Legislation Amendment (Competition and Consumer Safeguards) Act 2010 (CACS Act).} As a result of these changes, ordinary individual exemptions and ordinary class exemptions from the SAOs for declared services are no longer available, which is consistent with the new regime whereby the ACCC is to set up-front price and non-price terms and conditions for declared services. Anticipatory exemptions are still available where a service has not yet been declared.

The ACCC received 12 exemption applications from Telstra in late 2007 (refer to sections 6.2.1–6.2.3). A number of the ACCC’s decisions were reviewed by the Australian Competition Tribunal (ACT) during 2008. In turn, the Full Federal Court reviewed the ACT decisions relating to WLR and LCS exemption applications and referred these back to the ACT for further consideration.

The final orders made by the ACCC and the ACT during the 2009–10 period are summarised in table 6.1.

**Table 6.1 Summary of exemption application outcomes during 2009–10**

<table>
<thead>
<tr>
<th>Exemption application(s)</th>
<th>Final result (ACCC or ACT decision)</th>
<th>Date exemption takes effect</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>WLR</strong></td>
<td>At the time of writing, a total of 181 ESAs have been exempted (subject to conditions and limitations). A class exemption of the same scope also applies to these ESAs.</td>
<td>December 2010*</td>
</tr>
<tr>
<td>Two exemption applications for 387 metropolitan ESAs</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>LCS</strong></td>
<td>At the time of writing, a total of 181 ESAs have been exempted (subject to conditions and limitations). A class exemption of the same scope also applies to these ESAs.</td>
<td>December 2010*</td>
</tr>
<tr>
<td>Two exemption applications for 387 metropolitan ESAs</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>PSTN OA</strong></td>
<td>Exemption granted for 17 CBD ESAs, and a class exemption of the same scope</td>
<td>October 2008</td>
</tr>
<tr>
<td>One exemption application for 17 CBD ESAs</td>
<td></td>
<td></td>
</tr>
<tr>
<td>One exemption application for 387 metropolitan ESAs</td>
<td>At the time of writing, a total of 181 ESAs have been exempted (subject to conditions and limitations). A class exemption of the same scope also applies to these ESAs.</td>
<td>December 2010*</td>
</tr>
<tr>
<td>One exemption application for 387 metropolitan ESAs</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note: *These exemptions will come into effect gradually after the specified date on an ESA-by-ESA basis only after all the conditions and limitations specified in the exemption orders for that specific ESA are satisfied.*
6.2.1 Telstra application for partial exemption from LCS and WLR regulations

In mid-2008, following Telstra’s application for exemption from SAOs relating to WLR and local carriage service (LCS) supply in 387 metropolitan ESAs, the ACCC granted exemptions in 248 ESAs, subject to a number of conditions and limitations.164

In September 2008, the ACCC’s decision to grant exemption was challenged by Chime in the Australian Competition Tribunal (ACT), which set aside the ACCC’s WLR and LCS exemption orders. Telstra commenced proceedings in early 2009 for judicial review of the ACT’s decision, and in March 2009 the Full Federal Court set aside the ACT’s decision and remitted Telstra’s exemption applications back to the ACT.

In May 2009, the ACT determined that exemption orders would be made, subject to several conditions and limitations, and, following consultation, the ACT finalised the exemption orders on 24 August 2009. Under the ACT’s orders, whether the exemption applies in a particular ESA will depend on a number of factors, including the number of Telstra’s competitors already using the ULLS in that ESA, their market share, and the total ULLS-based competitors’ spare capacity as a proportion of the aggregate number of WLR SIOs of those same competitors in that ESA.

The ACCC must calculate and publish on its website a list of those exempted ESAs and update that list twice a year. The first list was published on the ACCC’s website on 30 June 2010 (see section 6.2.3 below for further details).

The first round of exemption calculations was published on the ACCC’s website in June 2010 and came into effect from 30 December 2010 (see section 6.2.3 below for further details).

The ACCC also completed and published the second round of exemption calculations in December 2010, which will take effect from 30 June 2011.

6.2.2 Telstra application for partial exemption from PSTN OA access regulations

As detailed in the 2008–09 report, the ACCC received an application from Telstra in late 2007 seeking exemption from the SAOs in respect of its supply of the PSTN OA165 services in 17 ESAs located in CBD areas and 387 ESAs across metropolitan Australia (the same metropolitan ESAs as in the WLR and LCS exemption applications). The ACCC’s decision to grant exemptions in 17 CBD ESAs and 248 metropolitan ESAs (subject to conditions and limitations) were challenged in late 2008 by AAPT, Agile, Chime, Macquarie, PowerTel and Primus at the ACT (pursuant to section 152AV of the TPA).

In August 2009, the ACT issued its reasons to parties in the PSTN OA proceedings proposing to vary the PSTN OA metropolitan exemption to be on the same terms as the ACT’s WLR and LCS exemptions. The ACT also affirmed the ACCC’s PSTN OA CBD exemption order, except for a minor variation to the expiry date. After brief consultation on the conditions attached to the exemptions, the ACT issued supplementary reasons and finalised the PSTN OA exemptions on 9 September 2009. The CBD exemption came into effect on 29 October 2009.

164 The LCS is a wholesale local carriage service that allows access seekers to resell local calls to end-users. The WLR involves the provision of a basic line rental service that allows an end-user to connect to the PSTN.

165 The PSTN OA service allows access seekers to buy the carriage of telephone calls from a calling end-user to a point of interconnection with the access seeker’s network. The service allows telecommunications companies to provide services such as national long-distance calls, international calls and calls between fixed and mobile networks.
Similar to the ACT’s WLR and LCS exemption orders, various factors determine whether the ACT’s PSTN OA metropolitan exemption order will exempt a particular ESA. These factors include the number of Telstra’s competitors already using the ULLS in that ESA, their market share, and the total ULLS-based competitors’ spare capacity as a proportion of the aggregate number of WLR SIOs of those same competitors in that ESA. The ACCC will publish on its website the list of exempted ESAs and update that list twice a year.

The first round of exemptions for PSTN OA came into effect on 30 December 2010 and the second round of exemptions will take effect from 30 June 2011.

As for the WLR and LCS exemptions, the ACCC must publish on its website a list of the exempted ESAs and update that list twice a year.

6.2.3 Implementation of the ACT’s WLR, LCS and PSTN OA exemption orders

The ACT’s WLR, LCS and PSTN OA exemption orders set out a process for the ACCC to calculate which ESAs should be exempt.

The orders apply to a limited number of ESAs (380 in total) which are listed in the orders at Attachment A. The ACCC’s role is to calculate which of the ESAs satisfy the criteria set out in the orders to become an ‘Exemption ESA’.

The ACCC is required to collect the information specified in the orders from access seekers and Telstra on a biannual basis (at the end of March and September each year). The ACCC then uses that information to perform the required calculations every six months until 24 August 2014 for the WLR and LCS orders, and until 9 September 2014 for the PSTN OA order (or until the service declarations are revoked, whichever is earlier).

The ACCC must publish on its website a list of those ESAs which it calculates are Exemption ESAs. The list must be updated (if necessary) after each new round of calculations performed by the ACCC. However, once an ESA becomes an Exemption ESA, it remains exempt for the duration of the orders, even if in future rounds of calculations it fails to meet the criteria set out in the orders (for example, the ESA no longer contains three or more competitors).

The ACCC performed its first round of exemption calculations based on data collected from Telstra and access seekers current to the end of March 2010. From that data, the ACCC calculated that 129 ESAs met the criteria to become Exemption ESAs in relation to the WLR, LCS and PSTN OA services. The ACCC published the list of Exemption ESAs on its website before the publication date of 30 June 2010. The exemption in relation to those ESAs took effect in December 2010.

The ACCC completed and published the second round of exemption calculations in December 2010, where an additional 52 ESAs were exempted from the SAOs for the provision of the WLR, LCS and PSTN OA services. The exemptions in these 52 ESAs will take effect from 30 June 2011.
6.3 Access undertakings

Prior to the implementation of changes to the CCA, an access provider was able to give to the ACCC a written undertaking under which the provider undertook to comply with the terms and conditions specified in the undertaking in relation to the applicable SAOs (an ‘ordinary undertaking’).

The TPA also allowed for an access provider or potential access provider to submit a special access undertaking (SAU) for the same purpose, where the investment in a service had yet to be made or that service had not yet become an active declared service.

The ACCC was required under the TPA to accept or reject an undertaking, following consultation. If the undertaking was accepted and in operation, the ACCC was constrained by the undertaking when considering an access dispute. The ACCC could not make an access determination that was inconsistent with the undertaking, which provided some certainty to both access providers and access seekers.

- During the 2009–10 period, there were no access undertakings submitted.

Under the new regime, introduced by the CACS Act, ordinary access undertakings will no longer be available and only special access undertakings in respect of a service which has not yet been declared can be submitted to and accepted by the ACCC.

6.4 Access disputes

Prior to the commencement of the CACS Act, the now repealed Division 8 of Part XIC set out arbitration provisions. If parties could not agree on the terms of access to a declared service, either party could notify the ACCC of a dispute. The ACCC would then arbitrate the dispute and determine the terms and conditions of access between those two parties. This formed part of the ACCC’s previous role in regulating access in the telecommunications industry and no longer exists under the new CCA Act.

When the ACCC accepted a relevant access undertaking, the terms and conditions of the undertaking were applied in resolving the dispute. If there was no undertaking relevant to the dispute, the ACCC was in a position to determine the appropriate terms and conditions within the arbitration process.

Before a dispute was referred to the ACCC for arbitration:

- A declared service had to be supplied, or proposed to be supplied, by a carrier or CSP.
- One or more SAOs had to apply to the carrier or the CSP in relation to the declared service.
- An access seeker had been unable to agree with the carrier or CSP about the terms and conditions on which the carrier or CSP was to comply with those obligations.
- The CACS Act replaced the previous negotiate/arbitrate model with a model which enables the ACCC to set default price and non-price terms in access determinations (AD). An AD will only apply where there is no commercial agreement between the access seekers and access provider, and will create a benchmark that access seekers can fall back on while still allowing parties to negotiate different terms.
- The following sections outline the arbitrations during the 2009–10 period that were continued, received, finalised or withdrawn under the now repealed arbitration regime.
6.4.1 Arbitration of disputes over access to fixed line network services

Table 6.2 outlines the fixed line network access disputes that were arbitrated during the 2009–10 period.

Table 6.2  Fixed line network access disputes arbitrated 2009–10

<table>
<thead>
<tr>
<th>Service</th>
<th>1 July 2009</th>
<th>New disputes lodged</th>
<th>Disputes finalised</th>
<th>Disputes withdrawn</th>
<th>30 June 2010</th>
</tr>
</thead>
<tbody>
<tr>
<td>ULLS</td>
<td>18</td>
<td>0</td>
<td>11</td>
<td>4</td>
<td>3</td>
</tr>
<tr>
<td>LSS</td>
<td>10</td>
<td>2</td>
<td>8</td>
<td>4</td>
<td>0</td>
</tr>
<tr>
<td>DTCS</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>LCS</td>
<td>2</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>2</td>
</tr>
<tr>
<td>WLR</td>
<td>2</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>3</td>
</tr>
<tr>
<td>PSTN TA</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>PSTN OA</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Total</td>
<td>32</td>
<td>3</td>
<td>19</td>
<td>8</td>
<td>8</td>
</tr>
</tbody>
</table>

As shown in table 6.2, the ACCC was arbitrating 32 access disputes concerning fixed line services at the start of the reporting period. The ACCC was notified of a further three access disputes for arbitration during the reporting period, two of which related to the LSS and one related to the WLR.

A total of eight fixed line access disputes were withdrawn by parties during the year.

The scope of access terms raised for determination within these arbitrations included various price and non-price terms of access.

6.4.2 Arbitration of disputes over access to the MTAS

Table 6.3 outlines the mobile terminating access service (MTAS) disputes that were arbitrated during 2009–10.

Table 6.3  MTAS disputes arbitrated during 2009–10

<table>
<thead>
<tr>
<th>Service</th>
<th>At 1 July 2009</th>
<th>New disputes lodged during</th>
<th>Disputes finalised during</th>
<th>Disputes withdrawn</th>
<th>At 30 June 2010</th>
</tr>
</thead>
<tbody>
<tr>
<td>MTAS</td>
<td>6</td>
<td>2</td>
<td>0</td>
<td>4</td>
<td>4</td>
</tr>
</tbody>
</table>

As shown in table 6.3, the ACCC received two new access disputes in 2009–10 concerning the MTAS, in addition to the six disputes being arbitrated at the commencement of the period. Four disputes were withdrawn after the parties successfully reached a commercial agreement.
6.4.3 Interim outcomes

The ACCC is able to make an interim determination which sets access terms to apply during the arbitration process. An interim determination usually operates for 12 months or less, and may be extended for up to 12 months.

In 2009–10, the ACCC issued an interim determination in one WLR access dispute and extended interim determinations in three ULLS and one LSS access disputes.

At 30 June 2010, eight fixed line access disputes were under active consideration. These include three ULLS, two LCS and three WLR access disputes.

6.4.4 Final outcomes

During 2009–10, the ACCC issued 19 final determinations in finalising 19 fixed line access disputes, 11 in relation to the ULLS and eight in relation to the LSS.

Six additional final determinations were issued between July to December 2010 (that is, outside the reporting period), two each in relation to the ULLS, the WLR and the LCS. Also one dispute in relation to LCS was withdrawn in August 2010.

At the beginning of 2009–10 financial year, there were 14 final determinations subject to judicial reviews (under the Administrative Decisions (Judicial Review) Act 1977). The Federal Court dismissed all of these appeals on 17 July 2009.

During 2009–10, 12 access disputes in total were withdrawn. These related to the LSS (four), the ULLS (four) and MTAS (four).

6.4.5 Publications made

The ACCC may decide to publish an interim or final determination that it has made in an arbitration where it considers that doing so would be likely to facilitate the operation of Part XIC of the TPA. A statement of reasons for the determination may also be published.

Before publishing any materials, the ACCC must consider:

- any objections of the parties
- whether publication would be likely to promote competition in markets for listed carriage services
- whether publication would be likely to facilitate the operation of Part XIC
- any other matter that the ACCC considers relevant.

During the 2009–10 period, the ACCC published seven final determinations and statements of reasons in relation to disputes concerning the WLR, LCS, LSS and ULLS.

The ACCC’s website contains a list of all notified disputes and published arbitration outcomes.
6.5 Pricing principles and indicative pricing

Once a service is declared, the ACCC is required to develop and release pricing principles for that service in order to inform the relevant market of the ACCC’s likely decision in arbitrations. The ACCC is required to release the pricing principles as soon as practicable after a service is declared or varied.

The pricing principles may also contain price-related terms and conditions (indicative prices) relating to access to the declared service, which provides greater certainty to access seekers and promotes the timely resolution of access disputes without referral to the ACCC.

6.5.1 Access pricing review

In December 2009, the ACCC commenced a review of the 1997 Access Pricing Principles for six of the declared fixed line services. The ACCC released a discussion paper proposing the adoption of a building block approach to replace the total service long run incremental cost (TSLRIC)+ approach mainly used since 1997. Building block models (BBMs) are widely adopted by Australian regulators in other industries.

In September 2010, the ACCC released a draft report setting out its draft pricing principles and draft prices estimated from a new BBM. These pricing principles and prices were to apply from 1 January 2011. The ACCC received 15 submissions in response to the draft report.

On 21 December 2010, the ACCC suspended the review due to changes introduced under the CACS Act. The CACS Act reforms the telecommunications access regime under Part XIC of the CCA. A significant change to the regime is that an access determinations power replaces the arbitration of access disputes. Access determinations can specify price and non-price terms for access seekers not currently subject to an existing commercial agreement with Telstra. The power to make access pricing principles has been removed from Part XIC of the CCA by the new legislation.

At the time of suspending the review, the ACCC stated that it would issue Interim Access Determinations (IADs) in early 2011, which would cover price and non-price terms for the fixed line services, using the new powers conferred on it by the CACS Act.

6.5.2 DTCS pricing

On 30 April 2010 the ACCC published a discussion paper on a number of different approaches to pricing the DTCS. These approaches included forms of TSLRIC+ pricing, fully allocated cost pricing and domestic and international benchmarking. The ACCC released a report prepared by Frontier Economics on the Economics of Transmission Capacity Services at the same time.

The ACCC received seven submissions to the discussion paper, most of which favoured a pricing approach based on a mix of a regulated asset base and benchmarking prices (international and domestic sources).

166 These services are: ULLS, LSS, WLR, LCS and PSTN OTA.
167 The ACCC issued these IADs in March 2011.
6.6 Telecommunications access code

Under section 152BJ of the TPA, the ACCC was empowered to make a telecommunications access code; however, the ACCC did not consider that a code was required in 2009–10.
7 Activities under the Telecommunications Act

7.1 Operational separation of Telstra

A framework for the operational separation of Telstra was introduced on 1 January 2006 by Schedule 1, Part 8 of the Telecommunications Act 1997 (Telecommunications Act).

Operational separation is designed to address concerns that arise from Telstra’s ownership of the infrastructure which other telecommunications companies need to access and interconnect with to provide services to consumers. It seeks to promote greater equivalence and transparency in Telstra’s supply of certain designated wholesale services and to provide ongoing assurance that Telstra is not favouring its retail business units by implicitly supplying services to itself at prices that are unjustifiably lower or of higher quality than those offered to downstream competitors.

The role of the ACCC is to monitor and report on Telstra’s compliance with the OSP. If Telstra fails to comply with any aspect of the OSP, ministerial intervention is required before the ACCC can take direct action pursuant to the OSP framework to prevent discrimination continuing—by either amending the OSP or by enforcing the provisions of an existing OSP. Accordingly, the OSP can be seen as a ‘two strikes’ policy, given that the ACCC can only take enforcement action when a ‘rectification plan’ has been contravened and that a rectification plan will only exist where the Minister has first required Telstra to prepare such a plan and has accepted it.

In 2009–10, the ACCC continued to monitor implementation of the OSP, including the price equivalence framework which was established under it. This framework is used to test the revenue margin resulting from changes in wholesale and/or retail prices as a guide to identifying possible anti-competitive pricing conduct by Telstra. It is intended for this framework to provide competitors, and the public, with an assurance that Telstra’s pricing of services is fair. It is also intended to provide Telstra with increased certainty that its pricing decisions do not contravene the Trade Practices Act 1974 (TPA).

Structural reforms provided for in the Telecommunications Legislation Amendment (Competition and Consumer Safeguards) Act 2010 (CACS) will result in the repeal of the current operational separation regime following either the ACCC’s acceptance of a structural separation undertaking from Telstra or the introduction of a functional separation regime (discussed in chapter 2).

7.2 Number portability

Number portability allows end-users to change their service provider within specified number ranges (for example, the number range used to provide mobile services) and retain the same number.

Part 22, Division 2 of the Telecommunications Act requires the ACMA to develop a numbering plan outlining the allocation and use of numbers in connection with the supply of carriage services.
Under the Telecommunications Act, the ACCC has statutory powers to direct the ACMA on number portability. The ACMA cannot insert rules about number portability in the Telecommunications Numbering Plan 1997 unless directed to do so by the ACCC, and any rules the ACMA includes relating to number portability must be consistent with any directions by the ACCC.

The numbering plan is for the numbering of carriage services in Australia and the allocation and use of numbers in connection with the supply of such services.

In October 2009, the ACCC directed the ACMA to revoke its 2003 Direction on premium rate number portability. This followed the release, in August 2009, of a discussion paper seeking views on whether the ACCC should revoke the 2003 Direction or issue a new Direction to the ACMA to set out rules about number portability for premium rate services in the numbering plan.

The ACCC came to the view that the costs of mandating number portability for premium rate services in the numbering plan is likely to outweigh any benefits to end users. Revoking the 2003 Direction was therefore held to be in the LTIE.

In April 2010, following the release in March 2010 of the ACMA discussion paper Geographic numbering amendments, the ACMA formally consulted with the ACCC about two amendments to the numbering plan. Whilst not affecting the portability rules, the practical implication of one of the amendments is that customers who try to port their number to an alternative location to their actual physical location may not be able to find a CSP which is willing to accept the number. The effect of the change to the numbering plan is that consumers will be informed of this potential implication of choosing a number in an alternative location.

The ACCC wrote to the ACMA in May 2010 advising that the ACCC was supportive of the proposed amendments as they did not appear to raise any competition concerns. Additionally, the provision of a framework to govern the use of geographic numbers will provide additional protection for consumers by ensuring that potential customers are provided with written notice of the implications of having a geographic number that does not correspond with the physical location of the service.

### 7.3 Industry codes

During 2009–10, ACCC staff continued to observe and in some cases participate in a number of panels and working committees convened by the Communications Alliance, including the:

- Consumer Issues Reference Panel—responsible for overseeing and advising on consumer issues
- Network Reference Panel—responsible for overseeing and advising on network (i.e. public switched telephone network (PSTN), IP, mobile and broadband) related matters
- Operations Reference Panel—responsible for overseeing and advising on inter-operator issues.
- Staff continued to observe the various activities on developing guidelines for broadband networks, under the Communications Alliance “NBN Project”, including regularly participating in various industry discussions on those topics.

Further details of this work are available from the Communications Alliance website, www.commsalliance.com.au.
7.4 Access disputes under the Telecommunications Act

In addition to its role as an arbitrator of access disputes under Part XIC of the TPA, the ACCC arbitrates disputes under the Telecommunications Act. Disputes covered by the Telecommunications Act relate to matters such as:

- access to telecommunications transmission towers and underground facilities
- access to supplementary facilities (such as exchanges)
- provision of pre-selection and number portability.

During 2009–10 no new access disputes were lodged under the Telecommunications Act. The existing access dispute, brought to the ACCC by Pipe Networks Pty Ltd under the Telecommunications Act in June 2009, was withdrawn on 16 November 2010.

7.5 International rules of conduct

Division 3 of Part 20 of the Telecommunications Act sets out a mechanism for the government to deal with unacceptable conduct by international operators. An international telecommunications operator is considered to be engaging in unacceptable conduct if it:

- uses its market power in a manner that is, or is likely to be, contrary to the national interest
- uses any legal rights or legal status that is has as a result of foreign laws in a manner that is, or is likely to be, contrary to the national interest
- engages in any other conduct in a manner that is, or is likely to be, contrary to the national interest.

The Minister is empowered by Part 20 of the Telecommunications Act to make rules of conduct to prevent, mitigate or remedy any unacceptable conduct by an international telecommunications operator.

On 18 June 1997 the Minister introduced ‘Rules of conduct about dealings with international telecommunications operators,’ No. 1 of 1997, to take effect on 1 July 1997. The rules of conduct:

- authorise the ACCC to make determinations of a legislative nature imposing requirements, prohibitions or restrictions on carriers or CSPs
- authorise the ACCC to give directions to carriers or CSPs of an administrative nature that impose requirements, prohibitions or restrictions
- require carriers and CSPs to comply with ACCC determinations and administrative directions
- authorise the ACCC to make information available to the public, a specified class of persons or a specified person.

During 2009–10 the ACCC did not conduct any investigations into unacceptable conduct by an international carrier.
Activities under the Radiocommunications Act

The ACCC had some limited responsibilities under the Radiocommunications Act 1992 in 2009–10. This included monitoring compliance by digital radio multiplex operators with undertakings that determine the terms and conditions by which radio stations can obtain access to the digital radio multiplex service.
Appendix A: Types of voice services

Fixed voice services

The key feature of fixed voice is that it requires a dedicated line to a fixed location on a network. Telstra’s ubiquitous copper network is the most common platform over which fixed voice is provided. Optus also provides fixed voice services over its HFC network which passes 2.4 million premises in Sydney, Melbourne and Brisbane. While Telstra also owns a hybrid fibre coaxial (HFC) network passing 2.7 million premises, it does not operate fixed voice services over this infrastructure.

Fixed voice is also capable of being provided over a wireless local loop. A wireless local loop connects subscribers to the public switched telephone network (PSTN) using a radiofrequency signal as a substitute for the wire line for all, or part of, the distance between the exchange and the customer’s premises. Fixed wireless networks are more commonly associated with supplying broadband services rather than telephony.

Satellite and optical fibre are also alternative methods of supplying fixed voice services, although in Australia there has been limited deployment of these networks. In Australia Telstra’s fixed copper customer network remains the dominant method by which fixed voice services are supplied to end users.

Access option

There are two regulated access methods by which competitors can participate in the fixed voice service area. They are either by purchasing:

- the local carriage service (LCS) and wholesale line rental (WLR) from Telstra (or another wholesaling carrier) and on-selling to end users. To provide additional calling functions to consumers beyond local calls, such as domestic long distance, international and fixed-to-mobile, the access seeking competitor is likely to require access to at least Telstra’s regulated PSTN originating and terminating access (OTA), or
- access to Telstra’s unconditioned local loop service (ULLS), providing access to Telstra’s copper Customer Access Network (CAN) and then combining it with their own switching equipment.
- The first method is a pure resale business, while the second method involves some investment by the carrier in its own equipment to enable service provision.

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170 It is, of course, important to note that competitors can, and often do, purchase wholesale voice services from carriers other than Telstra. For more information see: ACCC, Telstra’s local carriage service and wholesale line rental exemption applications–final decision and class exemption, 2008.
Mobile voice

In Australia there are three competing carriers—Telstra, Optus and Vodafone & Hutchison Australia (VHA)—that supply mobile services and own mobile network infrastructure. Competitors can compete in the mobile service area by:

- investing in their own mobile network infrastructure
- becoming a mobile virtual network operator (MVNO), or
- reselling carrier services.

An MVNO differs from a reseller because, in addition to purchasing wholesale mobile capacity from a mobile network operator, it provides a technical support layer that replicates the mobile network operator’s mobile switching centre. This gives the MVNO more control over the services it provides to customers.

Voice over internet protocol (VoIP)

VoIP refers to the encoding of voice communication into internet protocol (IP) packets for transmission over data networks. Broadly speaking, there are three main types of VoIP services available to consumers. These are:

- Soft switching and the ULLS—in this case, the access seeker uses the normal voice band of the copper line to connect a plain old telephone service (POTS) phone to a multiple service access node (MSAN) that can terminate both DSL and voice-band traffic. The voice service is either handled by a soft switch in an IP network or sent via a voice gateway to a traditional voice switch (‘POTS emulation’).
- Internet access device (IAD) and the ULLS/line sharing service (LSS)—in this case, the end user connects a POTS phone to an IAD that converts the voice call to VoIP at the end user premises. The call is transferred to the exchange and the access seeker’s equipment over the broadband connection. The voice service can be handled by a soft switch in an IP network but will require a voice gateway to interconnect with the PSTN (‘carrier-grade VoIP’—e.g. a service provided by iiNet).
- VoIP and the ULLS/LSS—the access seeker provides a voice service through a full IP solution over the broadband connection, using either a VoIP handset or software on a computer to emulate a telephone. Again, the voice service can be handled by a soft switch in an IP network but will require a voice gateway to interconnect with the PSTN (‘application layer VoIP’—e.g. a service provided by Skype or engin).

The physical and technical characteristics of a carrier-grade VoIP product can be quite different to that of traditional PSTN voice. For example:

- The quality of service of VoIP can vary greatly between VoIP service providers and often VoIP has lower quality of service than PSTN voice services.171
- On the whole, VoIP services do not facilitate connection to emergency services numbers.
- VoIP services are not available during power outages.
- VoIP services require the customer to acquire a VoIP-specific phone at the customer end.

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171 Note that broadband providers that operate their own network can have some control over the transport of their VoIP traffic and therefore have some control over the quality of their service. See also: Australian Communications and Media Authority, The Australian VoIP market—the supply and take-up of VoIP in Australia, 2007, p. 19.
• To acquire VoIP services an end user must also acquire a broadband service (unlike traditional PSTN voice).
• VoIP can provide end users with greater functionality than PSTN voice through the additional features of the service—e.g. ‘simultaneous ring’ \(^{172}\), ‘sequential ring’ \(^{173}\) and ‘music on hold’. \(^{174}\)

\(^{172}\) This refers to being able to have multiple phones ring simultaneously when calls are received on one phone number. For example, calls to an end user’s desk phone could also ring their mobile phone, in case the end user was not at their desk. Source: iiNet, VoIP features, viewed 14 December 2007, http://www.iinet.net.au/products/voip/features.html#simultaneous_ring.

\(^{173}\) Being able to telephone up to three locations (in addition to the base location) in the sequence an end user supplies for a specified number of rings. Source: iiNet, VoIP features, viewed 14 December 2007, http://www.iinet.net.au/products/voip/features.html#simultaneous_ring.

Appendix B: Types of internet platforms

There are a range of technology platforms capable of supplying the internet to Australian households. Consumers in many parts of the country have the additional benefit of choosing between platforms when selecting their internet service provider. In other parts of the country, technical limitations and the absence of alternative platforms mean that some consumers have a more limited choice of technology when purchasing their internet service.

Dial-up

The first technology platform used to access the internet on a widespread basis was dial-up. Dial-up uses the voice band frequency to transmit internet data over the copper network. Shortcomings of dial-up include the inability for end users to use the one copper line for both fixed voice and internet services at the same time and its headline data download transmission rate of a theoretical maximum 56 kilobits per second (Kbps) is much slower than currently available broadband internet offerings.

The latest internet activity survey released by the ABS noted that, as of June 2010, dial-up connections share of total internet connections in Australia was 8 per cent, down from 13 per cent in the previous year. From June 2009 to June 2010, dial-up services declined by 27 per cent.

Broadband

Broadband enables subscribers to have faster, more efficient, connections to the internet. Broadband is a relative term: it refers to a variety of internet access speeds. However, a common feature of broadband internet—regardless of access technology—is that it offers faster theoretical maximum speeds than those offered by dial-up and can be used concurrently with a voice service. Given the technical limitations of many broadband technologies, it is possible that some end users—depending on their selected access technology—may not experience a faster service using a broadband connection than that offered by dial-up.

At the end of June 2010, there were 9.6 million active internet subscribers in Australia. About 92 per cent of those were non-dial-up connections with 71 per cent of access connections being for a speed of 1.5 Mbps or greater.

176 Australian Communications and Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, p. 23.
Digital subscriber line

Digital subscriber line (DSL), and, more particularly, asymmetric digital subscriber line (ADSL), is the most common form of broadband internet available in Australia. DSL, or ADSL, like dial-up, uses the copper network to provide an internet service. DSL operates at distinctly separate and much higher frequencies than voice services, and therefore operates independently of and simultaneously with the provision of voice services over the same copper pair.

The copper network over which DSL and dial-up internet is transmitted is owned by Telstra. One way a competitor internet service provider (ISP) can provide these services is by negotiating a commercial agreement with Telstra to resell its wholesale DSL offerings. Telstra has provided wholesale ADSL2+ services to other telecommunications providers since 2008.

An alternative to reselling Telstra’s wholesale internet offerings is for an ISP to purchase access to Telstra’s regulated unbundled services. An ISP can purchase regulated wholesale access to either Telstra’s unconditioned local loop service (ULLS) or line sharing service (LSS) to provide customers with DSL. Both these regulated services require access seekers to invest in additional infrastructure—generally digital subscriber line access multiplexers (DSLAMs)—to provide customers with DSL broadband. ULLS provides the ISP access to an unconditioned copper line over Telstra’s copper network which the ISP is able to interconnect with its own DSLAM equipment and/or fixed voice service equipment. LSS, on the other hand, provides the ISP with access to only the higher frequency part of the copper line to provision a DSL broadband service, while Telstra continues to provide (wholesale or retail) voice service over the same copper line.

According to the Australian Bureau of Statistics (ABS), DSL continued to be the dominant broadband service in Australia, accounting for 44 per cent of total broadband connections in 2009–10. The number of DSL connections increased by 2 per cent from June 2009 to June 2010. However, DSL share of total connections decreased by 6 per cent compared to 2008–09.

Hybrid fibre coaxial

HFC currently available in Australia can provide bandwidth of 30 Mbps and new technology, including DOCSIS 3.0—or data over cable service interface specification—and could potentially offer theoretical peak network speeds of up to 100 Mbps.

There are two major HFC networks in Australia, operated by Telstra and Optus, which provide a combined coverage of 4.1 million homes. Telstra and Optus offer pay television and broadband services on HFC, and Optus also offers a voice service. Telstra has recently completed the upgrades to its cable network in Melbourne covering approximately one million homes. Optus has announced that it is in the process of upgrading its network.

178 ADSL2+ extends the capability of basic ADSL by doubling the number of downstream bits.
180 The take-up of unbundled access lines (both ULLS and LSS) increased by 292 266 to 1 561 488 over the year to June 2010 and had further increased to 1.6 million by 30 September 2010. See Telstra CAN RKR, June 2010, available on the ACCC website.
181 Australian Communications and Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, p. 23.
182 ibid., p. 40.
Neighbourhood Cable, a subsidiary of Canberra-based TransACT Communications, uses its HFC network to provide broadband, pay television and voice in Ballarat, Geelong and Mildura. Neighbourhood Cable also announced that it is in the process of upgrading its network. TransACT also operates an HFC network in the Australian Capital Territory and Queanbeyan and, in total, offers services to over 90,000 households.¹⁸³

**Wireless broadband**

There are currently two platforms of wireless broadband available to Australian consumers. Fixed wireless, uses an air interface as an alternative to other access media (such as copper or fibre) to connect a broadband service. Mobile wireless connects broadband customers using WiMAX or HSPA networks.

Wireless technology is becoming a popular access technology in Australia. Mobile wireless (excluding mobile handset connections) internet access is the fastest growing method of internet access, increasing to 3.5 million connections in June 2010.¹⁸⁴ (This represents 71 per cent of the increase in the number of new wireless broadband subscribers from June 2009 to June 2010.) Mobile wireless broadband’s share of internet subscribers in Australia grew to 36 per cent in June 2010, from just over 24 per cent in June 2009.¹⁸⁵

The capabilities of wireless technologies depend in part on spectrum allocations. Spectrum is a technically complex subject with many considerations. However, there are some general factors that govern how spectrum can influence the signalling strength and capacity of a wireless service.

The allocated spectrum frequency determines the signal coverage capability of a service. In general, lower spectrum allocations increase the coverage of a service from base stations. Alternatively, services operating on higher spectrum have lower signal coverage. Higher spectrum frequencies are also more dependent on line-of-sight requirements and have greater difficulty passing through buildings than lower frequency spectrum.

Given these features of spectrum, currently available allocations of spectrum at lower frequencies are much scarcer than spectrum at higher frequencies—and spectrum itself is a scarce resource. While the bandwidth of a service is not dependent on a particular spectrum frequency, a sufficient allocation within a spectrum frequency range is necessary to supply high bandwidth to end users. Therefore, service providers (without allocated spectrum) seeking to provide a wireless service with wide coverage per base station and large bandwidth capacity for end users have the problem of scarce available bandwidth at lower spectrum frequencies.

Directional antennas are a means of ameliorating the coverage limitations of wireless signals. In general, a higher spectrum frequency requires a smaller directional antenna to strengthen a signal transmission. Therefore, services operating over higher spectrum, with the assistance of a directional antenna, may provide a fixed point-to-point data service—but offer less appropriate transmission for roaming mobile services.

¹⁸⁵ Australian Communications and Media Authority, Communications report 2009–10, ACMA, Melbourne 2010, pp. 26–27.
As of 30 June 2010, there were 164 companies providing fixed wireless broadband services in Australia.\footnote{186} Mobile wireless 3G networks are designed to provide both voice and data services to end users and differ from second generation GSM networks in their ability to provide higher bandwidth data services, allowing consumers to access a broader range of content and applications.

3G networks are reported to provide coverage to 99 per cent of the Australian population. During 2009–10, mobile carriers increased data rates of their 3G mobile networks and are expected to continue upgrades in the coming years.\footnote{187}

**Satellite broadband**

A satellite is a wireless receiver/transmitter that operates in orbit around the earth and acts as a microwave relay station, receiving signals sent from a ground-based station, amplifying them and retransmitting them on a different frequency to another ground-based station. Satellites can be used for high-speed transmission of computer data, even where the most basic utilities—such as in regional and remote locations—are lacking.

Satellite broadband services provide 100 per cent coverage of Australia’s land surface. In June 2010 there were about 35 satellite broadband service providers operating in Australia, with most being regional ISPs that resell satellite broadband to regional, rural and remote customers.\footnote{188}

Satellite service connections are expensive as they require end users (or government) to invest in a satellite dish to receive their internet service. The quality of a satellite is also affected by environmental factors—in particular, cloud coverage—that reduce the efficiency of the service. The technical limitations of the service also mean that user upload rates are much slower than those offered on other technological platforms.

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\footnote{186}{Australian Communications and Media Authority, *Communications report 2009–10*, ACMA, Melbourne 2010, p. 23.}

\footnote{187}{ibid., p. 39.}

\footnote{188}{ibid., pp. 23, 40.}
Appendix C: HHI calculations

When examining the state of competition in a market, regulators often look at a range of structural features such as the number of firms, their market shares, the service concentration levels and the barriers to entry and exit (such as high sunk costs traditionally associated with communications services).

The Herfindahl-Hirschman Index (HHI) is a metric used to measure the level of concentration in a market and to indicate the amounts of competition. The HHI is the sum of the squares of each firm’s market share in a particular market. For example, if there are three firms each possessing 30 per cent market share, the HHI is $30^2+30^2+30^2=2700$.

By weighing each firm’s market share by its own market share, the HHI effectively gives more weight to firms with larger market shares and less weight to firms with smaller market shares. The HHI ranges from 0 to 10 000 with 0 representing a perfectly competitive market and 10 000 representing monopoly. A decrease in the HHI indicates reduced levels of concentration and potentially more competition. On the other hand, an increase in the HHI (e.g. post-mergers) indicates heightened concentration and less competition.

As set out in section 7.14 of the Australian Competition and Consumer Commission’s (ACCC’s) Merger guideline 2008, when assessing market concentration in a proposed merger, the ACCC will take into account an industry segment’s HHI score as a preliminary indicator of the likelihood that the merger will raise competition concerns and therefore require more extensive analysis. Section 7.14 notes that the ACCC will generally be less likely to identify horizontal competition concerns where the post-merger HHI score is less than 2000.\footnote{Australian Competition and Consumer Commission, section 7.14, Merger guidelines, ACCC, Canberra, 2008.}

Figure C1 shows the concentration levels as measured by the HHI for retail fixed voice, fixed broadband and mobile services.

All four services scored consistently above 2000 between 2007–08 and 2009–10, raising preliminary concerns of lack of competition. During 2009–10, both mobile services and wireless broadband services saw their concentration levels increase slightly, which may be due to the merger between Vodafone and Hutchison. In contrast, fixed voice services and fixed broadband services experienced declines in the HHI over the same period. Fixed voice services, however, continued to score above 5000, indicating presence of very strong market power and limited competition in that sector.
Figure C1: Concentration levels by HHI for retail fixed voice, fixed broadband and mobile services 2007–08 to 2009–10

<table>
<thead>
<tr>
<th>Service Type</th>
<th>HHI 2007–08</th>
<th>HHI 2008–09</th>
<th>HHI 2009–10</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fixed voice services</td>
<td>5500</td>
<td>4500</td>
<td>4000</td>
</tr>
<tr>
<td>Mobile services</td>
<td>3000</td>
<td>2500</td>
<td>2000</td>
</tr>
<tr>
<td>Fixed broadband services</td>
<td>2000</td>
<td>1500</td>
<td>1000</td>
</tr>
<tr>
<td>Wireless broadband services</td>
<td>3500</td>
<td>3000</td>
<td>2500</td>
</tr>
</tbody>
</table>

2007–08 | 2008–09 | 2009–10
Changes in prices paid for telecommunications services in Australia, 2009–10

Report to the Minister for Broadband, Communications and the Digital Economy
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## Key results

### Average real prices for all telecommunications services decreased by 1.5 per cent in 2009–10.

- Average real prices continued to decrease in 2009–10:
  - Fixed-line services decreased by 38.0 per cent since 1997–98.
  - Mobile services decreased by 48.3 per cent since 1997–98.
  - Internet services decreased by 14.9 per cent since 2006–07.

### Average real prices for PSTN fixed-line services decreased by 5.8 per cent in 2009–10.

- Average real basic access prices decreased by 2.0 per cent in 2009–10:
  - Average real basic access prices have increased by 67.9 per cent since 1997–98.
- Average real prices for local calls decreased by 7.5 per cent in 2009–10, continuing a trend:
  - Average real local call prices have decreased by 61.4 per cent since 1997–98.
- Average real prices for national long-distance calls decreased by 9.0 per cent in 2009–10:
  - Average real national long-distance call prices have decreased by 58.8 per cent since 1997–98.
- Average real prices for international calls decreased by 13.8 per cent in 2009–10:
  - Average real international call prices have decreased by 77.2 per cent since 1997–98.
- Average real prices for fixed-to-mobile calls decreased by 9.7 per cent in 2009–10:
  - Average real fixed-to-mobile call prices have decreased by 52.9 per cent since 1997–98.

### Average real prices for mobile services increased by 1.8 per cent in 2009–10.

- Average real prices for global system for mobiles (GSM) services increased by 10.5 per cent in 2009–10:
  - Average real GSM service prices have decreased by 46.5 per cent since 1997–98.
- Average real prices for third-generation mobile (3G) services decreased by 3.6 per cent in 2009–10:
  - Average real 3G service prices have decreased by 11.1 per cent since 2006–07.

### Average real prices for internet services decreased by 4.9 per cent in 2009–10.

- Average real prices for dial-up services increased by 13.1 per cent in 2009–10.
- Average real prices for DSL broadband services decreased by 2.0 per cent in 2009–10.
- Average real prices for cable broadband services decreased by 1.1 per cent in 2009–10.
- Average real prices for wireless broadband services decreased by 14.7 per cent in 2009–10.
1 Summary

The average real price paid for telecommunications services decreased by 1.5 per cent in 2009−10, as a result of the following changes in the average real prices paid by consumers:

- fixed-line services (−5.8 per cent)
- mobile services (+1.8 per cent)
- internet services (−4.9 per cent).

All prices referred to in the report are ‘real prices’.\(^{190}\)

PSTN fixed line services

The average price for public switched telephone network (PSTN) services fell by 5.8 per cent in 2009−10. The price for each individual PSTN service also decreased over the same period.

Since 1997−98, the average PSTN price has fallen by 38.0 per cent, while the price for basic access has risen by 67.9 per cent over the same period. The lower average PSTN price was driven by the lower prices for all types of PSTN fixed-line calls, which more than offset the increases in the price of basic access.

Residential and business consumers of PSTN fixed-line services continued to experience decreases in average prices in 2009−10.

Table 1.1 Percentage changes in the PSTN services indexes by service and consumer group, 2009−10 and since base year*

<table>
<thead>
<tr>
<th>Service Type</th>
<th>Residential Base year</th>
<th>Business Base year</th>
<th>Overall Base year</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2009−10</td>
<td>2009−10</td>
<td>2009−10</td>
</tr>
<tr>
<td>Basic access</td>
<td>−1.8</td>
<td>−2.3</td>
<td>−2.0</td>
</tr>
<tr>
<td>Local calls</td>
<td>−8.1</td>
<td>−6.7</td>
<td>−7.5</td>
</tr>
<tr>
<td>National long-distance</td>
<td>−11.1</td>
<td>−5.6</td>
<td>−9.0</td>
</tr>
<tr>
<td>International</td>
<td>−16.4</td>
<td>−3.4</td>
<td>−13.8</td>
</tr>
<tr>
<td>Fixed-to-mobile</td>
<td>−11.4</td>
<td>−7.5</td>
<td>−9.7</td>
</tr>
<tr>
<td>Overall</td>
<td>−6.4</td>
<td>−4.7</td>
<td>−5.8</td>
</tr>
</tbody>
</table>

Note: *Base year is 1997−1998.

Mobile services

The average price for mobile services increased by 1.8 per cent in 2009−10, but has fallen by 48.3 per cent since 1997−98. While the consumers of third-generation mobile communications (3G) continued to experience decreases in prices in 2009−10, the global system for mobile communications (GSM) services consumers experienced an increase in price by 10.5 per cent.

\(^{190}\) This is done by adjusting nominal prices for the effects of inflation using the Australian Bureau of Statistics consumer price index.
Table 1.2  Percentage changes in the mobile services index by user group, 2009–10 and since base year*

<table>
<thead>
<tr>
<th><strong>Very low</strong></th>
<th>Low</th>
<th>Average</th>
<th>High</th>
<th>Very High</th>
<th>All</th>
</tr>
</thead>
<tbody>
<tr>
<td>GSM:</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>post-paid</td>
<td>−17.2</td>
<td>−70.3</td>
<td>3.4</td>
<td>−54.0</td>
<td>13.4</td>
</tr>
<tr>
<td>prepaid</td>
<td>−10.8</td>
<td>−72.4</td>
<td>17.8</td>
<td>−33.0</td>
<td>−2.4</td>
</tr>
<tr>
<td>All GSM</td>
<td>10.5</td>
<td>−46.5</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3G:</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>post-paid</td>
<td>9.3</td>
<td>2.1</td>
<td>−3.4</td>
<td>−6.1</td>
<td>−0.8</td>
</tr>
<tr>
<td>prepaid</td>
<td>4.3</td>
<td>−1.5</td>
<td>0.9</td>
<td>−5.6</td>
<td>−5.6</td>
</tr>
<tr>
<td>All 3G</td>
<td>−3.6</td>
<td>−11.1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Overall</td>
<td>1.8</td>
<td>−48.3</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note: * Base year for GSM post-paid is 1997–98; base year for GSM prepaid is 1998–99; base year for 3G is 2006–07.
** Very low user group: occasional consumers making 5–8 calls a week; low user group: occasional to regular consumers making 9–11 calls a week; average user group: regular to frequent consumers making 2–3 calls a day; high user group: frequent consumers who make 4–5 calls a day; very high user group: very frequent consumers who make 6–10 calls a day.

Prices for code division multiple access (CDMA) services were excluded from the mobile service index in 2008–09 due to service withdrawal.

Internet services

In 2009–10, the average real price of internet services fell by 4.9 per cent. All services with the exception of dial-up experienced declines in prices in 2009–10.

Wireless internet was first included in the internet services index in 2008–09.

Table 1.3  Percentage changes in the internet service index by service type, 2007–08 to 2009–10

<table>
<thead>
<tr>
<th></th>
<th>2007–08</th>
<th>2008–09</th>
<th>2009–10</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dial-up</td>
<td>−11.0</td>
<td>−13.8</td>
<td>13.1</td>
</tr>
<tr>
<td>DSL</td>
<td>−5.2</td>
<td>−0.4</td>
<td>−2.0</td>
</tr>
<tr>
<td>Cable</td>
<td>−5.9</td>
<td>0.5</td>
<td>−1.1</td>
</tr>
<tr>
<td>Wireless</td>
<td>n.a.</td>
<td>−18.5</td>
<td>−14.7</td>
</tr>
<tr>
<td>Overall</td>
<td>−6.2</td>
<td>−4.6</td>
<td>−4.9</td>
</tr>
</tbody>
</table>
Data in report

This report is prepared based on information collected from carriers using a combination of the current Division 12 Record Keeping Rule (RKR) and information informally requested from carriers by the Australian Competition and Consumer Commission (ACCC).
2 Purpose and structure of the report

2.1 Purpose of the report

The ACCC is required to report each year to the Minister for Broadband, Communications and the Digital Economy on prices paid by Australian consumers for telecommunications services.

This report provides an indication of how average prices paid by consumers for prevailing telecommunications services changed during 2009–10; both on an overall basis and for particular services and groups of consumers.

2.2 Structure of the report

Figure 2.1 shows the structure of the report and each component of the telecommunications services index used to derive the estimates for price changes.

Aggregate results across all of the reported services are presented in chapter 3. Public switched telephone network (PSTN) services, mobile services, and internet services are discussed in chapters 4, 5 and 6 respectively. Data tables are presented in chapter 7. The methodology used to determine price changes is discussed in chapter 8.

Note: All reported prices and price changes are in real terms.
Figure 2.1  Structure of the report and telecommunications index
3 Telecommunications services index

The telecommunications services index shows how average prices have changed for consumers over a certain period of time across public switched telephone network (PSTN) services, mobile services, and internet services.

A number of adjustments have been made over the years to the telecommunications services index including the introduction of an internet services index and the inclusion of third-generation mobile communications (3G) services in the mobile services index in 2007–08. As a result, any comparison of the telecommunications services index or movements in price indexes or sub-indexes between years needs to be qualified.

3.1 Main changes

The average prices for telecommunications services in Australia continued to decrease in 2009–10. This was due to declines in prices across PSTN fixed line services, and internet services, which more than offset increase in the price of mobile services.

Figure 3.1 PSTN services index and mobile services index, 1997–98 to 2009–10

![PSTN services index and mobile services index, 1997–98 to 2009–10](image)

Source: Data from Telstra, AAPT (except 2008–09, which was excluded from the index), Primus, Vodafone, Hutchison, Virgin Mobile (until 2006–07), Optus (except 2001–02 data, which was excluded from the index) and OneTel (until 2000–01).

Note: Base year is 1997–98.

Points contribution analysis indicates how much (in terms of percentage points) each service in the telecommunications services basket contributes to the movement in the overall index.

In 2009–10, PSTN services contributed the most to the overall decline in the telecommunications services index, which more than offset the increase in the mobile services index.
Figure 3.2: Points contribution of the PSTN and mobile services indexes to the all telecommunications index, 2009–10

Note: The sum of the components’ points contribution may not add up to the net index change due to rounding.
4 PSTN services index

The public switched telephone network (PSTN) services index measures price changes in PSTN fixed-line services across all consumer groups (business and residential). The PSTN business index is calculated from ‘small business’ and ‘other business’ indexes.

The ACCC derives the index by calculating the weighted average price change of each PSTN service in the study for business users and residential consumers. The price changes for each PSTN fixed-line service are then aggregated into a single PSTN services index.

4.1 Main changes

The average prices for PSTN fixed-line services decreased by 5.8 per cent in 2009–10. Since the base year of the index (i.e. 1997–98), the PSTN fixed-line index has declined by 38.0 per cent.

In 2009–10, consumers experienced lower prices for every type of PSTN services (i.e. basic access, local calls, national long-distance calls, international calls, and fixed-to-mobile calls).

Table 4.1 shows that, with the exception of basic access, prices for all PSTN service types have declined consistently since 1998–99.

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191 Some carriers may report revised figures (post-year adjustments) in the following reporting periods. These adjustments are not used to revise the indexes as they are typically quite small with insignificant impact on the indexes.
Table 4.1  Year-on-year percentage change in the PSTN service index by service type, 1998–99 to 2009–10

<table>
<thead>
<tr>
<th></th>
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<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Basic access</td>
<td>−0.8</td>
<td>9.8</td>
<td>15.2</td>
<td>13.2</td>
<td>12.4</td>
<td>6.9</td>
<td>5.1</td>
<td>−2.4</td>
<td>−1.4</td>
<td>−1.6</td>
<td>1.1</td>
<td>−2.0</td>
</tr>
<tr>
<td>Local calls</td>
<td>−0.5</td>
<td>−9.3</td>
<td>−17.9</td>
<td>−11.7</td>
<td>−3.8</td>
<td>−3.3</td>
<td>−7.9</td>
<td>−9.5</td>
<td>−6.7</td>
<td>−10.1</td>
<td>−2.5</td>
<td>−7.5</td>
</tr>
<tr>
<td>National long-distance</td>
<td>−6.4</td>
<td>−9.5</td>
<td>−6.3</td>
<td>−8.7</td>
<td>−4.7</td>
<td>−1.9</td>
<td>−3.0</td>
<td>−6.9</td>
<td>−10.9</td>
<td>−10.9</td>
<td>−6.7</td>
<td>−9.0</td>
</tr>
<tr>
<td>International</td>
<td>−20.7</td>
<td>−27.0</td>
<td>−17.2</td>
<td>−15.3</td>
<td>−5.8</td>
<td>−6.1</td>
<td>−4.1</td>
<td>−8.8</td>
<td>−4.8</td>
<td>−7.7</td>
<td>−3.9</td>
<td>−13.8</td>
</tr>
<tr>
<td>Fixed-to-mobile</td>
<td>−5.3</td>
<td>−7.9</td>
<td>−6.2</td>
<td>−3.2</td>
<td>−2.4</td>
<td>−2.2</td>
<td>−3.9</td>
<td>−10.5</td>
<td>−7.6</td>
<td>−6.4</td>
<td>−6.8</td>
<td>−9.7</td>
</tr>
<tr>
<td>PSTN services index</td>
<td>−5.0</td>
<td>−7.0</td>
<td>−5.8</td>
<td>−2.6</td>
<td>1.0</td>
<td>0.3</td>
<td>−1.3</td>
<td>−6.6</td>
<td>−5.4</td>
<td>−5.5</td>
<td>−2.6</td>
<td>−5.8</td>
</tr>
</tbody>
</table>

Source:  Data from Telstra, AAPT, Primus and Optus (except 2001–02 data, which was excluded from the index).

Figure 4.2 shows that the expenditure on basic access and fixed-to-mobile calls each as a proportion of total expenditure by consumers has increased significantly since 1997–98. In contrast, the shares of expenditure on local, national long-distance and international calls have all decreased.

Figure 4.2  Comparison of share of total consumer PSTN expenditure by service, 1997–98 and 2009–10

fixed-to-mobile and national long-distance calls made the greatest contribution to the decrease in the PSTN services index in 2009–10 (figure 4.3).
In 2009–10, the prices of PSTN services paid by business and residential consumers fell by 4.7 and 6.4 per cent respectively. The prices paid by business users have fallen every year since 1998–99. In contrast, residential consumers experienced price increases in 2002–03 and 2003–04, despite exhibiting an overall downward trend since 1998–99.

Table 4.2 Year-on-year percentage change in the PSTN service index by consumer group, 1998–99 to 2009–10

<table>
<thead>
<tr>
<th>Year</th>
<th>Residential</th>
<th>Business</th>
<th>PSTN services index</th>
</tr>
</thead>
<tbody>
<tr>
<td>1998–99</td>
<td>−4.7</td>
<td>−5.3</td>
<td>−5.0</td>
</tr>
<tr>
<td>1999–00</td>
<td>−7.4</td>
<td>−6.5</td>
<td>−7.0</td>
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<tr>
<td>2000–01</td>
<td>−3.5</td>
<td>−9.2</td>
<td>−5.8</td>
</tr>
<tr>
<td>2001–02</td>
<td>−2.2</td>
<td>−3.2</td>
<td>−2.6</td>
</tr>
<tr>
<td>2002–03</td>
<td>5.0</td>
<td>−8.8</td>
<td>0.3</td>
</tr>
<tr>
<td>2003–04</td>
<td>1.4</td>
<td>−1.6</td>
<td>−1.3</td>
</tr>
<tr>
<td>2004–05</td>
<td>−0.4</td>
<td>−2.9</td>
<td>−6.6</td>
</tr>
<tr>
<td>2005–06</td>
<td>−5.5</td>
<td>−8.6</td>
<td>−5.4</td>
</tr>
<tr>
<td>2006–07</td>
<td>−6.4</td>
<td>−5.5</td>
<td>−5.5</td>
</tr>
<tr>
<td>2007–08</td>
<td>−3.1</td>
<td>−4.0</td>
<td>−2.6</td>
</tr>
<tr>
<td>2008–09</td>
<td>−6.4</td>
<td>−1.7</td>
<td>−5.8</td>
</tr>
<tr>
<td>2009–10</td>
<td>−4.7</td>
<td>−4.7</td>
<td>−5.8</td>
</tr>
</tbody>
</table>

Source: Data from Telstra, Optus, AAPT and Primus.

4.2 PSTN residential index

The PSTN residential services index is derived from five PSTN services—basic access, local calls, national long-distance calls, international calls, and fixed-to-mobile calls.
4.2.1 Main changes

In 2009–10, the decrease in the average prices of PSTN residential services continued a downward trend in prices since 2004–05.

Figure 4.4 Index for PSTN services for residential consumers, 1997–98 to 2009–10

Source: Data from Telstra, AAPT, Primus, Optus (except 2001–02 data, which was excluded from the index) and One.Tel (until 2000–01).

Note: Base year is 1997–98.
4.2.2 Price changes by PSTN service for residential consumers

In 2009–10, the average prices paid by residential consumers for all PSTN services decreased, continuing a downward trend since 2004–05. The prices of international calls, fixed-to-mobile calls, national long-distance calls, and local calls decreased significantly compared with basic access.

Table 4.3 Year–on–year percentage change in the PSTN residential index, 1998–99 to 2009–10

<table>
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<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Basic access</td>
<td>−0.6</td>
<td>11.1</td>
<td>16.1</td>
<td>15.0</td>
<td>16.6</td>
<td>7.5</td>
<td>7.4</td>
<td>−1.5</td>
<td>−0.1</td>
<td>−1.0</td>
<td>−0.3</td>
<td>−1.8</td>
</tr>
<tr>
<td>Local calls</td>
<td>−1.0</td>
<td>−10.4</td>
<td>−16.4</td>
<td>−10.9</td>
<td>−1.2</td>
<td>−3.9</td>
<td>−11.2*</td>
<td>−9.0</td>
<td>−7.6</td>
<td>−10.1</td>
<td>−1.3</td>
<td>−8.1</td>
</tr>
<tr>
<td>National long-distance</td>
<td>−5.2</td>
<td>−10.3</td>
<td>−3.0</td>
<td>−8.5</td>
<td>−2.4</td>
<td>0.8</td>
<td>−1.7</td>
<td>−5.6</td>
<td>−13.0</td>
<td>−13.2</td>
<td>−6.7</td>
<td>−11.1</td>
</tr>
<tr>
<td>International</td>
<td>−19.8</td>
<td>−26.3</td>
<td>−14.6</td>
<td>−15.6</td>
<td>−3.5</td>
<td>−6.2</td>
<td>−3.4</td>
<td>−8.4</td>
<td>−5.3</td>
<td>−9.2</td>
<td>−3.7</td>
<td>−16.4</td>
</tr>
<tr>
<td>Fixed-to-mobile</td>
<td>−4.4</td>
<td>−8.2</td>
<td>−1.2</td>
<td>−4.8</td>
<td>5.0</td>
<td>0.1</td>
<td>−1.7</td>
<td>−9.3</td>
<td>−8.3</td>
<td>−10.9</td>
<td>−7.9</td>
<td>−11.4</td>
</tr>
<tr>
<td>PSTN residential</td>
<td>−4.7</td>
<td>−7.4</td>
<td>−3.5</td>
<td>−2.2</td>
<td>5.0</td>
<td>1.4</td>
<td>−0.4</td>
<td>−5.5</td>
<td>−5.4</td>
<td>−6.4</td>
<td>−3.1</td>
<td>−6.4</td>
</tr>
</tbody>
</table>

Source: Data from Telstra, AAPT, Primus and Optus (except 2001–02 data, which was excluded from the index).

Note: *The figure in the previous report has been revised.

In terms of overall trends, the prices for all types of residential services, except basic access, have had substantial declines since 2005–06. Basic access, in contrast, experienced moderate annual decreases of less than 2 per cent over the same period.

Figure 4.5 Year–on–year percentage changes in the price index by PSTN service for residential consumers, 2005–06 to 2009–10
4.3 **PSTN business index**

The index for PSTN business services is calculated from the ‘small business’ and ‘other business’ sub-indexes. Each sub-index is comprised of five PSTN services—basic access, local calls, national long-distance calls, international calls, and fixed-to-mobile calls.

### 4.3.1 Definition of business type

The definitions for ‘small business’ and ‘other business’ can vary across carriers. Certain types of consumers may be classed as ‘small business’ by one carrier, but treated as ‘other business’ by another carrier. In addition, some carriers may change the definitions they use over time, which may result in revenues and/or usage being shifted between consumer categories and between time periods. These factors make it difficult to compare prices between business types and across carriers, and year-on-year changes within business categories.

Given this, the ACCC considers that the aggregate PSTN business index is the most reliable indicator of price changes for business consumers as it includes revenue and usage data for all business consumers regardless of definition changes by carriers. However, the ACCC also considers that the ‘small business’ and ‘other business’ sub-indexes still provide useful information on price trends between business consumers of different sizes, and has continued to include information on these sub-indexes in this report.
4.3.2 Main changes

In 2009–10 the average prices paid by ‘other business’ and ‘small business’ consumers for PSTN services decreased, continuing an annual trend since 2005–06.

Average prices paid by ‘other business’ customers for PSTN services have decreased since 1997–98. By comparison, average prices paid by ‘small business’ customers for PSTN services increased between 2001–02 and 2004–05, and have decreased each year since then.

Figure 4.7 PSTN business services index for all business, by small and other businesses, 1997–98 to 2009–10

![PSTN business services index chart]

Source: Data from Telstra, AAPT, Primus, Optus (except 2001–02 data, which was excluded from the index) and One.Tel (until 2000–01).

Note: Base year is 1997–98.

In 2009–10, the average prices paid by business consumers decreased, as a result of decreases in the prices for all types of PSTN services, continuing a downward trend since 1998–99.
Table 4.4  Year-on-year percentage changes in the PSTN business index, 1998–99 to 2009–10

<table>
<thead>
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<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Basic access</td>
<td>−1.1</td>
<td>7.6</td>
<td>13.7</td>
<td>10.0</td>
<td>4.2</td>
<td>5.8</td>
<td>0.9</td>
<td>−4.2</td>
<td>−3.8</td>
<td>−2.8</td>
<td>3.8</td>
<td>−2.3</td>
</tr>
<tr>
<td>Local calls</td>
<td>0.5</td>
<td>−7.6</td>
<td>−20.2</td>
<td>−13.0</td>
<td>−9.2</td>
<td>−2.3</td>
<td>−0.6</td>
<td>−10.4</td>
<td>−5.2</td>
<td>−10.2</td>
<td>−4.4</td>
<td>−6.7</td>
</tr>
<tr>
<td>National long-distance</td>
<td>−8.3</td>
<td>−8.0</td>
<td>−11.7</td>
<td>−8.9</td>
<td>−8.6</td>
<td>−6.8</td>
<td>−5.6</td>
<td>−9.6</td>
<td>−6.9</td>
<td>−6.6</td>
<td>−6.6</td>
<td>−5.6</td>
</tr>
<tr>
<td>International</td>
<td>−22.6</td>
<td>−28.5</td>
<td>−25.2</td>
<td>−13.3</td>
<td>−14.3</td>
<td>−5.8</td>
<td>−7.6</td>
<td>−10.4</td>
<td>−2.9</td>
<td>−2.0</td>
<td>−4.7</td>
<td>−3.4</td>
</tr>
<tr>
<td>Fixed-to-mobile</td>
<td>−5.9</td>
<td>−7.6</td>
<td>−9.9</td>
<td>−1.8</td>
<td>−9.7</td>
<td>−4.7</td>
<td>−6.5</td>
<td>−12.0</td>
<td>−6.9</td>
<td>−2.3</td>
<td>−5.5</td>
<td>−7.5</td>
</tr>
<tr>
<td>PSTN business</td>
<td>−5.3</td>
<td>−6.5</td>
<td>−9.2</td>
<td>−3.2</td>
<td>−5.8</td>
<td>−1.6</td>
<td>−2.9</td>
<td>−8.6</td>
<td>−5.5</td>
<td>−4.0</td>
<td>−1.7</td>
<td>−4.7</td>
</tr>
</tbody>
</table>

Source: Data from Telstra, AAPT, Primus and Optus (except 2001−02 data, which was excluded from the index).

Business consumers have experienced annual decreases in prices for local calls, national long-distance calls, international calls, and fixed-to-mobile calls since 2005−06. By comparison, basic access exhibits no apparent trend in price.

Figure 4.8  Year-on-year percentage changes in the price index by PSTN service for business consumers, 2005−06 to 2009−10

Source: Data from Telstra, AAPT, Primus and Optus.

In 2009−10, fixed-to-mobile calls and basic access contributed the most to the overall decline in the PSTN business index (figure 4.9).

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Both ‘small business’ and ‘other business’ consumers experienced price declines by around 4.7 per cent in 2009–10, slightly greater than the decreases experienced in 2008–09.

Table 4.5  Year-on-year percentage change in the PSTN business index by business type, 1998–99 to 2009–10

<table>
<thead>
<tr>
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</tr>
</thead>
<tbody>
<tr>
<td>Small business</td>
<td>−2.1</td>
<td>−7.2</td>
<td>−8.7</td>
<td>2.4</td>
<td>1.1</td>
<td>3.1</td>
<td>15.9</td>
<td>−9.6</td>
<td>−3.6</td>
<td>−3.3</td>
<td>−1.5</td>
<td>−4.7</td>
</tr>
<tr>
<td>Other business</td>
<td>−6.3</td>
<td>−6.3</td>
<td>−9.4</td>
<td>−4.7</td>
<td>−8.6</td>
<td>−5.6</td>
<td>−18.2</td>
<td>−7.7</td>
<td>−8.8</td>
<td>−5.4</td>
<td>−1.9</td>
<td>−4.7</td>
</tr>
<tr>
<td>PSTN business index</td>
<td>−5.3</td>
<td>−6.5</td>
<td>−9.2</td>
<td>−3.2</td>
<td>−5.8</td>
<td>−1.6</td>
<td>−2.9</td>
<td>−8.6</td>
<td>−5.5</td>
<td>−4.0</td>
<td>−1.7</td>
<td>−4.7</td>
</tr>
</tbody>
</table>

Source: Data from Telstra, AAPT, Primus and Optus (except 2001–02 data, which was excluded from the index).

‘Small business’ PSTN services made the greatest contribution to the decrease in the PSTN services index in 2009–10 (figure 4.10).
4.4 Small business index

4.4.1 Main changes

The PSTN index for ‘small business’ services declined in 2009–10.
4.4.2 Price changes by PSTN service for small business consumers\textsuperscript{192}

The PSTN ‘small business’ index experienced a series of increases between 2001–02 and 2004–05, followed by annual declines.

Figure 4.11 Index for PSTN services for small business consumers, 1997–98 to 2009–10

Source: Data from Telstra, AAPT, Primus, Optus (except 2001–02 data, which was excluded from the index) and One.Tel (until 2000–01).

Note: Base year is 1997–98.

iiNet started to provide data on PSTN for 2008–09 and 2009–10 in its Division 12 record keeping rule (RKR) return for the 2009–10 period. These data have been taken into account in calculating this year’s PSTN index; therefore the figure for 2008–09 in the previous year’s report has been revised.

In 2009–10, the average prices paid by ‘small business’ consumers fell. The prices declined across all types of services except for international calls (table 4.6).

\textsuperscript{192} ‘Small business consumer’ means a business customer that is designated by a carrier or carriage service provider, for its internal reporting purposes, as a small business customer.
### Table 4.6  Year-on-year percentage change in the PSTN small business index by service type, 1998–99 to 2009–10

<table>
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</tr>
</thead>
<tbody>
<tr>
<td>Basic access</td>
<td>−5.3</td>
<td>11.5</td>
<td>8.5</td>
<td>16.2</td>
<td>7.5</td>
<td>7.7</td>
<td>14.5</td>
<td>−9.3</td>
<td>−4.3</td>
<td>−4.0</td>
<td>1.8</td>
<td>−3.5</td>
</tr>
<tr>
<td>Local calls</td>
<td>7.2</td>
<td>−8.3</td>
<td>−23.2</td>
<td>−3.0</td>
<td>−3.7</td>
<td>−3.0</td>
<td>17.8</td>
<td>−9.0</td>
<td>−2.6</td>
<td>−6.7</td>
<td>−2.4</td>
<td>−8.3</td>
</tr>
<tr>
<td>National long-distance</td>
<td>−1.8</td>
<td>−8.9</td>
<td>−3.4</td>
<td>−6.6</td>
<td>−6.8</td>
<td>5.3</td>
<td>10.3</td>
<td>−8.5</td>
<td>−2.3</td>
<td>−5.8</td>
<td>−6.6</td>
<td>−1.5</td>
</tr>
<tr>
<td>International</td>
<td>−9.3</td>
<td>−34.2</td>
<td>−33.5</td>
<td>−13.4</td>
<td>−7.3</td>
<td>−4.4</td>
<td>14.1</td>
<td>−8.0</td>
<td>−13.2</td>
<td>0.7</td>
<td>−7.7</td>
<td>7.7</td>
</tr>
<tr>
<td>Fixed-to-mobile</td>
<td>−7.6</td>
<td>−5.4</td>
<td>−8.6</td>
<td>−0.8</td>
<td>−4.3</td>
<td>1.4</td>
<td>19.9</td>
<td>−11.0</td>
<td>−3.3</td>
<td>−0.4</td>
<td>−3.9</td>
<td>−6.9</td>
</tr>
<tr>
<td>PSTN small business</td>
<td>−2.1</td>
<td>−7.2</td>
<td>−8.7</td>
<td>2.4</td>
<td>1.1</td>
<td>3.1</td>
<td>15.8</td>
<td>−9.6</td>
<td>−3.6</td>
<td>−3.3</td>
<td>−1.5</td>
<td>−4.7</td>
</tr>
</tbody>
</table>

Source: Data from Telstra, AAPT, Primus and Optus (except 2001–02 data, which was excluded from the index).

The downward trend in price is reasonably consistent across all PSTN service types for small business consumers since 2005–06, except that basic access increased in 2008–09, and prices for international calls increased in 2007–08 and 2009–10.

**Figure 4.12  Year-on-year percentage change in the price index by PSTN service for small business consumers, 2005–06 to 2009–10**

Source: Data from Telstra, AAPT, Primus and Optus.
4.5 Other business index

4.5.1 Main changes

In 2009–10, average prices paid by ‘other business’ customers\(^{193}\) for PSTN fixed-line services fell slightly, continuing a downward trend since 1997–98.

**Figure 4.13  Index of PSTN services for other business consumers, 1997–98 to 2009–10**

![Index of PSTN services for other business consumers](image)

Source: Data from Telstra, AAPT, Primus, Optus (except 2001–02 data, which was excluded from the index) and One.Tel (until 2000–01).

Notes: Base year is 1997–98.

---

\(^{193}\) Other business customer means a business customer that is not a small business customer and may include charities and not-for-profit organisations.
4.5.2 Price changes by PSTN service for other business consumers

In 2009–10, the prices paid by ‘other business’ consumers fell across all types of services except for basic access, which rose slightly.

Table 4.7 Year-on-year percentage changes in the PSTN other business index by service type, 1998–99 to 2009–10

<table>
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<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Basic access</td>
<td>0.5</td>
<td>6.2</td>
<td>15.4</td>
<td>7.9</td>
<td>0.6</td>
<td>3.7</td>
<td>−14.7</td>
<td>1.5</td>
<td>−2.6</td>
<td>0.3*</td>
<td>9.0</td>
<td>0.2</td>
</tr>
<tr>
<td>Local calls</td>
<td>−1.4</td>
<td>−7.3</td>
<td>−19.4</td>
<td>−15.4</td>
<td>−10.7</td>
<td>−1.6</td>
<td>−18.9</td>
<td>−11.1</td>
<td>−11.1</td>
<td>−19.0</td>
<td>−9.0</td>
<td>−3.2</td>
</tr>
<tr>
<td>National long-distance</td>
<td>−10.6</td>
<td>−7.7</td>
<td>−14.6</td>
<td>−9.5</td>
<td>−9.1</td>
<td>−14.8</td>
<td>−16.1</td>
<td>−10.3</td>
<td>−12.6</td>
<td>−7.8</td>
<td>−6.6</td>
<td>−10.4</td>
</tr>
<tr>
<td>International</td>
<td>−31.0</td>
<td>−24.9</td>
<td>−22.3</td>
<td>−13.4</td>
<td>−15.7</td>
<td>−6.8</td>
<td>−21.8</td>
<td>−12.0</td>
<td>9.9</td>
<td>−5.0</td>
<td>−2.3</td>
<td>−10.1</td>
</tr>
<tr>
<td>Fixed-to-mobile</td>
<td>−5.5</td>
<td>−8.1</td>
<td>−10.2</td>
<td>−2.0</td>
<td>−10.9</td>
<td>−8.5</td>
<td>−21.3</td>
<td>−12.6</td>
<td>−12.0</td>
<td>−5.2</td>
<td>−8.2</td>
<td>−8.5</td>
</tr>
<tr>
<td>PSTN other</td>
<td>−6.3</td>
<td>−6.3</td>
<td>−9.4</td>
<td>−4.7</td>
<td>−8.6</td>
<td>−5.6</td>
<td>−18.2</td>
<td>−7.7</td>
<td>−8.8</td>
<td>−5.4</td>
<td>−1.9</td>
<td>−4.7</td>
</tr>
</tbody>
</table>

Source: Data from Telstra, AAPT, Primus and Optus (except 2001–02 data, which was excluded from the index).

Note: *The figure in the previous report has been revised.

The prices of all types of calls exhibit similar downward trends since 2005–06 except for international calls, which experienced an increase in price in 2006–07.

Basic access on the other hand doesn’t show any clear patterns in its price movements, with a slight increase in 2005–06, followed by a moderate decline in 2006–07, and then increases in prices for the following three years.

Figure 4.14 Price changes for individual PSTN services for other business consumers, 2005–06 to 2009–10

Source: Data from Telstra, AAPT, Primus and Optus.
5  Mobile services index

The mobile services index indicates how average prices change for consumers of GSM, 3G and CDMA prepaid and post-paid mobile services. The index is calculated from sample prices for bundles of mobile services that represent the expenditure patterns of consumers with ‘very low’, ‘low’, ‘average’, ‘high’, and ‘very high’ expenditure on mobile services.

Sub-indexes are derived for post-paid and prepaid GSM and 3G services. The sub-indexes are weighted in the index using revenue weights for each of the mobile services.

CDMA services have not been included in the mobile services index since 2008−09 as these services have been withdrawn by the carriers.

5.1  Main changes

In 2009−10, average prices for all mobile services increased by 1.8 per cent. The last time prices recorded an increase was in 2002−03.

Prices for GSM services increased by 10.5 per cent while the prices for 3G services fell by 3.6 per cent. Post-paid GSM services posted a greater increase in price than prepaid GSM services. The post-paid 3G services, on the other hand, experienced a greater price decrease than prepaid 3G services.

194 GSM stands for global system for mobile communications; 3G stands for third-generation of telecommunications standards and technology for mobile networking; CDMA stands for code division multiple-access. All are digital cellular networks.

195 Very low user group: occasional consumers making 1−2 calls a week; low user group: occasional to regular consumers making 5−7 calls a week; average user group: regular to frequent consumers making 2 calls a day; high user group: frequent consumers who make 4−5 calls a day; very high user group: very frequent consumers who make 8−10 calls a day.
Table 5.1  Year-on-year percentage changes in price indexes for mobile services, 2000–01 to 2009–10

<table>
<thead>
<tr>
<th></th>
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<th></th>
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<th></th>
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</thead>
<tbody>
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<td>GSM:</td>
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<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>post-paid</td>
<td>−5.4</td>
<td>−0.9</td>
<td>2.2</td>
<td>−1.0</td>
<td>−15.3</td>
<td>−10.2</td>
<td>−6.9</td>
<td>−9.3</td>
<td>−7.4</td>
<td>14.7</td>
</tr>
<tr>
<td>prepaid</td>
<td>−13.7</td>
<td>−5.1</td>
<td>−0.9</td>
<td>−5.6</td>
<td>−5.6</td>
<td>−0.8</td>
<td>1.8</td>
<td>−2.8</td>
<td>−14.3</td>
<td>5.9</td>
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<tr>
<td>All GSM</td>
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<td>−2.0</td>
<td>1.1</td>
<td>−3.2</td>
<td>−12.9</td>
<td>−6.7</td>
<td>−3.1</td>
<td>−6.3</td>
<td>−10.8</td>
<td>10.5</td>
</tr>
<tr>
<td>CDMA:</td>
<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>post-paid</td>
<td>−2.0</td>
<td>−1.5</td>
<td>−14.2</td>
<td>−0.3</td>
<td>2.9</td>
<td>−3.5</td>
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<td>n.a.</td>
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<tr>
<td>prepaid</td>
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<td>−4.3</td>
<td>−12.4</td>
<td>2.7</td>
<td>2.1</td>
<td>−3.3</td>
<td>n.a.</td>
<td>n.a.</td>
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<td></td>
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<tr>
<td>All CDMA</td>
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<td>−2.2</td>
<td>−13.9</td>
<td>0.4</td>
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<td>n.a.</td>
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<tr>
<td>3G:</td>
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<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>prepaid</td>
<td>−7.3</td>
<td>−10.5</td>
<td>−0.3</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>All 3G</td>
<td>−3.7</td>
<td>−4.2</td>
<td>−3.6</td>
<td></td>
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<td></td>
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<tr>
<td>Overall</td>
<td>−6.8</td>
<td>−2.0</td>
<td>0.9</td>
<td>−3.2</td>
<td>−13.0</td>
<td>−6.5</td>
<td>−2.5</td>
<td>−5.4</td>
<td>−7.8</td>
<td>1.8</td>
</tr>
</tbody>
</table>

Source: Data from Telstra, Optus, Orange, Primus, Vodafone, Hutchison, Vodafone and Hutchison (VHA), AAPT and Virgin Mobile; and published mobile plans and service information.

Note: CDMA services were withdrawn in 2007–08.

Although prices increased slightly in 2009–10, they exhibited an overall downward trend since 2000–01. Average prices have declined by 48.3 per cent since 1997–98.

Figure 5.1  Overall mobile services index, 2000–01 to 2009–10
5.2 GSM services

Average prices paid for GSM services increased in 2009–10. This was the first time the price of GSM services has increased since 2002–03. GSM post-paid services posted a greater increase in price than GSM prepaid services.

Figure 5.2 GSM mobile services index, 2000–2001 to 2009–10

Source: Communication Research Unit (CRU) of the former Department of Communication, Information Technology and the Arts estimates to 2000–01; data from Telstra, Optus, Vodafone, AAPT, and Virgin Mobile; and published mobiles plan/service information.

Note: Indexes and price changes are calculated in real price terms.
5.2.1 Post-paid prices

Every customer expenditure group except for ‘very low’ users experienced price increases for post-paid GSM services in 2009–10. ‘High’ users experienced the greatest increase.

Figure 5.3 Year-on-year percentage change in the price index for GSM post-paid services by user group, 2005–06 to 2009–10

Source: Data from Telstra, Optus, Vodafone, AAPT, and Virgin Mobile; and published mobile plans and service information.

Note: Indexes and price changes are calculated in real price terms.
5.2.2 Prepaid prices

In 2009–10, the average prices of GSM prepaid services decreased for ‘very low’ and ‘average’ user groups while the prices increased for all other prepaid service user groups. The prices for ‘high’ and ‘low’ user groups increased the most in 2009–10.

Figure 5.4 Year-on-year percentage change in the price index for GSM prepaid services by user group, 2005–06 to 2009–10

![Bar chart showing percentage changes in the price index for GSM prepaid services by user group from 2005–06 to 2009–10.]

Source: Data from Telstra, Optus, Vodafone, AAPT, and Virgin Mobile; and published mobile plans and service information.

Note: Indexes and price changes are calculated in real price terms.

5.3 3G services

In 2009–10, the average price for 3G services decreased, with post-paid 3G customers experiencing a greater price decrease than prepaid 3G customers.

Table 5.2 Year-on-year percentage changes in price indexes for 3G services

<table>
<thead>
<tr>
<th></th>
<th>2007–08</th>
<th>2008–09</th>
<th>2009–10</th>
</tr>
</thead>
<tbody>
<tr>
<td>Post-paid</td>
<td>−3.5</td>
<td>−3.3</td>
<td>−3.8</td>
</tr>
<tr>
<td>Prepaid</td>
<td>−7.3</td>
<td>−10.5</td>
<td>−0.3</td>
</tr>
<tr>
<td>All 3G</td>
<td>−3.7</td>
<td>−4.2</td>
<td>−3.6</td>
</tr>
</tbody>
</table>

Source: Data from Telstra, Optus, Vodafone, Hutchison, VHA, and Virgin Mobile; and published mobile plans and service information.
5.3.1 Post-paid prices

In 2009–10, the price index of 3G post-paid services decreased. The ‘low’, ‘average’ and ‘very high’ user groups experienced price declines. In contrast, the ‘very low’ and ‘high’ user groups experienced price increases, with the ‘very low’ user group posting the greatest increase.

Figure 5.5 Year-on-year percentage changes in the price index for 3G post-paid services by user group, 2007–08 to 2009–10

Source: Data from Telstra, Optus, Vodafone, Hutchison, VHA, AAPT, Virgin Mobile; and published mobile plans and service information.

Note: Indexes and price changes are calculated in real price terms.
5.3.2 Prepaid prices

In 2009–10, the price index of 3G prepaid services also decreased. The ‘very low’, ‘low’ and ‘high’ user groups experienced price increases. In contrast, the ‘average’ and ‘very high’ user groups saw their prices fall with the ‘average’ user group posting the greatest price decline.

Figure 5.6 Year-on-year percentage changes in the price index for 3G pre-paid services by user group, 2007–08 to 2009–10

![Graph showing percentage changes in price index for 3G pre-paid services by user group.]

Source: Data from Telstra, Optus, Vodafone, Hutchison, VHA, AAPT, Virgin Mobile; and published mobile plans and service information.

Note: Indexes/price changes are calculated in real price terms.

5.4 Points contribution

In 2009–10, while the prices for 3G services decreased, GSM prices increased by a greater margin, resulting in an increase in the overall mobile services index.

Figure 5.7 Points contribution by GSM and 3G indexes to the mobile services index 2009–10

![Graph showing points contribution by GSM and 3G indexes to the mobile services index.]

Note: The sum of the components’ points contribution may not add up to the net index change due to rounding.
5.5 Analysis of price changes for mobile services in 2009–10

A mobile service consumer requires a handset, connection and ongoing access to a mobile network in order to make a call. These service/product components are typically bundled together and sold through a wide range of pricing plans[196], allowing cross-subsidisation among these individual components. It is therefore difficult to analyse changes in mobile service prices by only examining the prices of one component; for example, charges per minute.

However, once a price trend has been established, it is useful to analyse pricing plans available to consumers to identify those factors that may have contributed to this price change. The following trends in mobile plans have been observed over the recent years:

- While there were some simplified call plans, carriers in general offered a range of call plans with complex discounts, handset charges, credits and free call options.
- High quality handsets were being provided to consumers at low initial cost (e.g. zero up-front cost to consumers on post-paid contract plans).
- Minimum spend plans became common and were effectively the same as access plans—consumers must pay a minimum charge a month, with per-minute prices declining the higher the fixed minimum charge.
- The capped amount included in most post-paid and prepaid capped plans increased significantly, with more services (e.g. international voice calls) offered on certain plans by some carriers.
- Flagfalls[198] became a standard fixed component for most mobile users, contrasting with earlier years when some carriers did not have a flagfall or connection charge.
- Data usage allowances for both post-paid and prepaid capped plans for 3G services increased.

[196] While consumers are able to sign up to plans without handsets, the CRU approach prices plans with a handset as it is a basic component for using a mobile service.


[198] Flagfall is a fee applied at the start of a mobile voice call for the purpose of call connection, regardless of the length of the call.
6 Internet services index

The internet services index measures movements in the average prices for consumer-grade dial-up, fixed-line (digital subscriber line (DSL)), cable, and wireless internet services.

Wireless internet was added to the internet services index in 2008–09.

Consumer-grade services account for the majority of internet services. The DSL, cable and wireless internet sub-indexes are calculated by comparing prices for the bundle of services (initial connection, subscription and excess usage) observed at the beginning and end of each reporting period. The prices for cable, DSL and wireless services are estimated based upon published plan prices and representative usage profiles for consumers in each expenditure quintile.

The dial-up internet services index is derived based on the average monthly expenditure by consumer. Sub-indexes for each service type (dial-up, DSL, cable, and wireless) are then aggregated to derive an overall price index for internet services.

6.1 Main observations

The average price for internet services fell during 2009–10. This was a result of declines in the prices across all types of internet services, except dial-up. Wireless internet became increasingly competitive, offering lower prices and higher data downloads.

Table 6.1 Year-on-year percentage changes in price indexes for internet services

<table>
<thead>
<tr>
<th></th>
<th>2007–08</th>
<th>2008–09</th>
<th>2009–10</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dial-up</td>
<td>−11.0</td>
<td>−13.8</td>
<td>13.1</td>
</tr>
<tr>
<td>DSL</td>
<td>−5.2</td>
<td>−0.4</td>
<td>−2.0</td>
</tr>
<tr>
<td>Cable</td>
<td>−5.9</td>
<td>0.5</td>
<td>−1.1</td>
</tr>
<tr>
<td>Wireless</td>
<td>n.a</td>
<td>−18.5</td>
<td>−14.7</td>
</tr>
<tr>
<td>Overall</td>
<td>−6.2</td>
<td>−4.6</td>
<td>−4.9</td>
</tr>
</tbody>
</table>

Source: Data from Telstra, Optus, Primus, AAPT, and iiNet; and published plans and service information.

Note: Price changes are calculated in real price terms.
6.2 Points contribution

In 2009–10, wireless services made the largest contribution to the change in the internet services index.

Figure 6.1 Points contribution by dial-up, DSL and cable indexes to the internet services index 2009–10

<table>
<thead>
<tr>
<th>Service</th>
<th>Contribution</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dial-up</td>
<td>-4.0</td>
</tr>
<tr>
<td>Wireless</td>
<td>-4.0</td>
</tr>
<tr>
<td>Cable</td>
<td>-0.2</td>
</tr>
<tr>
<td>DSL</td>
<td>-1.1</td>
</tr>
<tr>
<td>All Internet</td>
<td>-4.9</td>
</tr>
</tbody>
</table>

Note: The sum of the components’ points contribution may not add up to the net index change due to rounding.

6.3 DSL internet services

There was little change in nominal DSL plan prices during 2009–10 for most service providers. Telstra (BigPond), the main supplier of DSL services, maintained prices on most of its existing plans.

iiNet varied a number of its plans, with its ‘high’ and ‘very high’ user plans having higher prices. The price for its ‘very low’ user plan was lower. However, all three plans offered higher download limits compared to 2008–09.

Some other service providers also offered higher data download and/or faster connection speed in 2009–10.

Major trends observed in 2009–10 are:

- Bundled services (e.g. ADSL with free VoIP services) were being offered to attract customers.
- Download quotas continued to increase, and ‘unmetered’ content was introduced whereby certain content (typically video) could be accessed outside of the consumer’s download quota. Some service providers simplified quotas, moving away from separate peak and off-peak quotas.
- Plans with higher headline speeds (such as ADSL2+ plans) became more popular with speed throttling for excess usage becoming a common feature for most plans except entry-level plans.
- Some service providers also provided ‘naked DSL’ plans, which were priced at a premium as they did not require PSTN voice services in order to provide DSL internet services.
6.4 Cable internet services

There was little movement in nominal cable internet plan prices in 2009–10. Telstra (BigPond) largely maintained prices on its existing plans. Optus increased the price on its entry-level plan. However, Optus’s entry-to-medium level plans all offered significantly higher data quotas.

Telstra and Optus continued to upgrade their cable networks to support higher headline speeds. Although prices for cable and DSL internet services are now broadly similar, headline speeds of cable services tend to exceed those for the most comparable DSL internet plans.

Cable internet plans are available regardless of whether the consumer acquires a PSTN voice service. In general, across broadband internet services, prices are higher for unbundled plans than plans that bundle internet and PSTN voice services together.

6.5 Dial-up internet services

Average prices paid for dial-up internet services increased in 2009–10. This was due to the fact that although the reported revenues by most companies decreased, the number of services in operations did not decrease to the same extent.

6.6 Wireless internet services

For the purpose of this report, wireless internet services are those that permit internet connectivity to a laptop or other computers over a wireless access network (typically a 3G network). They are distinguished from 3G services by using customer equipment (universal series bus (USB) modem key or wireless card) independent of a mobile phone handset; by being supplied independent of a mobile voice service; and by having plan terms more aligned with those prevailing for other (fixed) broadband internet services.

In 2009–10, Optus lowered the prices on its entry to medium level plans. Vodafone Hutchison Australia (VHA) also lowered its prices on some of its plans. Other providers largely kept their plans unchanged. In terms of price, wireless internet plans became more aligned with those fixed broadband plans that offer comparable features in terms of connection speed and download limit.  

Observable differences remained between plans for wireless internet and fixed broadband services. Comparable wireless internet plans were still not commonly available to heavier users (exceeding 10 gigabyte (GB) data transfer). Excess usage fees were likely to apply (rather than speed throttling) to consumers on a wireless internet plan who exceed their download quotas.

199 Source: brochures collected from reporting companies and information downloaded from company websites in June 2010 and June 2009.
### Table 7.1  Telecommunications services index, 1997–98 to 2009–10

<table>
<thead>
<tr>
<th>Year</th>
<th>PSTN services</th>
<th>Mobile services</th>
<th>Internet services</th>
<th>All services (old series)</th>
<th>All services (new series)</th>
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<tbody>
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<td>1997−98</td>
<td>100.0</td>
<td>100.0</td>
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<tr>
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<td>95.0</td>
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<tr>
<td>1999−00</td>
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<td>2001−02</td>
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<td>79.1</td>
<td>81.9</td>
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<tr>
<td>2002−03</td>
<td>81.9</td>
<td>75.9</td>
<td>79.9</td>
<td>82.1</td>
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<td>2009–10</td>
<td>62.0</td>
<td>51.8</td>
<td>−</td>
<td>−</td>
<td>−</td>
</tr>
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</table>

Source: Data from Telstra, SingTel Optus, AAPT, Primus, Vodafone, Hutchison, Vodafone Hutchison Australia (VHA), and Virgin Mobile; pricing plans and other published information.

Note: Base year for old series is 1997–98.

*Includes internet services.

### Table 7.2  PSTN services index by service, residential and business, 1997–98 to 2009–10

<table>
<thead>
<tr>
<th>Year</th>
<th>All PSTN</th>
<th>Basic access</th>
<th>Local calls</th>
<th>National long-distance</th>
<th>International</th>
<th>Fixed-to-mobile</th>
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<tbody>
<tr>
<td>1997−98</td>
<td>100.0</td>
<td>100.0</td>
<td>100.0</td>
<td>100.0</td>
<td>100.0</td>
<td>100.0</td>
</tr>
<tr>
<td>1998−99</td>
<td>95.0</td>
<td>99.2</td>
<td>99.5</td>
<td>93.6</td>
<td>79.3</td>
<td>94.7</td>
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<tr>
<td>1999−00</td>
<td>88.4</td>
<td>108.9</td>
<td>90.3</td>
<td>84.7</td>
<td>57.9</td>
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<td>2000−01</td>
<td>83.2</td>
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<td>74.1</td>
<td>79.4</td>
<td>48.0</td>
<td>81.9</td>
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<td>2001−02</td>
<td>81.0</td>
<td>142.0</td>
<td>65.4</td>
<td>72.5</td>
<td>40.7</td>
<td>81.9</td>
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<tr>
<td>2002−03</td>
<td>81.9</td>
<td>159.6</td>
<td>62.9</td>
<td>69.1</td>
<td>38.3</td>
<td>79.2</td>
</tr>
<tr>
<td>2003−04</td>
<td>82.1</td>
<td>170.5</td>
<td>60.8</td>
<td>67.8</td>
<td>36.1</td>
<td>77.3</td>
</tr>
<tr>
<td>2004−05</td>
<td>81.1</td>
<td>179.4</td>
<td>56.1</td>
<td>65.7</td>
<td>34.5</td>
<td>75.6</td>
</tr>
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<td>2005−06</td>
<td>75.8</td>
<td>175.2</td>
<td>50.7</td>
<td>61.2</td>
<td>31.5</td>
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<td>2006−07</td>
<td>71.6</td>
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<td>47.3</td>
<td>54.5</td>
<td>29.9</td>
<td>65.0</td>
</tr>
<tr>
<td>2007−08</td>
<td>67.7</td>
<td>170.0</td>
<td>42.5</td>
<td>48.6</td>
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Source: Data from Telstra, SingTel Optus, AAPT, Primus, Vodafone, Hutchison, Vodafone Hutchison Australia (VHA), and Virgin Mobile; pricing plans and other published information.

Note: Base year for old series is 1997–98.

*Includes internet services.
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Source: Data from Telstra, SingTel Optus, AAPT, and Primus; pricing plans and other published information.

Note: Base year is 1997–98.

Table 7.3 PSTN business services index, small and other business, 1997–98 to 2009–10

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Source: Data from Telstra, SingTel Optus, AAPT, and Primus; pricing plans and other published information.

Note: Base year is 1997–98. Some figures may differ from the previous year’s report due to the inclusion of iiNet, which started providing PSTN data recently.
Table 7.4  Mobile services index, 1997–98 to 2009–10

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Source: Data from Telstra, SingTel Optus, AAPT, Hutchison Telecommunications, Vodafone, Hutchison, VHA, and Virgin Mobile; pricing plans and other published information.

Table 7.5  Mobile services index by network type and user group, 1997–98 to 2009–10

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Source: Data from Telstra, SingTel Optus, AAPT, Vodafone, Hutchison Telecommunications, VHA, and Virgin Mobile; pricing plans and other published information.
### Table 7.6  Internet services index by network type and user group, 2006–07 to 2009–10

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Source: Data from Telstra, SingTel Optus, AAPT, Primus, Vodafone, Hutchison Telecommunications, VHA, and Virgin Mobile; pricing plans and other published information.

### Table 7.7  Points contribution to telecommunications services index, 2000–01 to 2009–10

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All telecommunications services: −6.1 −2.5 1.0 −1.1 −6.6 −6.5 −4.0 −5.5 −6.1 −1.5

Source: Data from Telstra, SingTel Optus, AAPT, Primus, Vodafone, Hutchison Telecommunications, VHA, and Virgin Mobile; pricing plans and other published information.

Notes: The sum of the components’ points contribution may not add up to the net index change due to rounding.
### Table 7.8 Points contribution to PSTN services indexes by service, residential and business, 1998–99 to 2009–10

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<td>−2.4</td>
<td>−0.8</td>
<td>−1.6</td>
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<td>All business</td>
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<td>−5.5</td>
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</table>

Source: Data from Telstra, SingTel Optus, AAPT, and Primus; pricing plans and other published information.

Note: The sum of the components’ points contribution may not add up to the net index change due to rounding.
## Table 7.9  Points contribution to mobile services index, 2000–01 to 2009–10

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<td>-1.7</td>
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<td>n. a.</td>
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<td>-4.1</td>
<td>4.1</td>
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<td>All mobile</td>
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**GSM:**

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<td>-0.3</td>
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<td>-1.5</td>
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<tr>
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<td>1.1</td>
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<td>-2.7</td>
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**CDMA:**

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<td>-13.8</td>
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<td>-5.9</td>
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<td>n. a.</td>
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**3G:**

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<td>prepaid</td>
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<td>-9.2</td>
<td>0.1</td>
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</tbody>
</table>

### Source:
Data from Telstra, SingTel Optus, AAPT, Vodafone, Huchison Telecommunications, VHA, and Virgin Mobile; pricing plans and other published information.

### Note:
The sum of the components’ points contribution may not add up to the net index change due to rounding.

*The figures in the previous report have been revised.

## Table 7.10  Points contribution to internet services index, 2007–08 to 2009–10

<table>
<thead>
<tr>
<th></th>
<th>2007–08</th>
<th>2008–09</th>
<th>2009–10</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dial-up</td>
<td>-1.6</td>
<td>-1.4</td>
<td>0.4</td>
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<tr>
<td>DSL</td>
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<td>-0.2</td>
<td>-1.1</td>
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<tr>
<td>Cable</td>
<td>-1.2</td>
<td>0.1</td>
<td>-0.2</td>
</tr>
<tr>
<td>Wireless</td>
<td>n/a</td>
<td>-3.2</td>
<td>-4.0</td>
</tr>
<tr>
<td>All internet</td>
<td>-6.2</td>
<td>-4.6</td>
<td>-4.9</td>
</tr>
</tbody>
</table>
8 Methodology for determining price change

8.1 Index model

Since 1999–2000, a basket approach, which was developed by the Communications Research Unit (CRU) of the former Department of Communications, Information Technology and the Arts, has been used to measure the prices consumers pay for telecommunications services.

Index numbers are used to analyse movements in the prices paid for a ‘basket’ of telecommunications services. An index number measures the price of the services in one period relative to another. It reflects price changes over time, but not price levels. The advantages and disadvantages of the index approach and the method of constructing indexes are detailed in the report for 1999–2000.

The price indexes are constructed using revenue, quantity and pricing plan data collected by the ACCC from several telecommunications service providers. They are then aggregated to derive an overall index.

The ACCC uses a different methodology to derive the public switched telephone network (PSTN) services index and the dial-up internet services index from the one used for the mobile service index and broadband internet services index.

Changes to the constitution of the indexes and sub-indexes are made from time to time, which should be taken into account when comparing the indexes constructed in different time periods. The major changes include:

- The internet services index was included as a component of the telecommunications service index in 2007–08. In 2008–09 wireless internet services were first included in the internet services index.
- The methodology used to calculate the mobile services index has changed over time. In 2007–08, third-generation mobile communications (3G) services were included for the first time. In 2008–09, the code division multiple access (CDMA) services sub-index was discontinued when the service was withdrawn and its customers migrated to either 3G or global system for mobile communications (GSM) services.

Consistent with the obligation to report on prices paid for telecommunications services, this report represents changes in prices after deducting discounts and concessions offered to consumers.

8.1.1 The PSTN services index

Data on actual PSTN prices paid by consumers is not readily available without undertaking regular and expensive sampling. Tariff documents may not include information on discounts and short-term specials increasingly offered by carriers. In addition, many discount plans take effect only after a threshold value or certain number of calls has been reached. It is therefore extremely difficult to estimate the actual prices.

A full description of the construction of the index and the underlying theory is contained in appendix 1 of ACCC, Changes in the prices paid for telecommunications services in Australia 1999–2000.
paid by consumers for particular services.\textsuperscript{201} In order to capture the effects of discounts and specials on prices paid, carrier revenue and usage data are used to derive a yield as a proxy for price in the form of an estimate of the average price paid for a unit of a telecommunications service.

Participating carriers regularly provide separate revenue and usage estimates for five PSTN services—basic access, local calls, national long-distance calls, international long-distance calls and fixed-to-mobile calls. Each of these is further disaggregated into three consumer groups: residential, small business and other business consumers.

Using this data, a yield is derived for every PSTN service by consumer group for each year. These yields are then converted into real terms\textsuperscript{202} and used to construct a series of price indexes that show how prices paid for individual PSTN services by different consumer groups change over time. Individual carrier indexes for each PSTN service and consumer group category are then combined to derive indexes for PSTN services consumed by these three consumer groups. These three indexes are then aggregated to form an overall index for all PSTN services for all consumers.

As with all aggregated indexes, the expenditure share of a service determines its importance in the overall index. For a given change in price, the index is influenced most by those services on which consumers as a group spend the most money.

\subsection*{The mobile services index}

The mobile services index measures prices paid by consumers for mobile services provided on the GSM and 3G networks, which include both prepaid and post-paid (billed) services. In contrast to the PSTN index, yield data has not been used to construct the indexes for mobile services, reflecting the differences in the pricing structures of PSTN and mobile services.

To make a call on a mobile network, consumers require a mobile handset, connection and ongoing access to the network. Carriers and carriage service providers typically offer these services as part of a bundled package or plan. These plans include ongoing access to a carrier’s network, charges for calls and other services and, if required, connection and a handset. Increasingly, these are represented within a single plan offered to the consumer.

Mobile plans contain a high degree of cross-subsidisation. When carriers offer low up-front charges for handsets, these costs are recovered through higher charges for monthly access or outgoing calls. When choosing which plan to use, consumers can further trade-off higher access charges for lower call charges and are increasingly choosing an array of discount options to suit their calling preferences.

The mobile services index was constructed by using samples of 385 bills for each mobile carrier to construct average usage ‘bundles’ consumed by ‘very low’, ‘low’, ‘average’, ‘high’ and ‘very high’ spend customers.

\textsuperscript{201} The difficulty in obtaining data on prices paid meant that the standard or list prices were used to construct the weighted averages for each service reported in the first two Division 12 reports, but at a cost. Standard prices are the maximum consumers pay—they exclude all discounts and short-term specials.

\textsuperscript{202} In the index model, revenue and price data for PSTN services are expressed in 1999–2000 dollars, and in 2002–03 dollars for mobile services. The nominal values are adjusted by using the Australian Bureau of Statistics (ABS) consumer price index (CPI).
For this report, the usage bundles include additional services introduced in 2007–08:\(^{203}\)

- domestic voice calls (number and duration)
- international voice calls (number and duration)
- message retrieval calls (number and duration)
- text messages—SMS (number)
- data usage (megabytes)
- content services (number and dollar amount)
- handset charges (dollar amount)
- other charges (dollar amount).

The updating of the bundles in 2007–08 ensured that their prices and price changes reflect the structure of services purchased in the marketplace (noting that the previous bundles dated from 2000, which were last updated for the average quantities of the respective services in 2003).

Separate indexes are constructed to compare the cost of each bundle over time. These indexes—GSM, and 3G, post-paid and prepaid—are then aggregated using a revenue-weighting process to form an overall mobile service index. The mobile service index for 2007–08 included 3G services for the first time and in 2008–09 CDMA services ceased to form part of the index due to service withdrawal. As there have been changes in both the methodology and the type of services covered by the index, there is a break in the series.

### 8.1.3 Internet services index

The internet services index was introduced in 2007–08 and comprises sub-indexes for dial-up internet, DSL and cable broadband, and wireless internet services. Sub-indexes for consumer type are not included. Plans for residential consumer-grade services are monitored, as they represent the vast majority of internet services.

The DSL, cable and wireless internet indexes are calculated by comparing prices for the bundle of services (initial connection, subscription and excess usage) observed at the commencement and end of the period for service providers included in the study.

For each of the cable, DSL and wireless services, representative consumer profiles were developed for each service provider by expenditure quintile derived from bill samples. Average price changes for each consumer profile and service provider were then calculated, with price changes for service provider weighted by its revenue share to give the net price movement for that service type.

In contrast, price changes for dial-up internet services are estimated based upon a yield methodology. This reflects the very large number of pricing plans on offer for dial-up internet, and hence the difficulty of selecting the plans to monitor; as well as the declining importance of these services to the net internet service index.

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\(^{203}\) The data items that were collected for each service are listed in parenthesis.
8.2 Other methodology issues

8.2.1 Real prices
Price changes in the report are derived using ‘real’ prices, which are obtained by adjusting nominal prices for the effects of inflation using the ABS CPI.

8.2.2 The goods and services tax
The goods and services tax (GST) affects the prices paid by consumers of telephony services. This affects business and residential consumers differently. While business consumers can claim a GST input credit on telecommunications services, residential consumers cannot.

As a result, the estimated prices paid by business consumers for PSTN services are GST-exclusive while those paid by residential consumers include GST.\(^{204}\) The prices for mobile services and internet services are GST-inclusive, as information is not available to estimate the proportion of these services used exclusively or partly for business.

8.2.3 Quality of service
‘Quality’ means all non-price attributes of a product or service, including performance, reliability, and features of the product or service. The estimates in this report do not take into account the effect of quality changes on price and consumer usage of the services because of the difficulty in quantifying such changes.

The introduction of mobile phones with cameras and mobile internet is an example of how quality affects price. When these handsets were first introduced, they were more expensive than previous models but offered consumers more features.

If changes in quality are not taken into account when analysing price changes for telecommunications services, those estimated price changes will not fully reflect pure price changes—that is, price changes where quality remains unchanged. On the other hand, it is very difficult to make adjustments for quality changes without introducing other types of bias, which is why quality changes have not been factored into price change estimates. It is therefore necessary to acknowledge that there may be a bias in some of the results presented in this report.

8.2.4 Percentage changes and points contribution
The percentage changes used in this report are based on changes in the price indexes constructed for each of the services analysed. A complete set of index numbers for the telecommunications services covered is included in the tables in chapter 7. Percentage changes are useful when summarising and analysing price movements over time.

The points contribution of an index component is the number of points that a component contributes to the net change in an index in a particular year. For example, analysis might show that, of a 10 percentage

\(^{204}\) As the GST was not in operation in Australia before 1 July 2000, no services included a GST component in their prices before 2000–01.
point increase in the price index for a certain basket of services, four percentage points are due to an increase in the price of a given individual service. The points contribution for a component of a given index is calculated by multiplying the revenue share of a component in a basket by the value of the index in a particular year. Analysis of points contribution provides an insight into the underlying dynamics in the price of the basket and shows the effects of different price changes within the basket on the index.\textsuperscript{205}

\textbf{8.2.5 Record keeping rules for the Division 12 report}

In December 2004, after consulting with industry, the ACCC implemented a record keeping rule (RKR) for the Division 12 report. Under section 151BU of the \textit{Competition and Consumer Act 2010} (CCA) (formally known as the \textit{Trade Practices Act 1974}), the ACCC has the power to make an RKR by written instrument and require that carriers and carriage service providers comply with it. The rules may specify what records are kept, how reports are prepared and when these reports are provided to the ACCC. The ACCC cannot require the keeping of records unless they contain information relevant to its responsibilities. These responsibilities include the operation of Parts XIB and XIC of the TPA (now CCA). Under Part XIB, Division 12, section 151CM(1)(a), the ACCC is required to monitor and report each financial year on charges paid by consumers for telecommunications services.

Further information about the Division 12 RKR is available on the ACCC website at www.accc.gov.au.

During 2008–09, the ACCC reviewed the scope of the Division 12 RKR. This was to formalise the reporting requirements associated with the provision of data for 3G mobile services and internet services.

Due to the merger of Vodafone Pty Ltd and Hutchison Telecommunication Australia Limited to form Vodafone Hutchison Australia (VHA) in 2009, the Division 12 RKR was updated in 2010. VHA was given an exemption from providing GSM data, as they stated that they had no means of differentiating between GSM and 3G bills.

\textsuperscript{205} ACCC, \textit{Changes in the prices paid for telecommunications services in Australia 1999–2000}. 
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