# 9 Fire and ambulance services

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# **Attachment tables**

Attachment tables are identified in references throughout this chapter by a '9A' prefix (for example, table 9A.1). A full list of attachment tables is provided at the end of this chapter, and the attachment tables are available from the website at www.pc.gov.au/rogs/2016.

This chapter reports performance information for government services for fire events and emergency ambulance events. Information regarding the policy context, scope, profile, social and economic factors, and objectives of the emergency management sector (and related data) are included in the Emergency management sector overview (sector overview D).

Major improvements in reporting on fire and ambulance services in this edition include:

- two new measures under the 'firefighter workforce' output indicator firefighter workforce by age group and firefighter workforce attrition which provide information on fire service organisations' human resource preparedness for fire events
- a mini case study on managing emergency vehicle demand through the Queensland Government's Emergency Vehicle Priority System (EVP) program, resulting in improved ambulance priority one response times.

All abbreviations used in this Report are available in a complete list in volume A: Approach to performance reporting.

# 9.1 Profile of emergency services for fire events

A fire event is an incident that is reported to a fire service organisation and requires a response. Fire events include (but are not limited to):

- structure fires (that is, fires inside a building or structure), regardless of whether there is damage to the structure
- landscape fires, including bushfires and grass fires, regardless of the size of the area burn
- other fires, including vehicle and other mobile property fires, and outside rubbish fires.

# Roles and responsibilities

Fire service organisations are one of the primary agencies involved in providing emergency management services for fire events. The role of fire service organisations varies across jurisdictions but commonly includes prevention/mitigation, preparedness, response and recovery activities and services for each jurisdiction. Detailed activities by jurisdiction are available in table 9A.1.

Each jurisdiction operates multiple fire service agencies, which service different populations and geographic areas according to specified governance arrangements (table 9A.2). Separate urban and rural fire service agencies operate fire services in most jurisdictions. In addition, land management agencies provide fire services within designated areas (for example, in national or state parks). However, each jurisdiction allocates the fire service responsibilities of their agencies in different ways — for example, NSW separates fire services based on service function and geographic area, whereas Victoria separates fire services by geographic area only.

Fire service organisations work closely with other government departments and agencies that also have responsibilities in the case of fire events. These include ambulance service organisations, State/Territory Emergency Services, police services, and community services (Emergency management sector overview — attachment, table DA.1).

This chapter covers the finances and activities of urban and rural fire service agencies and, for selected tables and jurisdictions, the fire event finances and activities of land management agencies (tables 9A.2–3).

# Funding and revenue

Total revenue of the fire service organisations was \$3.5 billion in 2014-15 (table 9.1). Fluctuations for individual jurisdictions over time can result from funding related to specific major emergencies (see section 9.3). It should also be noted that jurisdictions may fund other fire event services (not provided by fire service organisations), for which data are currently not available.

Jurisdictions have a range of funding models to provide resourcing to fire service organisations. Total government grants and indirect government funding forms a substantial, but not the major, source of funds for fire service organisations. Fire levies are the primary source of funding in most jurisdictions. Governments provide the legislative framework for the imposition of fire levies, which are raised from levies on property owners or, in some jurisdictions, from levies on both insurance companies and property owners (table 9A.4). The ACT and the NT do not raise fire levies, relying on government grants as their largest revenue source.

Table 9.1 Real revenue of fire service organisations (2014-15 dollars) (\$ million) <sup>a</sup>									
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2010-11	1 017.3	1 063.5	519.9	420.3	176.6	68.9	52.5	31.3	3 350.4
2011-12	997.7	1 219.1	526.2	428.4	187.0	71.4	67.4	37.9	3 535.1
2012-13	1 046.2	1 183.3	520.1	374.2	184.0	86.0	63.1	50.4	3 507.3
2013-14	1 120.9	1 217.2	632.9	347.0	211.4	75.4	63.9	33.1	3 701.8
2014-15	1 019.0	1 138.6	622.1	365.2	212.1	73.9	68.2	38.7	3 537.7

a See table 9A.4 for detailed caveats.

Source: State and Territory governments (unpublished); table 9A.4.

# **Human resources**

Nationally in 2014-15, 18 853 full time equivalent (FTE) paid personnel were employed by fire service organisations. The majority (75.8 per cent) were paid firefighters.

A large number of volunteer firefighters (226 052 people) also participated in the delivery of services in 2014–15. The proportion of volunteer personnel and the nature of their role varied across jurisdictions (table 9A.5).

# Demand for fire service organisation services

Australian fire service organisations provide emergency response and rescue services for a range of domestic, industrial, medical, and transport fire and emergency events. Nationally,

This page has been changed since an earlier version of the Report. See errata at <a href="http://www.pc.gov.au/research/ongoing/report-on-government-services/2016/emergency-management#errata">http://www.pc.gov.au/research/ongoing/report-on-government-services/2016/emergency-management#errata</a>

fire service organisations attended a total of 385 118 emergency incidents in 2014-15, of which 97 545 were fire events (table 9A.13).

More information on the range of emergency events to which fire service organisations respond can be found in section 9.3.

# 9.2 Framework of performance indicators for fire events

The performance indicator framework for fire events is based on governments' common objectives for emergency services for fire events (box 9.1).

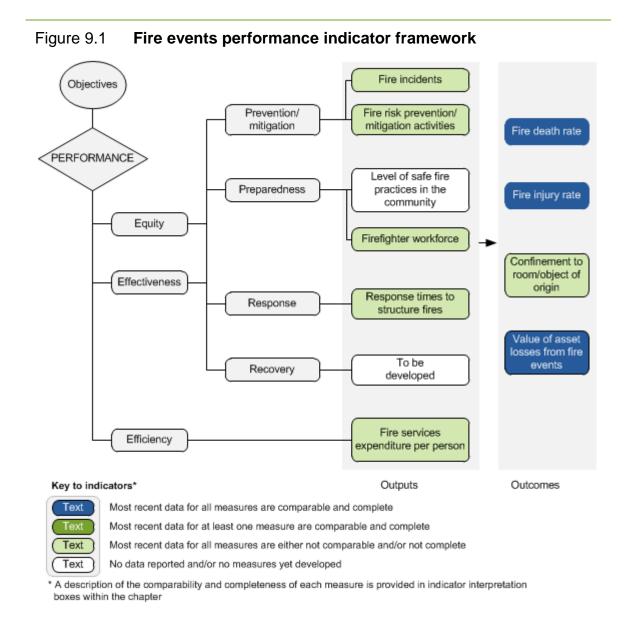
# Box 9.1 **Objectives for emergency services for fire events**

Emergency services for fire events aim to build fire resilient communities that work together to understand and manage the fire risks that they confront. Emergency management services provide highly effective, efficient and accessible services that:

- reduce the adverse effects of fire events on the community (including people, property, infrastructure, economy and environment)
- contribute to the management of fire risks to the community
- enhance public safety.

The performance indicator framework provides information on equity, efficiency and effectiveness, and distinguishes the outputs and outcomes of emergency services for fire events (figure 9.1). To reflect the activities of the emergency management sector, performance reporting in this chapter also uses the prevention/mitigation, preparedness, response and recovery framework (sector overview D). The performance indicator framework shows which data are complete and comparable in the 2016 Report. For data that are not considered directly comparable, text includes relevant caveats and supporting commentary. Chapter 1 discusses data comparability and data completeness from a Report-wide perspective (section 1.6).

In addition to selection 9.1, the Report's Statistical context chapter contains data that may assist in interpreting the performance indicators presented in this chapter. These data cover a range of demographic and geographic characteristics (chapter 2).



# 9.3 Key performance indicator results for fire events

Different delivery contexts, locations and types of clients can affect the equity, effectiveness and efficiency of fire services.

Data Quality Information (DQI) is included where available for performance indicators in this Report. The purpose of DQI is to provide structured and consistent information about quality aspects of data used to report on performance indicators, in addition to material in the chapter or sector overview and attachment tables. All DQI for the 2016 Report can be found at www.pc.gov.au/rogs/2016.

# **Outputs**

Outputs are the services delivered, while outcomes are the impact of these services on the status of an individual or group (see chapter 1, section 1.5). Output information is also critical for equitable, efficient and effective management of government services.

# **Equity and effectiveness**

Equity and effectiveness indicators are linked for fire events.

- the equity dimension relates to whether specific parts of the community with special needs or difficulties in accessing government services benefit from fire services' activities. This chapter currently provides data on services provided in remote locations, but not for other special needs groups
- the effectiveness dimension relates to the fire service organisations' ability to meet the objectives of prevention/mitigation, preparedness, response and recovery.

# Equity and effectiveness — prevention/mitigation

Prevention/mitigation indicators relate to fire service organisations' ability to prevent fires and mitigate fire damage.

# Prevention/mitigation — Fire incidents

'Fire incidents' is an indicator of governments' objective to manage the risk of fires by preventing/reducing the number of structure, landscape and other fires (box 9.2).

# Box 9.2 Fire incidents

'Fire incidents' is defined as the number of fire events that are reported to a fire service organisation that require a response, per 100 000 people in the population. Fire events cover structure fires, landscape fires and other fires.

As contextual information, data are also provided for false alarm events and non-fire events and false alarms events that fire service organisations attend.

A low or decreasing number of fire incidents per 100 000 people suggests a greater likelihood that the adverse effects of fire will be avoided or reduced.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

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Nationally in 2014-15, fire service organisations attended 413 fire incidents per 100 000 people, a decrease from 438 fire incidents per 100 000 people in 2013-14 (figure 9.2).

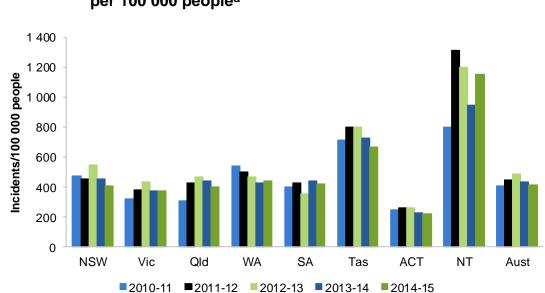


Figure 9.2 Fire incidents that fire service organisations attended, per 100 000 people<sup>a</sup>

Changes in the fire incident rate can be understood by analysing changes in the volume of structure fires, landscape fires and other fires.

- Structure fire incidents Nationally in 2014-15, there were 19 356 structure fires, a decrease from 2013-14 (with an associated change in rate from 84 to 82 per 100 000 people) (table 9A.14)
- Landscape fire incidents Nationally in 2014-15, 41 791 landscape fire incidents were reported by fire service and land management agencies, a decrease from 2013-14 (with an associated change in rate from 188 to 177 fires per 100 000 people, or 5.7 to 5.4 per 100 000 hectares) (table 9A.16)

Landscape fire incidents include all vegetation fires (such as bushfires or grassfires), irrespective of the size of the area burnt and can vary substantially in their impact on fire resources, the community and longer term consequences. The number and severity of landscape fires is influenced by many interrelated factors, including: environmental factors, such as weather, climate, and landscape conditions (fuel loads associated with growth and dryness of grasses and forests); and human factors, with the majority of

a See box 9.2 and table 9A.14 for detailed definitions, footnotes and caveats.
Source: State and Territory governments (unpublished); ABS (unpublished); table 9A.14

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http://www.pc.gov.au/research/ongoing/report-on-government-services/2016/emergency-management#errata

landscape fires triggered by human activity (AIC 2008). For the 2014-15 fire season, Australia generally experienced warmer conditions with near average rainfall conditions nationally (BoM 2015).

• Other fire incidents — Nationally in 2014-15, there were 36 398 other fires (such as vehicle fires or outside storage fires), a decrease from 2013-14 (with an associated change in rate from 166 to 154 per 100 000 people) (tables 9A.13–14).

# Fire incidents — false alarms

A significant proportion of calls for assistance across all jurisdictions are found upon investigation to be false alarms. Fire service organisations are required by legislation to respond to all calls and investigate the site prior to determining a false alarm. Nationally in 2014-15, of all incidents attended by fire service organisations, 30.8 per cent (116 636) were false alarms (system initiated or malicious false calls), with around 97 per cent of these false alarms system initiated (table 9A.13).

Contemporary fire alarm systems are an integral part of the built environment and have a significant role in the protection of life and property. However, attending unwanted false alarms has social and economic impacts, including:

- repeated unwanted alarms can foster a culture of complacency, adversely affecting community fire safety
- community costs arise from lost working time and alarm attendance charges

fire resources can be delayed responding to an actual emergency as a result of having to deal with unwanted fire alarms (AFAC 2012).

# Non-fire incidents

Fire service organisations provide services for a range of non-fire emergency events (figure 9.3). In 2014-15, attendance at other emergencies and incidents accounted for 43.7 per cent of total incidents (excluding false alarms) (table 9A.13).

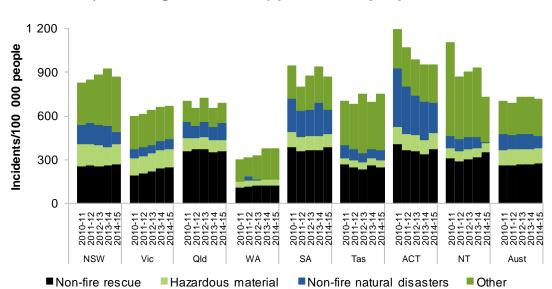


Figure 9.3 Non-fire incidents that fire service organisations attended (excluding false alarms) per 100 000 people<sup>a</sup>

Source: State and Territory governments (unpublished); ABS (unpublished); derived using data from table 9A.13 and chapter 2, table 2A.2.

Changes in the non-fire incident rate can be understood by analysing changes in non-fire rescue, hazardous conditions, natural disasters and other incidents:

- *Non-fire rescue* Fire service organisations attended 65 438 non-fire rescue incidents (table 9A.13), of which over one third (34.7 per cent) involved road crash rescue (table 9A.19). Fire service organisations generally work with State and Territory emergency service organisations as primary road crash rescue service providers, although governance arrangements differ across jurisdictions (Emergency management sector overview, table DA.1).
- *Hazardous materials incidents* Fire service organisations attended 25 280 incidents where materials that have hazardous properties must be controlled or contained in 2014-15 (table 9A.13). Of these, 4227 incidents (or 17.9 incidents per 100 000 people) were categorised as having the potential to endanger, damage or destroy the health or safety of people, their property or the environment on or beyond the incident site (table 9A.18)
- Calls to floods, storm and tempest and other natural disasters In coordination with other emergency services, fire service organisations responded to 19 582 natural disaster incidents (actual or imminent) in 2014-15 (table 9A.13). Further information on government services in the event of natural disasters are available in the Emergency management sector overview (sector overview D).

<sup>&</sup>lt;sup>a</sup> See box 9.2 and table 9A.13 for detailed definitions, footnotes and caveats.

# Prevention/mitigation — Fire risk prevention/mitigation activities

'Fire risk prevention/mitigation activities' is an indicator of governments' objective to reduce the adverse effects of fire on the community through prevention/mitigation measures (box 9.3).

## Box 9.3 Fire risk prevention/mitigation activities

'Fire risk prevention/mitigation activities' is defined by two measures.

 'Accidental residential structure fires per 100 000 households' is defined as those fires that are not deliberately lit but with effective educational programs can be reduced and prevented from occurring in the first instance.

A low or decreasing number of fire incidents suggests a greater likelihood that the adverse effects of fire will be avoided or reduced.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.
- · 'Proportion of residential structures with smoke alarms' is defined as the number of households with a smoke alarm installed, divided by the total number of households.

High or increasing numbers of households with a smoke alarm installed increases the likelihood that the adverse effects of fire will be avoided or reduced.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- incomplete for the current reporting period. All required 2014-15 data are not available for SA, Tas, ACT and NT.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

All jurisdictions undertake a range of fire risk prevention/mitigation tasks to assist households, commercial businesses, and communities prepare for the risk of fire, including:

- public education the promotion of good fire safety and mitigation practices in the community
- building codes and legislation (with relevant building and planning authorities) to ensure new buildings and structures are fire resistant and address locational fire risks
- product standards (with relevant authorities) to ensure products minimise the risk of unwanted fires (either because they are faulty or by accidental/deliberate owner misuse)
- *effective emergency warning systems* (table 9A.21).

A summary of selected fire risk management/mitigation strategies implemented in each jurisdiction is in table 9A.22.

Fire risk prevention/mitigation activities — Accidental residential structure fires per 100 000 households

The national rate of accidental residential structure fires was 84.5 per 100 000 households in 2014-15 (figure 9.4). Over the past ten years, the rate has been declining at an average rate of 1.9 per cent annually, which varied across jurisdictions (table 9A.15).

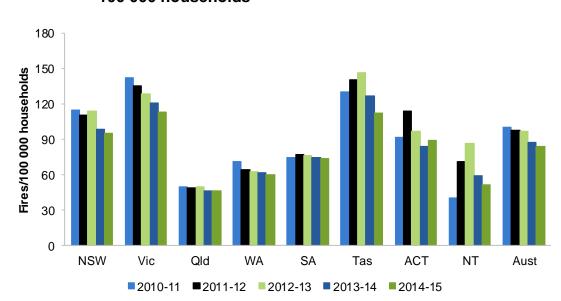


Figure 9.4 Accidental residential structure fires per 100 000 households<sup>a</sup>

The rate of accidental residential structure fires per 100 000 households should be interpreted with caution. In particular, rates are affected by differences in the practice of fire service personnel in each jurisdiction, who determine and classify accidental structure fires from structure fires resulting from other causes.

Fire cause identification assists fire service organisations and other emergency management stakeholders to identify and determine the cause of accidental residential structure fires. It also assists in the formulation of the most appropriate fire prevention and mitigation activities and priorities within each jurisdiction, including fire prevention, community safety and public education programs. For example, cause identification has been used to assist in formulating legislation and standards, and is used to assist in

<sup>&</sup>lt;sup>a</sup> See box 9.3 and table 9A.15 for detailed definitions, footnotes and caveats.

Source: State and Territory governments (unpublished); ABS (2015) Household and Family Projections, 2011 to 2036, Cat. no. 3236.0; table 9A.15.

recovery through the provision of information to facilitate insurance claims and settlements.

Nationally in 2014-15, firefighter assessments reported that:

- 9712 structure fires had an ignition factor of misuse, failure or deficiency (55.9 per cent of all structure fires), of which 2348 fires had an ignition factor of unattended heat sources and 3068 fires had an ignition factor of mechanical failure or malfunction
- 1882 structure fires were deliberately or suspiciously set fires (10.8 per cent)
- the ignition factor for 3964 structure fires (22.8 per cent) was 'undetermined or not reported' (figure 9.5).

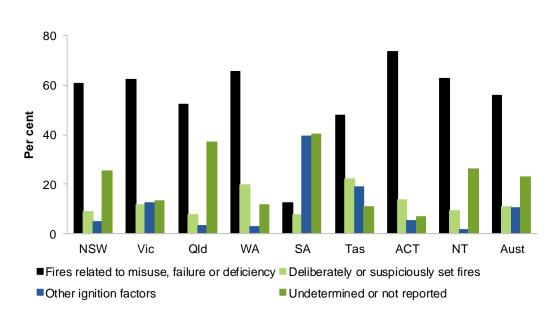


Figure 9.5 **Ignition factors for structure fires, 2014-15**<sup>a</sup>

Source: State and Territory governments; table 9A.17.

One key fire risk mitigation strategy across all jurisdictions is the mandated installation of smoke detectors in residential structures. Nationally consistent data for all jurisdictions are not available. However, recent jurisdictional surveys estimate that 94.4 per cent, 97.2 per cent, 94.9 per cent and 80.0 per cent of households in NSW, Victoria, Queensland and the NT respectively, had an installed smoke alarm/detector in 2014-15 (table 9A.23).

Fire risk prevention/mitigation activities — Residential structures with smoke alarms

Fire service organisations also have programs to encourage households to test their smoke detector/alarms regularly to ensure that they are operational. In 2014-15, 85.9 per cent of

 $<sup>{</sup>f a}$  See table 9A.17 for detailed definitions, footnotes and caveats.

households in Queensland had a smoke alarm that had been tested in the previous 12 months (table 9A.23).

# Equity and effectiveness — preparedness

Preparedness indicators relate to fire service organisations' ability to prepare and assist the community to prepare for fire events.

# Preparedness — Level of safe fire practices in the community

'Level of safe fire practices in the community' is an indicator of governments' objective to reduce the adverse effects of fires on the community and manage the risk of fires (box 9.4).

#### Box 9.4 Level of safe fire practices in the community

'Level of safe fire practices in the community' is defined as the number of households with household fire safety measures installed or prevention procedures followed, divided by the total number of households.

The higher the proportion of households with a fire safety measure installed or prevention measure followed, the greater the level of safe fire practices in the community.

Previous editions of this Report included 2007 data for household preparedness for emergencies (ABS 2008). In lieu of these data, which have become dated, results from the National Security and Preparedness Survey are reported in the Emergency management sector overview (sector overview D). The survey provides measures of natural disaster preparedness.

Data on the level of safe fire practices have been identified for development and reporting in future. However, data are available on the community preparedness for natural disasters, which are provided in the Emergency management sector overview (sector overview D).

# Preparedness — Firefighter workforce

'Firefighter workforce' is an indicator of governments' objective to reduce the adverse effects of fires on the community and manage the risk of fires (box 9.5).

# Box 9.5 Firefighter workforce

'Firefighter workforce' is defined by four measures:

- 'number of full time equivalent firefighter personnel per 100 000 people' where firefighter personnel is defined as the count of all paid firefighters employed on a FTE basis.
- 'workforce by age group' defined as the age profile of the workforce, measured by the proportion of the operational workforce in 10 year age brackets (under 30, 30–39, 40–49, 50–59 and 60 and over).
- A low or decreasing proportion of the workforce who are in the younger age groups and/or a
  high or increasing proportion who are closer to retirement, suggests sustainability problems
  may arise in the coming decade as the older age group starts to retire.
- 'workforce attrition' defined as level of attrition in the operational workforce. It is calculated
  as the number of FTE employees who exit the organisation as a proportion of the number of
  FTE employees

Low or decreasing levels of staff attrition are desirable.

• 'number of fire service organisation volunteers (firefighters and support volunteers) per 100 000 people' where the number of volunteers of fire service organisations is defined as the sum of volunteer firefighters and volunteer support staff on a head count basis.

A workforce of paid firefighter personnel and volunteers which has sufficient capacity and capability to respond to a range of fire and other emergency events is desirable.

Data reported for these measures are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

The number of full time equivalent firefighter personnel per 100 000 people, workforce by age group, volunteers and staff attrition measures should be considered together. Each provides a different aspect of the changing profile and sustainability of fire service organisations' workforces.

Firefighter workforce — full time equivalent paid firefighter personnel per 100 000 people

Paid fire-fighters are predominantly responsible for preventing and responding to fire emergencies including rescues and hazardous materials incidents, providing direct protection in the major cities, metropolitan areas and towns. They support a range of government agencies, including the land management agencies, and work closely with local communities and volunteers to protect lives and property.

Nationally in 2014-15, 60.5 FTE paid firefighters were employed by fire service organisations per 100 000 people, which represents a decrease from 63.5 FTE paid firefighters per 100 000 people in 2013-14 (figure 9.6).

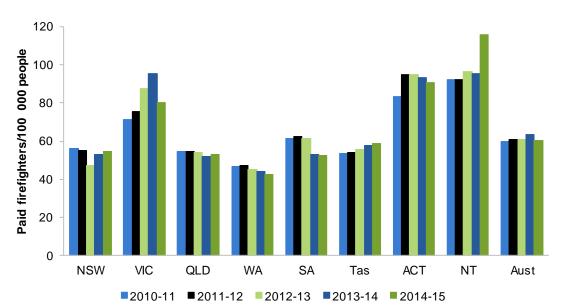


Figure 9.6 Number of full time equivalent paid firefighting personnel<sup>a</sup>

# Firefighter workforce — Workforce by age group

Nationally in 2014-15, 64.1 per cent of the firefighter workforce were aged under 50 years (figure 9.7). Time series data are not available for this measure.

<sup>&</sup>lt;sup>a</sup> See box 9.5 and tables 2A.2 and 9A.24 for detailed definitions, footnotes and caveats. Source: State and Territory governments (unpublished), table 9A.24.

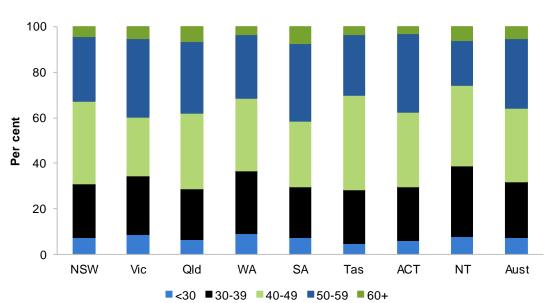


Figure 9.7 Firefighter workforce, by age group, 2014–15<sup>a</sup>

# Firefighter Workforce — Workforce attrition

Nationally in 2014-15, the staff attrition rate was 1.7 per cent, which varied considerably across jurisdictions (table 9A.5). Time series data are not available for this measure.

# Firefighter workforce — fire service organisation volunteers per 100 000 people

Australia's fire service organisations rely on volunteer workforces to meet their responsibilities. Fire service organisation volunteers are unpaid professionals who provide services that would not be economically possible to provide with paid workforces (VAGO 2014). Fire service organisations must effectively recruit, train, deploy and retain volunteer firefighters by investing in infrastructure, training, uniforms, personal protective equipment, and operational equipment and support.

Nationally in 2014-15, there were 956.8 fire service organisation volunteers per 100 000 people, which varied across jurisdictions. This represents a decrease from 959.4 volunteer firefighters per 100 000 people in 2013-14 (figure 9.8).

Over the past 10 years the number of fire service organisation volunteers per 100 000 people has decreased by 13.5 per cent (figure 9.8 and table 9A.24). Several factors have contributed to this fall, including: economic factors (making it financially more difficult for people to commit to volunteering); demographic factors (such as an ageing population

<sup>&</sup>lt;sup>a</sup> See box 9.5 and table 9A.5 for detailed definitions, footnotes and caveats. *Source*: State and Territory governments (unpublished), table 9A.5.

and urban living, leading to fewer people being available to volunteer in the places where they are required); and improvements in the maintenance of volunteer registers (removing inactive volunteers from the estimates) (McLennan 2008).

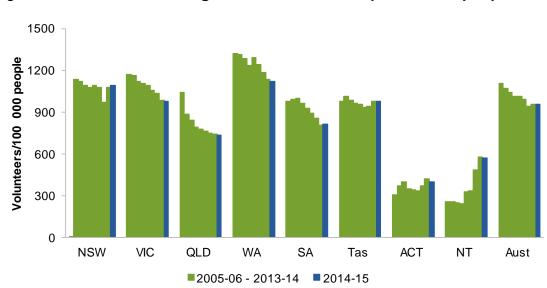


Figure 9.8 Fire service organisation volunteers per 100 000 people<sup>a</sup>

# Equity and effectiveness — response

Response indicators relate to fire service organisations' ability to respond to and suppress fires.

# Response — Response times to structure fires

'Response times to structure fires' is an indicator of governments' objective to reduce the adverse effects of fire on the community through timely response activities (box 9.6).

Response times need to be interpreted with caution because the data are not directly comparable across jurisdictions. Differences between jurisdictions in definitions of response times, geography, personnel mix, and system type (manual or computer assisted dispatch) (table 9A.49) affect the comparability of response times data.

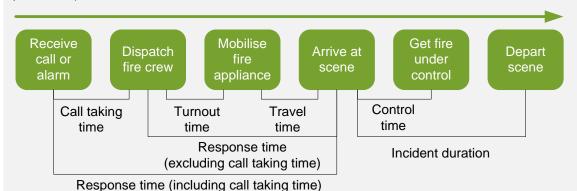
<sup>&</sup>lt;sup>a</sup> See box 9.5 and tables 2A.2 and 9A.24 for detailed definitions, footnotes and caveats. Source: State and Territory governments (unpublished), table 9A.24.

### Box 9.6 Response times to structure fires

'Response times to structure fires' (as illustrated below) is defined as the time taken between the arrival of the first fire crew appliance at the scene of a structure fire and:

- initial receipt of the call at the communications centre. Response time (including call taking time) reflects jurisdictions' overall responsiveness to the notification of a structure fire
- dispatch of the responding fire crew. Response time (excluding call taking time) reflects service organisations' responsiveness to the notification of a structure fire.

Response times are calculated at the 50th and 90th percentile. (The time taken for 50 per cent of all responses to arrive at a structure fire is equal to or below the 50th percentile. The time taken for 90 per cent of all responses to arrive at a structure fire is equal to or below the 90th percentile.)



Response time measures are provided for:

- state-wide the entire jurisdiction
- capital cities measured as the geographic area that incorporates the jurisdictions' capital city. Boundaries are based on the ABS Australian Statistical Geography Standard (ASGS) structure. Capital cities are calculated as the major cities classification for all jurisdictions, other than Tasmania and the NT, where the inner regional (incorporating Hobart and Launceston) and outer regional (incorporating Darwin) classifications are applied
- remoteness areas inner regional (excluding Tasmania), outer regional (excluding the NT), remote and very remote boundaries based on the ASGS structure.

Calculations are based on emergency responses to structure fire incidents and include responses by both permanent and volunteer brigades (unless otherwise noted).

Shorter response times suggest the adverse effects on the community of emergencies requiring fire services are reduced.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- incomplete for the current reporting period (subject to caveats).

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

# Response times to structure fires — state-wide

Nationally in 2014-15, the time within which 90 per cent of the first responding fire resources arrived at the scene of a structure fire (including call taking time) varied from 10.9 minutes to 23.2 minutes across jurisdictions (figure 9.9).

State-wide response times are affected by the geographic and demographic characteristics of each jurisdiction. In particular, data calculated on a state-wide basis represent responses to urban, rural and remote areas, which can differ substantially.

Figure 9.9 Response times to structure fires, state-wide, 90th percentile<sup>a, b</sup>



**■**2010-11 **■**2011-12 **■**2012-13 **■**2013-14 **■**2014-15

WA

SA

Tas

Source: State and Territory governments (unpublished); tables 9A.26-27.

Qld

Vic

NSW

**ACT** 

NT

<sup>&</sup>lt;sup>a</sup> See box 9.6 and tables 9A.26–27 for detailed definitions, footnotes and caveats. <sup>b</sup> SA: data including call taking time are not available prior to 2014-15.

# Response times to structure fires — capital city

Response times in capital cities are lower than the state-wide responses for all jurisdictions. The time within which 90 per cent of the first responding fire appliances arrive at the scene of a structure fire (including call taking time) within capital cities ranged across jurisdictions from 9.1 minutes to 20.2 minutes (figure 9.10). Population density across Australian capital cities varies considerably and this can impact on response time performance.

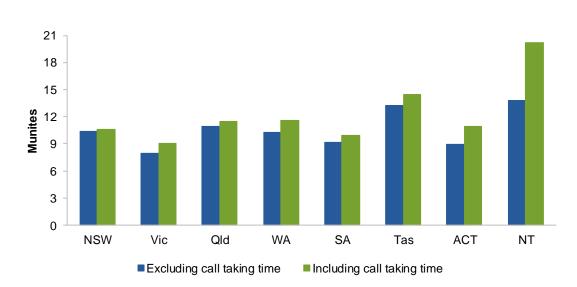


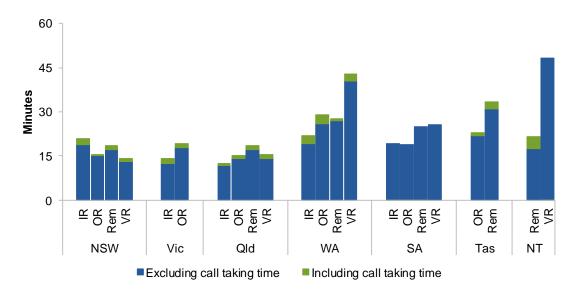
Figure 9.10 Response times to structure fires, capital cities, 2014-15, 90th percentile<sup>a</sup>

# Response times to structure fires — remoteness areas

Response times are generally higher for all jurisdictions in regional and remote areas, compared to capital cities (figure 9.11).

<sup>&</sup>lt;sup>a</sup> See box 9.6 and tables 9A.26–27 for detailed definitions, footnotes and caveats. Source: State and Territory governments (unpublished); tables 9A.26–27.

Figure 9.11 Response times to structure fires, regional and remote areas, 2014-15, 90th percentilea



IR = Inner Regional OR = Outer Regional Rem = Remote VR = Very Remote

Source: State and Territory governments (unpublished); tables 9A.26-27.

There are many factors that influence remoteness area response times including:

- land area and population size
- the dispersion of the population (particularly rural/urban population proportions), topography, road/transport infrastructure and traffic densities
- crewing configurations, response systems and processes, and travel distances for example, some jurisdictions include responses from volunteer stations (often in rural areas) where turnout times are generally longer because volunteers are on call as distinct from being on duty
- small numbers in remote and very remote areas can lead to volatility in the response time data (table 9A.25).

# Equity and effectiveness — recovery

Recovery indicators relate to community restoration and to communities' and fire service organisations' ability to return to a state of preparedness (box 9.7).

<sup>&</sup>lt;sup>a</sup> See box 9.6 and tables 9A.26–27 for detailed definitions, footnotes and caveats.

# Box 9.7 **Performance indicators — recovery**

There are two elements to recovery: supporting communities in reconstruction of the physical infrastructure and restoration of emotional, social, economic, ecological and physical wellbeing following a fire event, and return of communities and fire service organisations to a state of preparedness after experiencing a fire event.

Recovery indicators are identified as a key development area for future reports.

# Efficiency

Fire service organisations' expenditure per person

'Fire service organisations' expenditure per person' is a proxy indicator of the efficiency of governments in delivering emergency management services (box 9.8).

# Box 9.8 Fire service organisations' expenditure per person

'Fire service organisations' expenditure per person' is defined as total fire service organisation expenditure per person in the population.

Expenditure per person is employed as a proxy for efficiency. All else being equal, lower expenditure per person represents greater efficiency. However, efficiency data should be interpreted with caution. For example:

- high or increasing expenditure per person may reflect deteriorating efficiency. Alternatively, it
  may reflect changes in aspects of the service (such as improved response), increased
  resourcing for fire prevention or community preparedness, or the characteristics of fire
  events (such as more challenging fires)
- low or declining expenditure per person may reflect improving efficiency. Alternatively, it may reflect lower quality responses or less challenging fires.

Expenditure per fire is not used as a measure of efficiency because an organisation that works to reduce the number of fire incidents could erroneously appear to be less efficient.

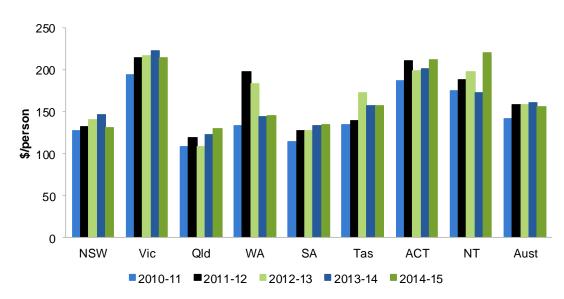
The role of volunteers needs to be considered when interpreting this indicator. Volunteer personnel provide a substantial proportion of fire services (and emergency services more generally). While costs such as the training and equipment associated with volunteers are included in the cost of fire service provision, the labour costs of providing fire services would be greater without volunteers (assuming these functions were still performed).

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

Nationally in 2014-15, the total expenditure of fire service organisations was \$3.7 billion, or \$156 per person in the population (figure 9.12). Expenditure data disaggregated by labour, capital and other costs are available in table 9A.28.



Fire service organisations' expenditure (2014-15 dollars)a Figure 9.12

Nationally in 2014-15, levies and government grants and indirect government funding were the largest sources of fire services revenue (62.8 and 28.0 per cent of total funding and \$94 per person and \$42 per person respectively (table 9A.30).

# **Outcomes**

Outcomes are the impact of services on the status of an individual or group (while outputs are the services delivered) (chapter 1, section 1.5).

# Fire death rate

'Fire death rate' is an indicator of governments' objective to minimise the adverse effects of fire events on the community and enhance public safety (box 9.9).

<sup>&</sup>lt;sup>a</sup> See box 9.8 and table 9A.29 for detailed definitions, footnotes and caveats. Source: State and Territory governments (unpublished); ABS (unpublished); table 9A.29.

#### Box 9.9 Fire death rate

'Fire death rate' is defined by two measures:

- annual fire death rate all deaths, per million people, whose underlying cause of death is fire related to smoke, fire and flames, including all (structure and landscape) fires
- landscape fire death rate deaths resulting from landscape fires only, excluding self-harm deaths, per million people.

A low or decreasing fire death rate represents a better outcome.

The annual fire death rate and the landscape fire death rate differ according to:

- source the annual fire death rate is sourced from Causes of Death, Australia (ABS 2015). The landscape fire death rate is provided by the Australasian Fire and Emergency Service Authorities Council, which source data from media and agency reports, PerilAus from Risk Frontiers, and the National Coroners' Information System
- fire type all fire types versus landscape fires only
- location the landscape fire death rate records the location according to the location of the fire (not residential address of the victim)
- cause of death in addition to deaths primarily caused due to smoke, fire and flames, the landscape fire death rate includes deaths that may have resulted from the landscape fire, but whose primary cause may be related to other factors (such as the onset of a stress related coronary death or from attempting to flee fire).

Data for these measures are:

- comparable (subject to caveats) across jurisdictions and over time
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

## Fire death rate — Annual fire death rate

The annual fire death rate was 4.3 deaths per million people in 2013 (99 fire deaths) (figure 9.13 and table 9A.6). Nationally, exposure to smoke, fire and flames accounted for the majority of fire deaths in 2013 (56 deaths) (table 9A.7).

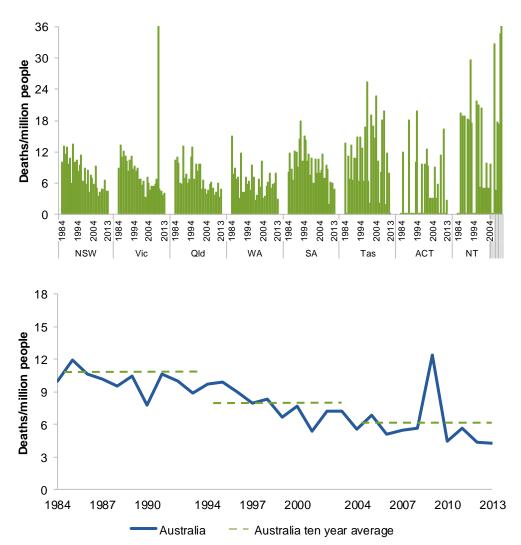


Figure 9.13 Annual fire death rate, 1984–2013<sup>a</sup>

Annual fire death rates can be particularly volatile because of the small number of fire deaths and the influence of large irregular fire events (box 9.10). One method to overcome data volatility is to present fire death rates as three-year averages (table 9A.6). Alternatively, annual death rates can be viewed over a longer time series to help identify any underlying trends. Nationally, in the ten years from 1984–93 the average deaths per million people was 10.0. In the most recent decade (2004–13), the average deaths per million people was 6.0 (figure 9.13).

<sup>&</sup>lt;sup>a</sup> See box 9.9 and table 9A.6 for detailed definitions, footnotes and caveats. Source: ABS (2015) Causes of Death, Australia, Cat. no. 3303.0; table 9A.6.

## Box 9.10 Recent history of Australian bushfires

Bushfires are most common over the savannas of tropical Australia, where some parts of the land burn annually.

The southern parts of Australia, where the majority of the population resides, are susceptible to large bushfires that threaten life and property. Recent examples include:

- Tasmanian Bushfires In January 2013, up to 40 fires were burning across Tasmania. One person died — a Victorian volunteer firefighter — and 203 homes were destroyed. Thousands of locals and tourists were stranded, requiring evacuation (many by sea). The insured cost was \$87 million.
- Perth Hill Bushfires (WA) In February 2011, 71 homes were destroyed and an estimated 39 homes damaged by two major fires that affected metropolitan Perth. Approximately 1540 hectares were burned, 517 families were evacuated and at least 12 people were hospitalised. The insured cost was \$35 million.
- Black Saturday Bushfires (Victoria) In February 2009, the 'Black Saturday' fires caused 173 deaths and many injuries, and burnt 430 000 hectares of land (including 51 towns, 78 communities) destroying homes, businesses, schools and kindergartens. The insured cost was greater than \$1 billion.

Fire services across Australia strive to establish fire management regimes that take a systematic approach to risk management and identify the assets and potential consequences of wildfires, and possible impacts of mitigation and management options.

Source: CSIRO (2012); AEM (2014); ABS (2014).

# Fire death rate — Landscape fire death rate

Nationally, comparatively few deaths are related to landscape fires annually (2 deaths in 2014-15, equating to 0.1 fire deaths per million people), although the landscape fire death rate is punctuated by large, irregular events (table 9.2 and 9A.8). To assist in identifying underlying trends in the annual landscape fire death series, a 30 year time series is provided in table 9A.8.

Table 9.2	Landscape fire deaths <sup>a</sup>								
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2010-11	2	-	-	1	-	-	-	-	3
2011-12	-	1	1	-	-	-	-	-	2
2012-13	-	5	-	3	-	1	-	-	9
2013-14	2	1	-	1	-	-	-	-	4
2014-15	-	-	-	-	2	-	-	-	2

<sup>&</sup>lt;sup>a</sup> See box 9.9 and table 9A.8 for detailed caveats. – Nil or rounded to zero.

Source: Australasian Fire and Emergency Service Authorities Council (unpublished): table 9A.8.

# Fire injury rate

'Fire injury rate' is an indicator of governments' objective to minimise the adverse effects of fire events on the community and enhance public safety (box 9.11).

### Box 9.11 Fire injury rate

'Fire injury rate' is defined as the number of fire-related hospital admissions per 100 000 people.

A lower fire injury rate represents a better outcome.

Fire injuries are represented by hospital admissions (excluding emergency department non-admitted casualties) and are reported by the State or Territory where the admission occurs. A person injured by fire may be treated more than once, and in more than one State or Territory. Data reported exclude deaths from fire injuries after hospitalisation (counted in the fire death rate data).

Data for this measure are:

- comparable (subject to caveats) across jurisdictions and over time
- complete (subject to caveats) for the current reporting period. All required 2013-14 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

Nationally in 2013-14, there were 4000 hospital admissions due to fire injury, equating to a rate of 17.2 per 100 000 people (table 9A.9 and figure 9.14).

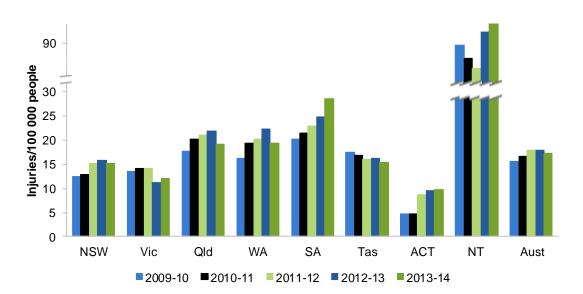


Figure 9.14 Annual fire hospitalisation rate per 100 000 people<sup>a</sup>

Source: Australian Institute of Health and Welfare (AIHW), National Hospital Morbidity Database (unpublished); table 9A.9.

a See box 9.11 and table 9A.9 for detailed definitions, footnotes and caveats.

Fire hospitalisation rates need to be interpreted with caution because of the small number of fire injuries. One method to overcome data volatility is to present fire hospitalisation rates as three-year averages (table 9A.9). There is also strong anecdotal evidence that reliance on hospital separation data may result in a significant underestimation of the number of people affected by burn injuries (Australian Government 2012).

AIHW (2013) analysis of the trends in hospitalised accidental burn injury from the 10 years to 2010-11 shows that the following groups were at risk of suffering accidental burns injuries:

- young children aged 0-4 years (highest burn injury rate)
- adolescent/young adult males, particularly burns from exposure to ignition of highly flammable material (such as petrol) and exposure to controlled fire, not in building or structure (such as campfire)
- Aboriginal and Torres Strait Islander people.

# Confinement to room/object of origin

'Confinement to room/object of origin' is an indicator of governments' objective to reduce the adverse effects of fire emergency events on the community through a combination of its prevention/mitigation, preparedness, and response (box 9.12).

# Box 9.12 Confinement to room/object of origin

'Confinement to room/object of origin' is defined by two measures.

- Proportion of building fires confined to room of origin Confinement is a measure of the proportion of building fires confined to the room in which the fire originated
- Proportion of building and other structure fires confined to room/object of origin —
  Confinement is a measure of the proportion of building fires and other structure fires
  confined to the room and/or object from which the fire originated

A building fire is a fire that has caused some damage to a building structure (such as a house). Other structure fires are fires within a building structure (such as fires confined to rubbish bins, burnt foodstuffs and fires confined to cooking equipment).

A high or increasing proportion of structure fires confined to the object or room of origin is desirable.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

Confinement to room/object of origin — Proportion of building fires confined to room of origin

The proportion of building fires, from all ignition types, confined to room of origin varies across jurisdictions, and within jurisdictions over time (figure 9.15).

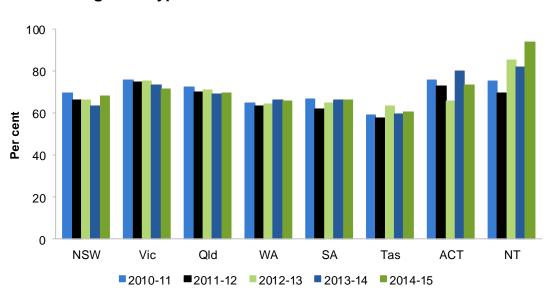


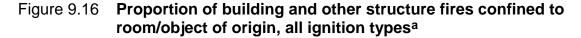
Figure 9.15 Proportion of building fires confined to room of origin, all ignition types<sup>a</sup>

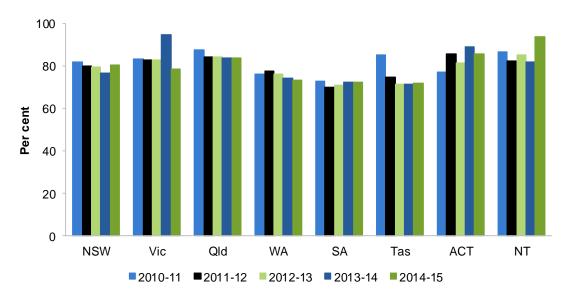
Confinement to room/object of origin — Proportion of building and other structure fires confined to room/object of origin

The proportion of building and other structure fires confined to room/object of origin is generally greater than for building fires confined to room of origin (figure 9.15 and figure 9.16). The measure incorporates object fires that do not spread to the building.

Incendiary and suspicious structure fires (those that are, or suspected of being, deliberately lit) are less likely to be confined to the object or room of origin than for accidental structure fires (tables 9A.10-11).

<sup>&</sup>lt;sup>a</sup> See box 9.12 and table 9A.10 for detailed definitions, footnotes and caveats. Source: State and Territory governments (unpublished); table 9A.10.





<sup>&</sup>lt;sup>a</sup> See box 9.12 and table 9A.11 for detailed definitions, footnotes and caveats. *Source*: State and Territory governments (unpublished); tables 9A.11.

# Value of asset losses from fire events

'Value of asset losses from fire events' is an indicator of the effect of fire on property (box 9.13).

#### Box 9.13 Value of asset losses from structure fire

Value of asset losses from fire events is defined as the estimated monetary value of the damage to property and contents caused by the fire and fire-fighting operations based on insurance claims. It does not include land value.

Firefighter assessed property losses from structure fires is no longer reported as a measure.

The value of these insurance claims is the sum of the incurred claims on insurance companies related to fires and explosions, reported to Insurance Statistics Australia (ISA). Data are presented as: average domestic insurance claim from fire events; total domestic insurance claims from fire events per person; and total commercial insurance claims from fire events.

Lower or decreasing asset losses from fire events represent a better outcome.

Data need to be interpreted with caution as actual asset losses may differ from incurred claims due to:

- under insurance insurance payouts are limited by the estimated value of assets a policy holder provides when taking out insurance
- new for old new for old policies replace an old asset for a new equivalent
- excess policy most small fire incidents will not be recorded in the insurance data due to the need for policy holders to pay an excess prior to claim.

Data reported for this measure are:

- comparable (subject to caveats) across jurisdictions and over time
- incomplete for the current reporting period. ISA estimate that their data cover approximately 69 and 60 per cent of the potential domestic and commercial insurance markets respectively.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

Nationally in 2014-15, household and commercial property insurance claims in relation to fire events (excluding major events) totalled \$801.6 million (table 9A.12).

From 2010-11 to 2014-15, whilst the number of claims decreased (from 10 837 to 9630) domestic insurance fire event claims increased for:

- average claims a 34.7 per cent increase in real terms from an average claim of \$37 133 in 2010-11 to an average claim of \$50 013 in 2014-15
- claim per person a 12.3 per cent increase in real terms from \$18.15 per person in the population in 2010-11 to \$20.38 per person in the population in 2014-15 (table 9A.12 and figure 9.17).

Nationally, there were 2297 commercial insurance claims from fire events in 2014-15 (table 9A.12). In real terms, total commercial insurance claims from fire events per person in the population increased 26.2 per cent from \$10.74 per person in the population in 2010-11 to \$13.55 per person in the population in 2014-15 (figure 9.17).

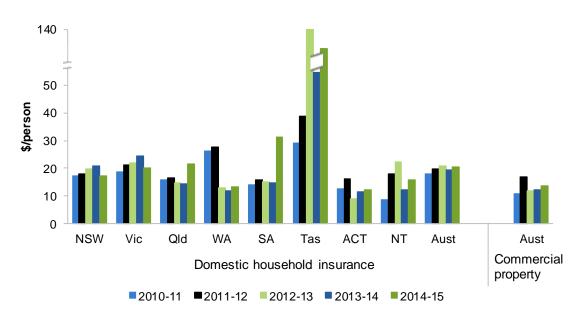


Figure 9.17 Total value of fire event insurance claims (2014-15 dollars)<sup>a</sup>

# 9.4 Profile of emergency services for ambulance events

This section provides information on the performance of emergency service organisations in providing services for ambulance events and in preparing the community to respond to emergencies. Ambulance events are incidents that result in demand for ambulance services. Ambulance services include preparing for, providing and enhancing:

- emergency and non-emergency pre-hospital and out-of-hospital patient care and transport
- inter-hospital patient transport including the movement of critical patients
- specialised rescue services
- the ambulance component of multi-casualty events
- the community's capacity to respond to emergencies.

# Roles and responsibilities

Ambulance service organisations are the primary agencies involved in providing services for ambulance events. In a limited number of cases, other organisations provide services

<sup>&</sup>lt;sup>a</sup> See box 9.13 and table 9A.12 for detailed definitions, footnotes and caveats. *Source*: ISA Database (2015), unpublished; table 9A.12.

such as medical transport for emergencies (Emergency management sector overview table DA.1).

State and Territory governments provide ambulance services in most jurisdictions. In WA and the NT, St John Ambulance is under contract to the respective governments as the primary provider of ambulance services (table 9A.31).

Across jurisdictions the role of ambulance service organisations serves as an integral part of the health system. The role of paramedics is expanding to include the assessment and management of patients with minor illnesses and injuries to avoid transport to hospital (Thompson et. al. 2014). In some rural and remote communities paramedics provide extended access to health service delivery. Access to health services in these areas is often lower than metropolitan areas (chapter 11), in part, due to the difficulty of recruiting and retaining health professionals. Expanding roles are also developing in some metropolitan areas, where paramedics provide care for patients through community health services as alternatives to emergency departments.

# Funding and revenue

# Revenue of ambulance service organisations

Total revenue of ambulance service organisations covered in this chapter was \$2.8 billion in 2014-15. Nationally, revenue increased each year from 2010-11 to 2014-15 (in real terms), with an average annual growth rate of 3.7 per cent (table 9.3).

Table 9.3	Revenue of ambulance service organisations (2014-15 dollars) (\$ million) <sup>a</sup>								
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2010-11	717.2	612.3	576.3	184.0	209.6	57.6	29.8	23.4	2 410.1
2011-12	747.4	637.0	597.8	218.7	216.6	61.3	37.4	24.6	2 540.8
2012-13	794.5	702.6	589.4	233.7	248.4	64.1	37.8	26.4	2 696.9
2013-14	811.9	671.0	592.4	245.1	239.9	60.6	40.9	25.9	2 687.6
2014-15	838.1	725.1	595.7	251.5	244.1	57.3	43.2	27.3	2 782.3

<sup>&</sup>lt;sup>a</sup> See table 9A.32 for detailed footnotes and caveats.

Source: State and Territory governments (unpublished); table 9A.32.

The primary sources of revenue across all jurisdictions in 2014-15 were grants from State and Territory governments (68.0 per cent) and transport fees (from public hospitals, private citizens and insurance). Ambulance subscriptions are also a source of funding in some jurisdictions (table 9A.32).

# Ambulance service organisation assets and air ambulance resources

In 2014-15, ambulance service organisations operated 1139 response locations and 3572 ambulance general transport and patient transport vehicles across all jurisdictions (table 9A.39).

There are fixed and rotary wing (helicopter) ambulance services in all jurisdictions, although arrangements for air ambulance (also called aero-medical) services vary. In Queensland, WA, SA and the NT, all or most of the funding of air ambulance services is external to the ambulance service organisations. Elsewhere the ambulance service organisations fund the service entirely, or they provide the air ambulance staff and an external organisation provide aircraft and crew. The Australian Government provides some capital and recurrent funding for the Royal Flying Doctor Service.

The Council of Ambulance Authorities (CAA) has identified that 90 air ambulance aircraft were available nationally in 2014-15 (table 9A.40). As a result of the varying funding arrangements air ambulance expenditure varies substantially across jurisdictions, with some jurisdictions recording low (or no) expenditure (table 9A.40). (The expenditure figures do not represent the total cost of air ambulances, only that component funded through the ambulance service organisation.)

Information on the treatment of assets by emergency management agencies is presented in table 9A.50.

# **Human resources**

Nationally in 2014-15, 15 976 FTE salaried personnel were involved in the delivery of ambulance services for ambulance service organisations reported in this chapter. The majority (81.0 per cent) of these personnel were ambulance operatives (comprising patient transport officers, students and base level ambulance officers, qualified ambulance officers, other clinical personnel and communications operatives) (table 9A.35).

Nationally, 6211 volunteer personnel (comprising 5990 operatives and 221 support personnel) participated in the delivery of ambulance services in 2014-15. The proportion of volunteer personnel and the nature of their role varied across jurisdictions. Given the decentralised structure of its ambulance service operations, WA has a relatively higher number of volunteer operational and corporate support personnel (table 9A.35).

Nationally, there were 1122 ambulance community first responders in 2014-15 (table 9A.35). Community first responders are trained volunteers that provide an emergency response (with no transport capacity) and first aid care before ambulance arrival. In some locations the first responder service is provided by another emergency service agency (for example, by fire service organisations).

# Demand for ambulance services

Ambulance incidents, responses and patients per 1000 people

The numbers of incidents, responses and patients are interrelated. Nationally in 2014-15:

- 3.4 million incidents events that result in a demand for ambulance resources to ambulance respond reported to service organisations were (144.1 incidents per 1000 people)
- 4.2 million responses resulted where an ambulance vehicle or vehicles are sent to an incident (177.6 responses per 1000 people). There can be multiple responses sent to a single incident. There can also be responses to incidents that do not have people requiring treatment and/or transport
- 3.2 million patients assessed, treated or transported by the ambulance service organisations (136.9 patients per 1000 people) — (figure 9.18 and table 9A.33).

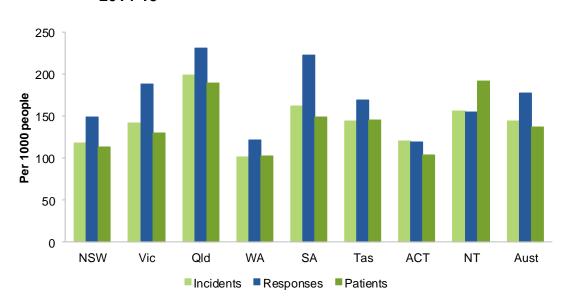


Figure 9.18 Reported ambulance incidents, responses and patients, 2014-15a

# Prioritisation of incidents

Ambulance service organisations prioritise incidents as:

- emergency immediate response under lights and sirens required (code 1)
- urgent undelayed response required without lights and sirens (code 2)

a See table 9A.33 for detailed footnotes and caveats. Source: State and Territory governments (unpublished); table 9A.33.

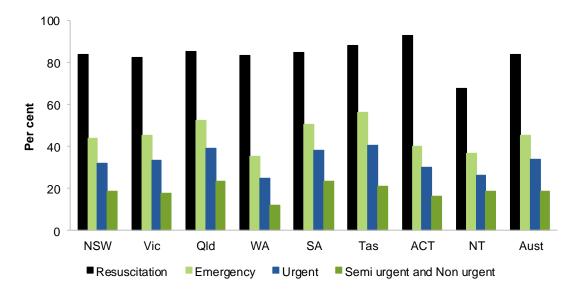
- non-emergency non-urgent response required (codes 3, 4)
- casualty room attendance.

Nationally in 2014-15, of the 3.2 million incidents ambulance service organisations attended, 44.2 per cent were prioritised by the ambulance service organisations as emergency incidents. Ambulance service organisations also attended a large number of urgent incidents (31.9 per cent) and non-emergency incidents (23.9 per cent) (table 9A.33). There were 520 casualty room attendance incidents (all of which occurred in Queensland).

# Emergency department triage category by ambulance transport rate

Emergency department presentation rates and demand for ambulance services are closely linked. In 2014-15, 1.8 million patients arrived at an emergency department by ambulance, air ambulance, or helicopter (24.4 per cent of all emergency department patients) (table 9A.34 and figure 9.19). Of these, 41 216 patients were assessed by emergency department staff to have immediately life threatening conditions on arrival at hospital (triage category 'resuscitation'). In total, 84.1 per cent of all emergency department resuscitation patients arrived by ambulance, air ambulance, or helicopter in 2014-15.

Figure 9.19 Proportion of total emergency department patients, by triage category, who arrived by ambulance, air ambulance or helicopter rescue services 2014-15 (per cent)<sup>a</sup>



<sup>&</sup>lt;sup>a</sup> See table 9A.34 for detailed footnotes and caveats.

Source: AIHW (2015), Emergency department care 2014-15: Australian hospital statistics. Health services series no. 65. Cat. no. HSE 168. Canberra.

# Framework of performance indicators for 9.5 ambulance events

The performance indicator framework for fire events is based on governments' common objectives for emergency services for ambulance events (box 9.14).

#### Box 9.14 Objectives for emergency services for ambulance events

Governments' involvement in ambulance services is aimed at providing pre-hospital and out-of-hospital care and patient transport services, that:

- · are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care
- are equitable and accessible
- are effectively, efficiently and sustainably delivered
- reduce the adverse effects of emergency events on the community by providing specialised medical care in emergency situations.

Ambulance services also contribute to managing community risks and enhancing public safety through various measures including fostering public education in first aid.

The performance indicator framework provides information on equity, efficiency and effectiveness, and distinguishes the outputs and outcomes of ambulance services (figure 9.20). The performance indicator framework shows which data are complete and comparable in the 2016 Report. For data that are not considered directly comparable, text includes relevant caveats and supporting commentary. Chapter 1 discusses data comparability and data completeness from a Report-wide perspective (section 1.6).

In addition to section 9.4, the Report's Statistical context chapter contains data that may assist in interpreting the performance indicators presented in this chapter. These data cover a range of demographic and geographic characteristics (chapter 2).

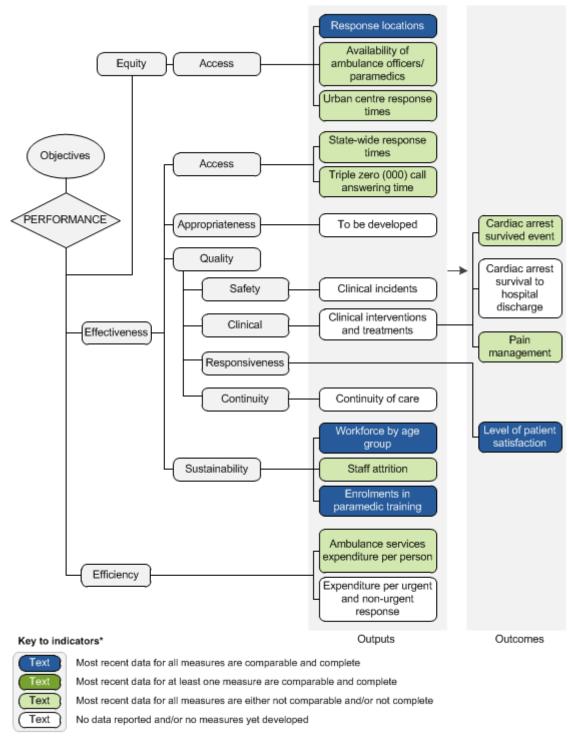


Figure 9.20 Ambulance events performance indicator framework

\* A description of the comparability and completeness of each measure is provided in indicator interpretation boxes within the chapter

# Key performance indicator results for ambulance 9.6 events

Different delivery contexts, locations and types of clients can affect the equity, effectiveness and efficiency of ambulance services.

Data Quality Information (DQI) is included where available for performance indicators in this Report. The purpose of DQI is to provide structured and consistent information about quality aspects of data used to report on performance indicators, in addition to material in the chapter of sector overview and attachment tables. All DQI for the 2016 Report can be found at www.pc.gov.au/rogs/2016.

# **Outputs**

Outputs are the services delivered (while outcomes are the impact of these services on the status of an individual or group) (see chapter 1, section 1.5). Output information is also critical for equitable, efficient and effective management of government services.

# **Equity**

Equity indicators in RoGS measure how well a service is meeting the needs of particular groups that have special needs or difficulties in accessing government services. Data on ambulance services provided to special needs groups are not available in this Report. However, the ambulance events equity indicators presented provide information on whether ambulance services are equally accessible to everyone in the community with a similar level of need.

# Access — Response locations

'Response locations' is an indicator of governments' objective of providing equitable and accessible pre-hospital and out-of-hospital care and patient transport services (box 9.15).

# Box 9.15 **Response locations**

'Response locations' is defined as the number of paid (or salaried), mixed and volunteer response locations per 100 000 people. Locations are primary ambulance response locations where paid, volunteer or a mix of paid and volunteer ambulance operatives respond in an ambulance vehicle and providing pre-hospital care.

Higher or increasing numbers of paid, mixed and/or volunteer response locations, after adjusting for population, suggests better ambulance service response capacity.

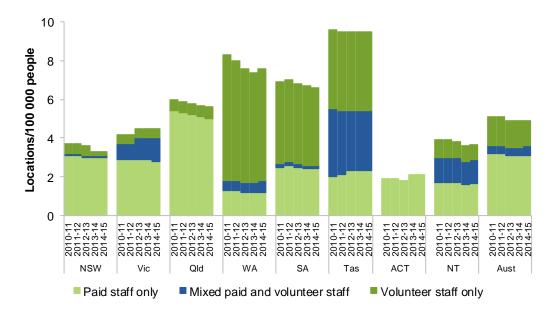
Data reported for this measure are:

- comparable (subject to caveats) across jurisdictions and over time
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

Nationally in 2014-15, the number of salaried, mixed and volunteer response locations was 4.9 per 100 000 people (table 9A.38 and figure 9.21).

Figure 9.21 Total number of ambulance response locations, per 100 000 people, by type of station<sup>a</sup>



<sup>&</sup>lt;sup>a</sup> See box 9.15 and table 9A.38 for detailed definitions, footnotes and caveats.

Source: State and Territory governments (unpublished); table 9A.38.

This indicator should be considered in context of the 'availability of paramedics' indicator (box 9.16), which shows the ambulance workforce can comprise a large proportion of

volunteers. Some jurisdictions comprise a large proportion of volunteer ambulance locations, particularly in rural and remote locations.

# Access — Availability of ambulance officers/paramedics

'Availability of ambulance officers/paramedics' is an indicator of governments' objective of providing equitable and accessible pre-hospital and out-of-hospital care and patient transport services (box 9.16).

#### Box 9.16 Availability of ambulance officers/paramedics

'Availability of ambulance officers/paramedics' is defined as the number of FTE ambulance officers/paramedics per 100 000 people. Ambulance officers/paramedics includes student and base level ambulance officers and qualified ambulance officers but excludes patient transport officers.

High or increasing availability of ambulance officers/paramedics per 100 000 people (indicating high or increasing ambulance service availability) is desirable.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across iurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is under development.

Nationally, there were 46.7 FTE ambulance officers per 100 000 people in 2014-15. The total number of ambulance officers and the proportion of student and base level ambulance officers varied across jurisdictions (table 9A.35 and figure 9.22).

In jurisdictions that utilise a higher number of volunteers, the number of paid FTE ambulance officers may be lower — suggesting a lower level of access according to the indicator. However, volunteers are often utilised to provide ambulance access to small rural areas which have low frequency of medical emergencies. Providing paid paramedics in these locations is costly and raises issues with skills maintenance for paramedics whose caseload is low. This indicator is complemented by the response locations indicator, which identifies jurisdictions that provide an ambulance response utilising volunteers (box 9.15).

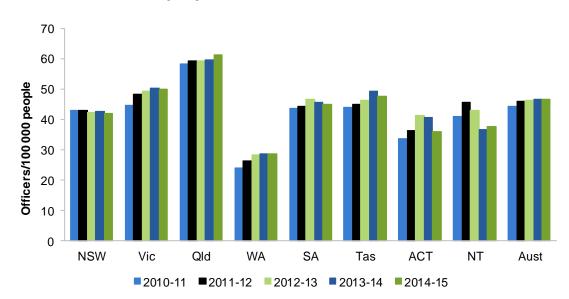


Figure 9.22 Number of full time equivalent ambulance officers, per 100 000 peoplea

# Access — Urban centre response times

'Urban centre response times' is an indicator of governments' objective of providing equitable and accessible pre-hospital and out-of-hospital care and patient transport services (box 9.17).

#### Box 9.17 Urban centre response times

'Urban centre response times' (as illustrated in box 9.18) is defined as the time taken between the arrival of the first responding ambulance resource at the scene of an emergency in code 1 situations and the initial receipt of the call for an emergency ambulance at the communications centre, in urban centres.

Short or decreasing response times suggest the adverse effects on patients and the community of emergencies requiring ambulance services are reduced.

Data reported for this measure are:

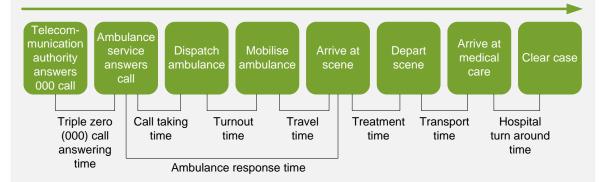
- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is under development.

<sup>&</sup>lt;sup>a</sup> See box 9.16 and table 9A.35 for detailed definitions, footnotes and caveats. Source: State and Territory governments (unpublished); table 9A.35.

#### Box 9.18 Ambulance response times definition

'Response times' (as illustrated below) is defined as the time taken between the arrival of the first responding ambulance resource at the scene of an emergency and the initial receipt of the call for an emergency ambulance at the communications centre.



For this Report, response times are calculated:

- in code 1 situations responses to potentially life threatening situations that necessitates the use of ambulance warning devices (lights and sirens)
- at the 50th and 90th percentile the time (in minutes) within which 50 per cent of the first responding ambulance resources arrive at the scene of an emergency. The 90th percentile is the time (in minutes) within which 90 per cent of the first responding ambulance resources arrive at the scene of an emergency.

Although definitions of response times are consistent, not all jurisdictions have systems in place to capture all components of response time for all cases.

In 2014-15, the time within which 90 per cent of the capital city first responding ambulance resources arrived at the scene of an emergency in code 1 situations ranged from 12.5 to 21.2 minutes across jurisdictions (figure 9.23). The median (50th percentile) response times ranged from 8.0 to 11.2 minutes (table 9A.44).

Differences across jurisdictions in the geography and personnel mix can affect capital city response times data. Factors that can impact on capital city response time performance include:

- land area, and population size and density, which varies considerably across Australian capital cities
- capital city topography, road/transport infrastructure and traffic densities
- crewing configurations, response systems and processes, and travel distances.

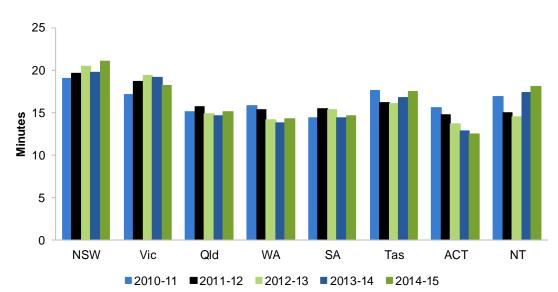


Figure 9.23 Ambulance response times, capital city, 90th percentile<sup>a</sup>

Source: ABS (2010) Australian Statistical Geography Standard (ASGS): Volume 1 - Main Structure and Greater Capital City Statistical Areas, July 2011, Cat. no. 1270.0.55.001, Canberra; State and Territory governments (unpublished); table 9A.44.

Since 2010-11, Queensland has implemented a range of strategies targeted at:

- the effective management of demand for emergency response services
- improved response time to priority one cases (box 9.19).

**a** See boxes 9.17–18 and tables 9A.44 for detailed definitions, footnotes and caveats.

### Box 9.19 Mini-case study: Managing emergency vehicle demand to improve emergency response times

Emergency Vehicle Priority (EVP) is a revolutionary approach to creating safer communities through integrating Intelligent Transport Systems (ITS) with emergency service dispatch systems. First conceptualised in 2006, an initial proof of concept project was introduced in Bundaberg in 2008 to explore its feasibility. The concept evolved to a successful trial of EVP on the Gold Coast from November 2012, and ongoing state-wide rollout (where appropriate).

EVP is the result of a successful collaboration between the Department of Transport and Main Roads (TMR), Transmax, Public Safety Business Agency (PSBA), Queensland Ambulance Service (QAS), Queensland Fire and Emergency Services (QFES), and the Queensland Police Service (QPS), with local government support. The broad objectives of the program are to:

- improve emergency response times and patient outcomes
- avoid confusion and traffic accidents associated with emergency vehicles proceeding through red lights
- reduce traffic flow disruption and unnecessary unpredictable behaviour by road users due to stress, anxiety or panic
- · reduce stress and risk for emergency service workers and the community
- reduce costs (WorkCover, legal, fleet, admin, insurance)
- manage for future increases in demand and congestion.

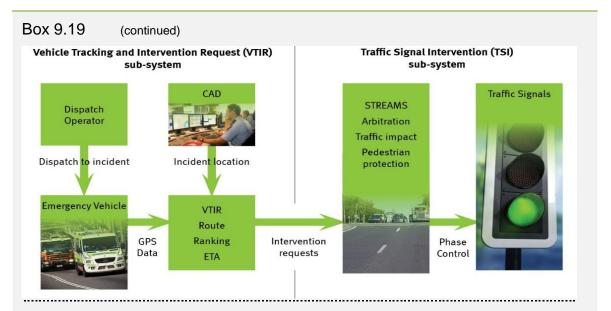
The EVP solution deployed in Queensland is a dynamic intelligent transport system which is constantly tracking the position of QAS emergency vehicles in a code 1 operation or QFES appliances in a turn-out operation, and automatically, without human intervention, interrupts normal traffic signal operations at the optimal timing for any given traffic conditions. It provides a green traffic light signal to emergency response vehicles, when safe to do so, considering the movement of pedestrians and the emergency vehicle itself through traffic. If the vehicle changes course, the EVP system adjusts itself accordingly to clear the way for the new route.

EVP is one of the earliest large scale deployments of co-operative ITS with information exchanged between on-board vehicle communication devices, centralised systems and roadside infrastructure; as illustrated in the diagram below. It has been designed to work with existing technology to deliver a solution which required a slight modification to equipment already installed in emergency vehicles.

There is a four-year program to roll out EVP across Queensland.

Over the course of 2015-16 an additional 250 QAS vehicles and 107 QFES appliances will be equipped with EVP, along with a rolling plan aimed at widespread activation of additional intersections over the coming years.

(continued next page)



# Program evaluation

ARRB Group was engaged by TMR to evaluate the performance of the pilot EVP system in the Gold Coast area. The purpose of the study was to ascertain the performance of EVP using GPS and survey data.

As at June 2015, a total of 215 ambulance vehicles, 68 fire appliances and 676 intersections have been equipped with the EVP technology since the introduction of this initiative. In 2014-15, the EVP initiative resulted in 232 516 green light activations for QAS vehicles, and 28 879 green light activations for QFES vehicles. Of these, QAS vehicles progressed through the intersections in 81 per cent of instances, and QFES vehicles in 77 per cent of instances.

The impact of the project on QAS responses underwent an independent evaluation, conducted by the ARRB Group (Australian Road Research Board (ARRB) – *Performance Evaluation of Gold Coast Emergency Vehicle Priority System*; 2015).

http://www.aitpm.com.au/ArticleDocuments/278/Clarissa%20Han%202015%20Session%206.pdf.aspx

# Improved code one response time performance for EVP-enabled vehicles

The EVP demonstrates a capacity for effective interface of computer-aided dispatch (CAD) and ITS to generate improved response time performance, reduce traffic congestion and enhance community safety.

The independent project evaluation demonstrated a 17 per cent to 26 per cent improvement in travel time for ambulance vehicles. Detailed findings from the comparison between vehicles with-EVP and without-EVP were summarised as follows:

- when compared to without-EVPS vehicles, the average normalised travel time (NTT) for EVPS-equipped vehicles was reduced by 16.88 per cent, from 0.79 to 0.68 seconds per metre, and the difference was statistically significant at the 95 per cent confidence level (CL)
- for EVPS-equipped vehicles, the mean travel times of all 24 road links were reduced. The
  mean travel times of 21 out of the 24 links (88 per cent) showed a reduction that was
  statistically significant at the 95 per cent CL. For these 21 links, the mean travel time was
  reduced by 11 per cent to 36 per cent.

(continued next page)

#### Box 9.19 (continued)

When comparing the travel time data between trips without-EVPS and trips with-EVPS, for vehicles travelling through EVP equipped intersections, further travel time reductions were identified as follows:

with-EVPS and a validated successful intervention 1, the average NTT was reduced by 26.08 per cent, from 0.79 to 0.58 seconds per metre, and the difference was statistically significant at the 95 per cent CL.

with-EVPS and a validated successful intervention, the mean travel times along all 24 links were reduced. The mean travel times of 19 out of the 24 links (79 per cent) showed a reduction that was statistically significant at the 95 per cent CL. For these 19 links, the mean travel time was reduced by 17 per cent to 49 per cent.

# **Effectiveness**

# Access — State-wide response times

'State-wide response times' is an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.20).

#### Box 9.20 State-wide response times

'State-wide response times' (as illustrated in box 9.18) is defined as the time taken between the arrival of the first responding ambulance resource at the scene of an emergency in code 1 situations and the initial receipt of the call for an emergency ambulance at the communications centre, for state-wide responses.

Short or reducing response times suggest the adverse effects on patients and the community of emergencies requiring ambulance services are reduced.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is under development.

A validated successful intervention is where the traffic management system produced a green light and where the vehicle travelled through the intersection unobstructed.

In 2014-15, across jurisdictions the time within which 90 per cent of the state-wide first responding ambulance resources arrived at the scene of an emergency in code 1 situations ranged from 12.5 to 24.0 minutes. Over the past 5 years, the change in response times has varied between jurisdictions (figure 9.24). The median (50th percentile) response times ranged from 7.5 to 11.6 minutes (table 9A.44).

Differences across jurisdictions in the geography, personnel mix, and system type for capturing data, affect state-wide response times data including:

- the dispersion of the population (particularly rural/urban population proportions), topography, road/transport infrastructure and traffic densities
- crewing configurations, response systems and processes, and travel distances for example, some jurisdictions include responses from volunteer stations (often in rural areas) where turnout times are generally longer because volunteers are on call as distinct from being on duty
- land area, and population size and density for example, data calculated on a state-wide basis for some jurisdictions represent responses to urban, rural and remote areas, while others include urban centres only.

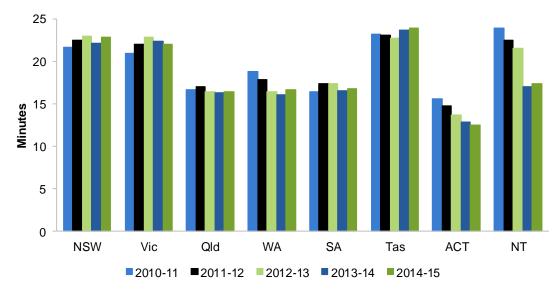


Figure 9.24 Ambulance response times, state-wide, 90th percentilea

# Access — Triple zero (000) call answering time

'Triple zero (000) call answering time' is an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services that are high

<sup>&</sup>lt;sup>a</sup> See box 9.20 and table 9A.44 for detailed definitions, footnotes and caveats. Source: State and Territory governments (unpublished); table 9A.44.

quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.21).

#### Box 9.21 Triple zero (000) call answering time

'Triple zero (000) call answering time' for ambulance services (as illustrated in box 9.18) is defined as the time interval commencing when the emergency call service has answered the triple zero (000) call and selected the desired emergency service organisation to when the ambulance service organisation has answered the call.

It is measured as the percentage of triple zero (000) calls that were answered by ambulance service communication centre staff in a time equal to or less than 10 seconds.

A higher or increasing percentage of triple zero (000) calls answered within 10 seconds suggests the adverse effects on patients and the community of emergencies requiring ambulance services are reduced.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

Nationally in 2014-15, ambulance service organisations answered 89.5 per cent of calls from triple zero (000) within ten seconds (figure 9.25).

Figure 9.25 Proportion of calls from the emergency call service answered by ambulance service communication centre staff in a time equal to or less than 10 seconds, 2014-15<sup>a</sup>



<sup>&</sup>lt;sup>a</sup> See box 9.21 and table 9A.45 for detailed definitions, footnotes and caveats.

Source: State and Territory governments; table 9A.45.

# **Appropriateness**

Appropriateness indicators measure governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.22).

# Box 9.22 **Performance indicator — appropriateness**

'Appropriateness' indicators measure how well services meet clients' needs.

Appropriateness has been identified as a key area for development in future reports.

# Quality — Safety — Clinical incidents

Safety is the avoidance, or reduction to acceptable levels, of actual or potential harm from ambulance services. Safety has been identified as a key area for development in future reports.

'Clinical incidents' has been identified as an overarching indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services,

that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.23).

#### Box 9.23 Clinical incidents

'Clinical incidents' are broadly defined as adverse events that occur because of ambulance service system failure, which result in death or serious harm to a patient.

Clinical incidents will incorporate a wider range of categories than the national core set of hospital sentinel events. Hospital sentinel events are adverse events that occur because of hospital system and process deficiencies, and which result in the death of, or serious harm to, a patient (chapter 11).

This indicator has been identified for development (in accordance with national health-wide reporting standards) and reporting in future.

# Quality — Clinical — Clinical interventions and treatments

Clinical indicators measure the effectiveness and quality of clinical interventions and treatments. Clinical indicators have been identified as a key area for development in future reports.

'Clinical interventions and treatments' has been identified as an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.24).

The indicator 'cardiac arrest survived event rate' reported in the outcomes section of this chapter has strong links to clinical interventions and treatments.

#### Box 9.24 Clinical interventions and treatments

'Clinical interventions and treatments' is yet to be defined.

In the short to medium term, the clinical dimension is likely to provide indicators of service outputs and outcomes. In the longer term additional clinical measures might include indicators of the effectiveness of ambulance services interventions and treatments.

Current development work is focused on the pain management indicator (in the ambulance events outcomes section) and an indicator of cardiac arrest survival to hospital discharge.

This indicator has been identified for development and reporting in future.

# Quality — Responsiveness

Responsiveness is the provision of services that are client orientated and respectful of clients' dignity, autonomy, confidentiality, amenity, choices, and social and cultural needs.

Patient satisfaction reported in the outcomes section of this chapter has strong links to responsiveness.

# Quality — Continuity — Continuity of care

Continuity is the provision of uninterrupted, timely, coordinated healthcare, interventions and actions across programs, practitioners and organisations. The Steering Committee has identified continuity as a key area for development in future reports.

'Continuity of care' is an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.25).

#### Box 9.25 **Continuity of care**

'Continuity of care' has been broadly defined as transporting patients to the right hospital. Some ambulance services have developed protocols under which patients with particular conditions (for example, cardiac and stroke) are transported directly to the hospital or specialised centre where the best treatment for their needs can be provided, rather than transported to the closest hospital where those services might not be available. Transporting critically injured patients directly to specialised Trauma Centres is a further example of these protocols.

This indicator has been identified for development and reporting in future.

# Sustainability

Sustainability is the capacity to provide infrastructure (that is, workforce, facilities, and equipment) into the future, be innovative and respond to emerging needs of the community.

The workforce by age group, staff attrition and paramedics in training indicators should be considered together. Each provides a different aspect of the changing profile and sustainability of ambulance service organisations' workforces.

# Sustainability — Workforce by age group

'Workforce by age group' is an indicator of governments' objective of pre-hospital and out-of-hospital care and patient transport services, that are effectively, efficiently and sustainably delivered (box 9.26).

#### Box 9.26 Workforce by age group

'Workforce by age group' is defined as the age profile of the workforce, measured by the proportion of the operational workforce in 10 year age brackets (under 30, 30-39, 40-49, 50-59 and 60 and over).

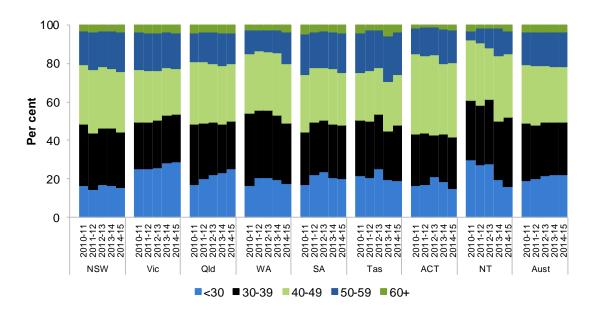
A low or decreasing proportion of the workforce who are in the younger age groups and/or a high or increasing proportion who are closer to retirement, suggests sustainability problems may arise in the coming decade as the older age group starts to retire.

Data reported for this measure are:

- comparable (subject to caveats) across jurisdictions and over time
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

Nationally in 2014-15, 75.2 per cent of the ambulance workforce were aged under 50, a decrease from 78.6 in 2013-14 (table 9A.36 and figure 9.26).



Ambulance workforce, by age group, 2014-15a Figure 9.26

Source: State and Territory governments (unpublished), table 9A.36.

<sup>&</sup>lt;sup>a</sup> See table 9A.36 for detailed footnotes and caveats.

# Sustainability — Staff attrition

'Staff attrition' is an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are effectively, efficiently and sustainably delivered (box 9.27).

#### Box 9.27 Staff attrition

'Staff attrition' is defined as level of attrition in the operational workforce. It is calculated as the number of FTE employees who exit the organisation as a proportion of the number of FTE employees. It is based on staff FTE defined as operational positions where paramedic qualifications are either essential or desirable to the role.

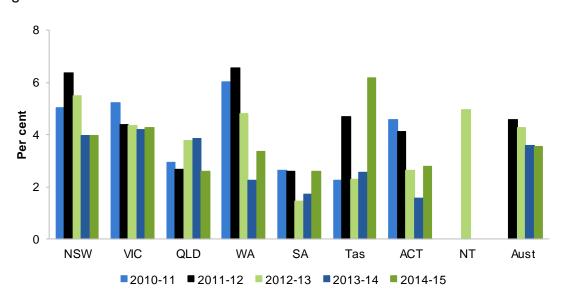
Low or decreasing levels of staff attrition are desirable.

Data reported for this measure are:

- · comparable (subject to caveats) across jurisdictions and over time
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

Nationally, the staff attrition rate was 3.6 per cent in 2014-15, which varied across jurisdictions (figure 9.27).



Ambulance staff attritiona Figure 9.27

a See box 9.27 and table 9A.36 for detailed definitions, footnotes and caveats. Source: State and Territory governments (unpublished), table 9A.36.

# Sustainability — Paramedics in training

'Paramedics in training' is an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are effectively, efficiently and sustainably delivered (box 9.28).

#### Box 9.28 Paramedics in training

'Paramedics in training' is defined as the number of students enrolled in paramedic training courses accredited by the Paramedic Education Programs Accreditation Scheme per million people in the population. Two measures are presented:

- total number of students enrolled in accredited courses per million people in the population
- students enrolled in the final year of accredited courses. This subset is reported to show the number of potential new trained paramedics who will enter the workforce in the coming year.

High or increasing levels of enrolments are desirable.

Data reported for this measure are:

- · comparable (subject to caveats) across jurisdictions and over time
- complete (subject to caveats) for the current reporting period. All required 2013-14 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

The Paramedic Education Programs Accreditation Scheme is administered by the CAA in cooperation with professional bodies and the tertiary sector — 16 universities are at various stages of accreditation or evaluation of their programs. The accreditation of tertiary courses is designed to ensure paramedic graduates are equipped to meet the needs of ambulance service organisations.

Nationally, there was a total of 6372 students were enrolled at accredited paramedic training courses for the 2014 course year (or 271.3 per million people), an 8.5 per cent increase from 2013 (figure 9.28 and table 9A.37). Nationally, 1253 students were enrolled in the final year of their course in 2014 (table 9A.37).

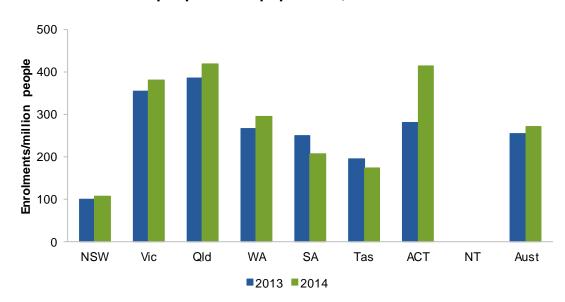


Figure 9.28 Enrolments in accredited paramedic training courses, per million people in the population, 2014<sup>a</sup>

# **Efficiency**

Care needs to be taken when comparing efficiency data across jurisdictions because there are differences in the reporting of a range of cost items and funding arrangements (funding policies and taxing regimes). Some jurisdictions, for example, have a greater proportion of government funding relative to levies compared with other jurisdictions. Also, differences in geographic size, terrain, climate, and population dispersal may affect costs of infrastructure and numbers of service delivery locations per person.

# Ambulance service organisation's expenditure per person

'Ambulance service organisations' expenditure per person' is an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are effectively, efficiently and sustainably delivered (box 9.29).

Both the total cost of ambulance service organisations and the cost to government of funding ambulance service organisations are reported, because revenue from transport fees is significant for a number of jurisdictions.

<sup>&</sup>lt;sup>a</sup> See box 9.28 and table 9A.37 for detailed definitions, footnotes and caveats. Source: State and Territory governments (unpublished), table 9A.37.

#### Box 9.29 Ambulance service expenditure per person

'Ambulance service organisations' expenditure per person' is defined as total ambulance service organisation expenditure per person in the population.

Expenditure per person is employed as a proxy for efficiency. All else being equal, lower expenditure per person represents greater efficiency. However, efficiency data should be interpreted with caution. For example:

- high or increasing expenditure per person may reflect deteriorating efficiency. Alternatively, it may reflect changes in: aspects of the service (such as improved response); resourcing for first aid and community safety; or the characteristics of events requiring ambulance service response (such as more serious para-medical challenges)
- low or declining expenditure per person may reflect improving efficiency. Alternatively, it may reflect lower quality responses or less challenging cases.

Expenditure per ambulance patient is not employed as a measure of efficiency because an organisation that applies more resources to the prevention and preparedness components of community safety — to reduce the demand for ambulance services — - could erroneously appear to be less efficient.

The number and type of ambulance locations also helps explain variation in expenditure for ambulance services across jurisdictions. For example, in some jurisdictions, smaller rural areas are serviced by paid ambulance personnel whereas in others, there may be a mix of paid and volunteer personnel or wholly volunteer personnel. Service delivery strategies have a significant impact on cost and help to explain differentials in expenditure per person between jurisdictions.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is under development.

Nationally, total expenditure on ambulance service organisations was \$2.8 billion, or \$119.44 per person in 2014-15 (tables 9A.46–47 and figure 9.29).

Within Australia, different jurisdictions have selected different funding models to provide resourcing to ambulance service organisations. The proportions of funding sources varied across jurisdictions. Nationally in 2014-15, government grants and indirect government funding formed the greatest source of ambulance service organisations funding (68.1 per cent of total funding, and \$80.18 per person), followed by transport fees (25.2 per cent of total funding, or \$30.15 per person) (table 9A.48).

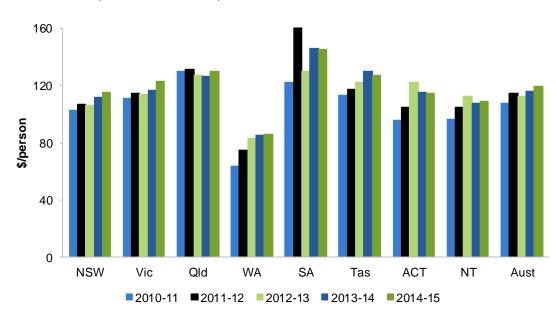


Figure 9.29 Ambulance service organisations' expenditure per person (2014-15 dollars)<sup>a</sup>

# Expenditure per urgent and non-urgent response

'Expenditure per urgent and non-urgent response' has been identified for development as an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are effectively, efficiently and sustainably delivered (box 9.30).

# Box 9.30 Expenditure per urgent and non-urgent response

'Expenditure per urgent and non-urgent response' is yet to be defined.

This indicator has been identified for development and reporting in future.

# **Outcomes**

Outcomes are the impact of services on the status of an individual or group (while outputs are the services delivered) (see chapter 1, section 1.5).

**a** See box 9.29 and table 9A.47 for detailed definitions, footnotes and caveats. *Source*: State and Territory governments (unpublished); tables 9A.47 and 9A.51.

# Cardiac arrest survived event rate

'Cardiac arrest survived event rate' is an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.31).

#### Box 9.31 Cardiac arrest survived event rate

'Cardiac arrest survived event rate' is defined by the percentage of patients aged 16 years or over who were in out-of-hospital cardiac arrest and had a return to spontaneous circulation (that is, the patient having a pulse) until administration and transfer of care to the medical staff at the receiving hospital (Jacobs et al. 2004).

Three measures are provided as the percentage of patients aged 16 years and over who had a return to spontaneous circulation in the following circumstances:

- Adult cardiac arrest where resuscitation attempted where:
  - a person was in out-of-hospital cardiac arrest (which was not witnessed by a paramedic)
  - chest compressions and/or defibrillation was undertaken by ambulance or emergency medical services personnel.
- Adult Ventricular Fibrillation (VF) or Ventricular Tachycardia (VT) cardiac arrests where:
  - a person was in out-of-hospital cardiac arrest (which was not witnessed by a paramedic)
  - the arrest rhythm on the first ECG assessment was either VF or VT (an irregular and/or fast heartbeat).
- Paramedic witnessed cardiac arrest where a person was in out-of-hospital cardiac arrest that occurred in the presence of ambulance paramedic or officer.

A high or increasing cardiac arrest survived event rate is desirable.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is under development.

Across jurisdictions the survival rate for patients in VF or VT cardiac arrest are higher than for other adult cardiac arrests (figure 9.30 and table 9A.41). VF or VT are electrical rhythms of the heart but are not associated with effective beating of the heart to produce a pulse. Patients that suffer a VF/VT cardiac arrest are more likely to have better outcomes compared with other causes of cardiac arrest as these conditions are primarily correctable through defibrillation. This is because the definitive treatment for VF/VT is defibrillation, and the earlier this intervention is applied (either by ambulance or within the community through the use of Automated External Defibrillators) the chance of survival is greatly improved.

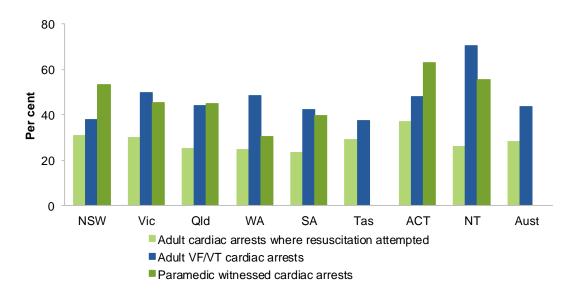


Figure 9.30 Cardiac arrest survived event rate, 2014-15a, b

Source: State and Territory governments (unpublished); table 9A.41.

Similarly, the survival rate from paramedic witnessed out-of-hospital cardiac arrests is higher than for other adult out-of-hospital cardiac arrests (excluding VF/VT cardiac arrests). Cardiac arrests that are treated immediately by the paramedic have a better likelihood of survival due to immediate and rapid intervention. This is substantially different to cardiac arrests occurring prior to the ambulance arriving where such increasing periods of treatment delay are known to negatively influence outcomes (figure 9.30).

# Cardiac arrest survival to hospital discharge

'Cardiac arrest survival to hospital discharge' has been identified for development as an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.32).

# Box 9.32 Cardiac arrest survival to hospital discharge

'Cardiac arrest survival to hospital discharge' is yet to be defined.

A high or increasing survival rate is a desirable outcome.

This indicator has been identified for development and reporting in future.

 $<sup>^{\</sup>mathbf{a}}$  See box 9.31 and table 9A. for detailed definitions, footnotes and caveats.  $^{\mathbf{b}}$  Data not available for Tasmania for 2014-15 for paramedic witnessed cardiac arrests, and therefore no Australian total is reported.

This page has been changed since an earlier version of the Report. See errata at http://www.pc.gov.au/research/ongoing/report-on-government-services/2016/emergency-management#errata

# Pain management

'Pain management' is an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.33).

#### Box 9.33 Pain management

'Pain management' is defined as the percentage of patients who report a clinically meaningful pain reduction. Clinically meaningful pain reduction is defined as a minimum 2 point reduction in pain score from first to final recorded measurement.

Included are patients who:

- are aged 16 years and over and received care from the ambulance service, which included the administration of pain medication (analgesia)
- recorded at least 2 pain scores (pre- and post-treatment) on a Numeric Rating Scale
- recorded an initial pain score of 7 or above on the Numeric Rating Scale of 1–10.

Patients who refuse pain medication for whatever reason are excluded.

A higher or increasing percentage of patients with relieved pain at the end of ambulance service treatment suggests improved patient outcomes.

Data reported for this measure are:

- comparable (subject to caveats) within jurisdictions over time but are not comparable across jurisdictions
- complete (subject to caveats) for the current reporting period. All required 2014-15 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

Ambulance services aim to control pain to a comfortable level for all patients (or in selected cases aim for the abolition of pain). This may be achieved by providing out-of-hospital treatment and care to the injury or illness, the use of pain relief medications (analgesics), or a combination of the two. Nationally in 2014-15, 86.5 per cent of patients who initially reported severe pain to an ambulance service (a pain score of 7 or above on the Numeric Rating Scale), reported clinically meaningful pain reduction at the end of the service (figure 9.31).

This page has been changed since an earlier version of the Report. See errata at http://www.pc.gov.au/research/ongoing/report-on-government-services/2016/emergency-management#errata

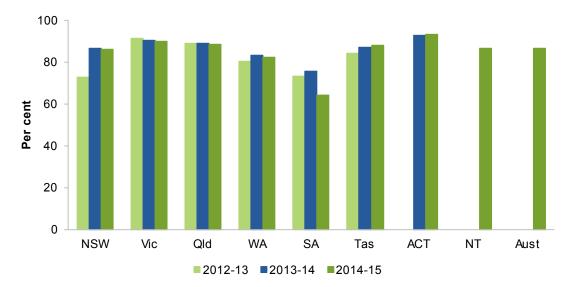


Figure 9.31 Patients who report a clinically meaningful pain reduction<sup>a, b</sup>

Source: State and Territory governments (unpublished); table 9A.42.

# Level of patient satisfaction

'Level of patient satisfaction' is an indicator of governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care (box 9.34).

# Box 9.34 Level of patient satisfaction

'Level of patient satisfaction' is defined as the total number of patients who were either 'satisfied' or 'very satisfied' with ambulance services they had received in the previous 12 months, divided by the total number of patients that responded to the *National Patient Satisfaction Survey* (CAA 2015).

A higher level or increase in the proportion of patients who were either 'satisfied' or 'very satisfied' suggests greater success in meeting patient needs.

Data for these measures are:

- · comparable (subject to caveats) across jurisdictions and over time
- complete (subject to caveats) for the current reporting period. All required 2015 data are available for all jurisdictions.

Data quality information for this indicator is at www.pc.gov.au/rogs/2016.

 $<sup>^{\</sup>mathbf{a}}$  See box 9.33 and table 9A.42 for detailed definitions, footnotes and caveats.  $^{\mathbf{b}}$  Data for the ACT and the NT were not available for 2012-13 and for the NT in 2013-14. Total excludes the ACT and NT in 2012-13 and the NT in 2012-13 and 2013-14 and a national total is not reported.

Nationally in 2015, 98 per cent of patients indicated that they were satisfied or very satisfied with the ambulance services received, with no statistically significant differences across jurisdictions. Similarly, there are small differences across jurisdictions for particular aspects of the ambulance service (figure 9.32). Over ten years, the estimated overall satisfaction levels for ambulance patients were similar across all jurisdictions (table 9A.43).

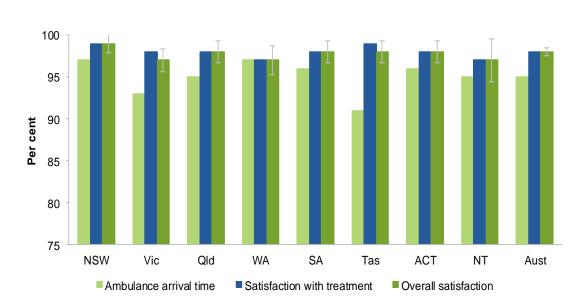


Figure 9.32 **Proportion of ambulance users who were satisfied or very satisfied with the ambulance service, 2015**<sup>a</sup>

# 9.7 Future directions in performance reporting

A number of developments are underway to improve the comparability and accuracy of data, and to expand the scope of reporting on emergency services. Performance indicators for fire and ambulance services are being improved with the assistance of the Australasian Fire and Emergency Service Authorities Council (AFAC), the Australian Council of State Emergency Services and the CAA.

# Fire events

AFAC have commenced a review of fire and emergency services performance measures, in the context of the strategic priorities outlined in Strategic Directions for Fire and

<sup>&</sup>lt;sup>a</sup> See box 9.34 and table 9A.43 for detailed definitions, footnotes and caveats. Source: CAA 2015, Council of Ambulance Authorities Patient Satisfaction Survey 2015; table 9A.43.

Emergency Services in Australia and New Zealand 2014-2016 (AFAC 2013). The outcomes of the review will be an important source for indicator development, including:

- the consideration of alternate performance indicators for emergency services (and their link to emergency service objectives)
- the development of data by emergency service organisations participating in the review.

# **Ambulance events**

Ambulance event reporting will focus on further developing the comparability of the cardiac arrest survived event indicator and expanding the scope of the urban centre response time indicator to report data for urban centres with populations of 50 000 and above.

Several indicators of the ambulance events performance indicator framework that not yet able to be measured. The EMWG, supported by the CAA, will define data requirements, and develop and implement new data collections for these indicators in future years.

#### 9.8 **Definitions of key terms**

## Comparability

Data are considered comparable if (subject to caveats) they can be used to inform an assessment of comparative performance. Typically, data are considered comparable when they are collected in the same way and in accordance with the same definitions. For comparable indicators or measures, significant differences in reported results allow an assessment of differences in performance, rather than being the result of anomalies in the data.

## Completeness

Data are considered complete if all required data are available for all jurisdictions that provide the service.

## Expenditure

## Includes:

- salaries and payments in the nature of salaries to fire and ambulance personnel
- capital expenditure (such as the user cost of capital)
- other operating expenditure (such as running expenditure, contract expenditure, training expenditure, maintenance expenditure, communications expenditure, provision for losses and other recurrent expenditure).

Excludes interest on borrowings.

# User cost of capital

The opportunity cost of funds tied up in the capital used to deliver services. Calculated as 8 per cent of the current value of non-current physical assets (including land, plant and equipment).

## Human resources

Human resources refers to any person delivering a service, or managing the delivery of this service, including:

- firefighters (qualified paid and volunteer firefighters)
- salaried ambulance personnel, remunerated volunteer and non-remunerated volunteer ambulance personnel
- support personnel (any paid person or volunteer directly supporting operational providers, including administrative, technical and communications personnel).

# Revenue

Revenue received directly or indirectly by fire and ambulance service organisations on an accrual accounting basis, including:

# Government grant funding

Grant funding, as established in legislation, from the Australian, State/Territory and Local governments.

# Levies

Revenue from levies, as established in enabling legislation, raised on insurance companies and property owners.

# charges

User/transport Revenue from fees and charges on individuals, private/public organisations and insurers.

## Subscriptions and other income

Other revenue, including:

- · subscriptions and benefit funds received from the community
- · donations, industry contributions and fundraising received
- · other income.

# Indirect revenue

All revenue or funding received indirectly by the agency (for example, directly to Treasury or other such entity) that arises from the agency's actions.

# **Preparedness**

Actions/programmes designed to strengthen the overall capacity and capability of a community to manage disasters; and procedures planned for during a non-disaster response period to be actioned during a disaster response period to minimise the loss of life, injury and damage to property when a disaster occurs.

# Response

Actions taken in anticipation of, during and/or immediately after a disaster to ensure that

its effects are minimised and that affected people are provided with immediate care, relief and support.

## Volunteer personnel

# Volunteer firefighters /ambulance operatives

All personnel engaged on an unpaid casual basis by the emergency service organisation

- are principally involved in the delivery of ambulance services, generally on an on-call basis. These staff may include categories on the same basis as permanent ambulance operatives (with transport capability)
- deliver or manage a firefighting service directly to the community and who are formally trained and qualified to undertake firefighting duties, but do not receive remuneration other than reimbursement of 'out of pocket expenses'.

# Remunerated volunteer ambulance operatives

All personnel who volunteer their availability, however, are remunerated in part for provision of an ambulance response (with transport capability).

# Volunteer support staff

All personnel engaged on an unpaid casual basis that are not remunerated and are principally involved in the provision of support services. For fire service organisations, this includes any staff whose immediate client is the firefighter. These can be people in operational support roles provided they do not receive payment for their services other than reimbursement of 'out of pocket expenses'.

#### List of attachment tables 9.9

Attachment tables are identified in references throughout this chapter by an '9A' prefix (for example, table 9A.3 is table 3). Attachment tables are provided on the Review website (www.pc.gov.au/rogs/2016).

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Table 9A.51 Deflators

# 9.10 References

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# 9A Fire and ambulance services — attachment

Definitions for the indicators and descriptors in this attachment are in section 9.9 of the chapter. Unsourced information was obtained from the Australian, State and Territory governments, with the assistance of the Australasian Fire and Emergency Service Authorities Council and the Council of Ambulance Authorities.

Data in this Report are examined by the Emergency Management Working Group, but have not been formally audited by the Secretariat.

Data reported in the attachment tables are the most accurate available at the time of data collection. Historical data may have been updated since the last edition of RoGS.

This file is available on the Review web page (www.pc.gov.au/gsp).

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# All jurisdictions — fire events

Table 9A.1 All activities of fire service organisations

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
Fire prevention								
Advice on rural land management	$\checkmark$	✓						
Preparation of risk assessment and emergency plans	✓	✓	✓	✓	✓	✓	✓	✓
Inspection of property and building for fire hazards and fire standards compliance	✓	✓	✓	✓	✓	✓	✓	✓
Inspection of storage and handling	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	×	$\checkmark$
Other	$\checkmark$							
Fire preparedness								
Preparation of response plans	$\checkmark$							
Public training and intervention	$\checkmark$							
Promotion of fire alerting systems	$\checkmark$							
Training of fire personnel	$\checkmark$							
Sale and maintenance of fire protection equipment	✓	✓	✓	*	×	✓	×	×
Hazardous chemicals and material certification	✓	✓	×	✓	✓	×	×	×
Other	✓	✓	✓	✓	✓	✓	✓	✓
Nonfire preparedness								
Counter-terrorism	✓	✓	✓	✓	✓	✓	✓	✓
Critical infrastructure protection	$\checkmark$	✓	✓	✓	✓	✓	✓	✓
National security support	$\checkmark$	✓	✓	✓	✓	✓	✓	✓
Fire response								
Structural fire suppression	✓	✓	✓	✓	✓	✓	✓	✓
Wild fire suppression	✓	✓	✓	✓	✓	✓	✓	✓
Response to incident involving hazardous substances	✓	✓	✓	✓	✓	✓	✓	✓
Interagency response/incident management arrangements	✓	✓	✓	✓	✓	✓	✓	✓
Other	✓	✓	✓	✓	✓	✓	✓	✓
Nonfire response								
Hazardous materials incidents	$\checkmark$	✓	✓	✓	✓	$\checkmark$	$\checkmark$	✓
Chemical biological and radiological incidents	✓	✓	✓	✓	✓	✓	✓	✓
Aircraft/airport incident response	$\checkmark$	✓	✓	✓	✓	✓	✓	✓
Medical emergencies	✓	✓	✓	×	×	✓	✓	✓
Road crash rescue	✓	✓	✓	✓	✓	✓	✓	✓
Industrial rescue	✓	✓	✓	✓	✓	✓	✓	✓
Rescue	✓	✓	✓	<b>√</b>	<b>√</b>	✓	✓	✓
Storm damage	✓	✓	✓	✓	✓	✓	✓	✓
Natural events	✓	✓	✓	✓	✓	✓	✓	✓
Marine response	✓	✓	×	✓	✓	*	✓	<b>√</b>
Technological and hazardous material incidents	✓	✓	✓	✓	✓	✓	✓	✓

Table 9A.1 All activities of fire service organisations

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
Emergency relief and recovery	✓	✓	✓	✓	✓	✓	×	×
Vertical rescue	$\checkmark$	×						
Urban search and rescue	$\checkmark$							
Fire recovery								
Critical incident stress debriefing	$\checkmark$							
Salvage and restoration of the emergency event to a safe state	✓	✓	$\checkmark$	✓	$\checkmark$	✓	✓	✓
Support for the community	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	✓	×
Post incident analysis of events	$\checkmark$	$\checkmark$	$\checkmark$	✓	$\checkmark$	$\checkmark$	✓	$\checkmark$

Source: State and Territory governments (unpublished).

## Table 9A.2 Delivery and scope of activity of primary fire service organisations

,		Fire service organisations (a)	
	Umbrella department(s)	Fire service provider(s)	Land management agency(s)
NSW	<ul> <li>NSW Ministry for Police and Emergency Services</li> </ul>	<ul> <li>Fire &amp; Rescue NSW: government department reports to the Minister for Police and Emergency Services directly.</li> </ul>	NSW Department of Environment, Climate Change and Water     NSW National Park and Wildlife Service
		<ul> <li>NSW Rural Fire Service: government department reports to the Minister for Police and Emergency Services directly.</li> </ul>	Forests NSW NSW Lands Department NSW Water Authorities
Vic	Department of Justice and Regulation	<ul> <li>Metropolitan Fire and Emergency Services Board: statutory authority reports to the Minister for Police and Emergency Services.</li> </ul>	Department of Environment, Land, Water & Planning
	Emergency Management Victoria	<ul> <li>Country Fire Authority: statutory authority reports to the Minister for Police and Emergency Services.</li> </ul>	
		vices Board provides urban fire services coverage from the Melbourne Central E re services coverage for all parts of Victoria other than the Melbourne Metropoli	
Qld		<ul> <li>Queensland Fire and Emergency Services (QFES): The Commissioner, QFES reports to the Minister for Police, Fire and Emergency Services directly.</li> </ul>	<ul> <li>Department of Natural Resources and Mines         Department of National Parks, Recreation, Sport and Racing     </li> </ul>

Note: On 1 November 2013, Queensland Fire and Emergency Services (QFES) was established. QFES is both the fire service provider and the umbrella organisation for fire and emergency services in Queensland. QFES incorporates parts of the former Queensland Fire and Rescue Service and former Emergency Management Queensland, including the State Emergency Service.

Department of Fire and Emergency Services (DFES): umbrella authority reports to the Minister for Emergency Services;
 Corrective Services; Small Business; Veterans directly.

· Department of Parks and Wildlife

Note: DFES is both the fire service provider and the umbrella organisation for fire and emergency services in Western Australia. As the primary fire and emergency service in WA, DFES includes the Fire and Rescue Career and Volunteer Service, State Emergency Service, Volunteer Fire Service, Volunteer Emergency Service Units and the Volunteer Marine Rescue Services in its operational commands. Bush Fire Brigades are administered by local governments with fires in national parks and reserves the responsibility of the Department of Parks and Wildlife.

WA

## Table 9A.2 **Delivery and scope of activity of primary fire service organisations**

•		Fire service organisations (a)	
SA	Fire and Emergency Services Commission	<ul> <li>South Australian Metropolitan Fire Service: body corporate reports to the SA Fire and Emergency Services Commission.</li> </ul>	• Forestry SA
		<ul> <li>South Australian Country Fire Service: body corporate reports to the SA Fire and Emergency Services Commission.</li> </ul>	<ul> <li>Department of Environment, Water and Natural Resources</li> </ul>
Tas		Tasmania Fire Service: operational arm of the State Fire	Forestry Tas
		Commission, reports to the Minister for Police and Emergency Management.	Parks and Wildlife Service
ACT	<ul> <li>ACT Emergency Services Agency within the Justice and Community Safety Directorate</li> </ul>	<ul> <li>ACT Fire and Rescue and ACT Rural Fire Service: services of the ACT Emergency Services Agency within the Justice and Community Safety Directorate, together report to the ACT Minister for Police and Emergency Services.</li> </ul>	Parks and Conservation Service
NT	<ul> <li>NT Police, Fire and Emergency Services</li> <li>Department of Land Resource Management</li> </ul>	<ul> <li>NT Fire and Rescue Service: branch of the NT Police, Fire and Emergency Services. The Directors of NT Fire and Rescue Service and NT Emergency Service reports to the Chief Executive Officer for Police, Fire and Emergency Services, who reports to the Minister for Police, Fire and Emergency Services.</li> </ul>	<ul> <li>Department of Land Resource Management — The Chief Fire Control Officer reports to the CEO of Department of Land Resource Management who reports directly to the Minister.</li> </ul>
			Parks and Wildlife Commission of the NT

<sup>(</sup>a) Excludes brigades employed by large scale public and private land managers; port, mining and other infrastructure brigades; and land management departments and brigades operating under Australian jurisdiction (for example, airport and defence installations).

.. Not applicable.

Source: State and Territory governments (unpublished).

Table 9A.3 Scope of 'fire service organisation' data provided by jurisdictions

		NSW	Vic	Qld	WA (a)	SA	Tas	ACT	NT
		UD FSP LMA	UD FSP LMA	UD FSP LMA	UD FSP LMA	UD FSP LMA	UD FSP LMA	UD FSP LMA	
Fire service orga	anisation financial data tables							<u> </u>	
Table 9A.4	Major sources of fire service organisations revenue	x 🗸 🗸	x 🗸 🗸	✓ ✓ x	✓ ✓ ✓	x 🗸 x	x 🗸 🗸	x 🗸 x	x 🗸 🗸
Table 9A.5	Fire service organisations human resources	x 🗸 🗸	x 🗸 🗸	✓ ✓ x	✓ ✓ ✓	x √ x	x √ x	< < <	x 🗸 🗸
Table 9A.28	Fire service organisations' costs	x 🗸 🗸	x 🗸 🗸	√ √ x	$\checkmark$ $\checkmark$ $\checkmark$	x √ x	x 🗸 🗸	x ✓ ✓	x 🗸 🗸
Table 9A.29	Fire service organisations' expenditure per person	x 🗸 🗸	x 🗸 🗸	✓ ✓ x	✓ ✓ ✓	x √ x	x 🗸 🗸	x 🗸 🗸	x 🗸 🗸
Table 9A.30	Fire service organisations' funding per person	x 🗸 🗸	x 🗸 🗸	✓ ✓ x	✓ ✓ ✓	x 🗸 x	x 🗸 🗸	x 🗸 🗸	x 🗸 🗸
Fire service orga	anisation activity data tables								
Table 9A.1	All activities of fire service organisations	✓ ✓ ✓	✓ ✓ ✓	√ √ x	✓ ✓ ✓	✓ ✓ ✓	<b>✓ ✓ ✓</b>	<b>✓ ✓ ✓</b>	✓ ✓ ✓
Table 9A.2	Delivery and scope of activity of primary fire service organisations	<b>✓</b> ✓ ✓	✓ ✓ ✓	< < <	✓ ✓ ✓	< < <	< < <	< < <	✓ ✓ ✓
Table 9A.10	Confinement of building fires to room of origin	✓ ✓	🗸 🗸	✓ x	✓ x	✓ x	✓ x	✓ ×	🗸 🗸
Table 9A.11	Confinement of building and other structure fires to room/object of origin	🗸 🗸	. ✓ ✓	✓ x	✓ x	✓ x	✓ ×	✓ ×	🗸 🗸
Table 9A.14	Fire incidents attended by fire service organisations	🗸 🗸	🗸 🗸	✓ x	✓ ✓	✓ x	✓ x	✓ x	🗸 🗸
Table 9A.15	Accidental residential structure fires reported to fire service organisations	🗸 🗸	✓ ✓	✓ x	✓ x	✓ ×	✓ x	✓ x	🗸 🗸
Table 9A.16	Fire service organisations and land management agencies reported total landscape fires (bush and grass) incidents	🗸 🗸	🗸 🗸	✓ ×	🗸 🗸	🗸 x	√ ×	✓ ×	✓ ✓
Table 9A.17	Ignition factors for structure fires	🗸 🗸	🗸 🗸	✓ x	🗸 x	🗸 x	✓ x	✓ x	🗸 🗸
Table 9A.18	Hazardous materials incidents	🗸 🗸	🗸 🗸	✓ x	🗸 x		✓ x		🗸 🗸

FIRE AND AMBULANCE SERVICES PAGE 1 of TABLE 9A.3

Table 9A.3 Scope of 'fire service organisation' data provided by jurisdictions

		NSW	Vic	Qld	WA (a)	SA	Tas	ACT	NT
		UD FSP LMA (b)							
Table 9A.19	Reported road crash rescue incidents	🗸 🗸	🗸 🗸	√ x	√ x	√ x		√ x	✓ ✓
Table 9A.20	Reported road crash rescue extrications	🗸 🗸	🗸 🗸	√ x	✓ x	✓ x	√ x	✓ x	🗸 🗸
Table 9A.21	Prevention activities of fire service organisations	✓ ✓ ✓	< < <	< < <	✓ ✓ ✓	< < <	< < <	< < <	<b>✓ ✓ ✓</b>
Table 9A.22	Selected fire risk management/mitigation strategies	✓ ✓ ✓	✓ ✓ ✓	✓ ✓ ✓	✓ ✓ ✓	✓ ✓ ✓	< < <	< < <	<b>✓</b> ✓ ✓
Table 9A.25	Number of structure fires, by remoteness area	🗸 🗸	✓ ✓	✓ x	✓ x	✓ x	✓ ×	✓ x	🗸 🗸
Table 9A.26	Structure fire response times to structure fires, <i>including</i> call taking time, by remoteness area	🗸 🗸	🗸 🗸	✓ ×	🗸 x	✓ x	✓ x	✓ x	🗸 🗸
Table 9A.27	Structure fire response times to structure fires, excluding call taking time, by remoteness area	🗸 🗸	🗸 🗸	✓ x	✓ x	✓ x	✓ x	🗸 x	✓ ✓

**UD** = Umbrella department **FSP** = Fire service provider **LMA** = Land management agency

Source: State and Territory governments (unpublished).

<sup>(</sup>a) WA: DFES provides a wide range of emergency services under an integrated management structure. Data cannot be segregated by service and includes State Emergency Service and volunteer marine services as well as fire.

<sup>(</sup>b) NT provide data for Bushfires NT, but not other land management agencies

<sup>..</sup> Not applicable.

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2014-15										
Revenue										
Government grants										
Australian	\$m	4.1	_	4.1	4.6	3.3	1.6	_	0.5	18.3
State/Territory	\$m	168.4	458.0	76.7	55.7	1.7	4.7	63.4	38.2	866.7
Local	\$m	103.6	_	_	1.8	_	_	_	_	105.4
Total government grants	\$m	276.1	458.0	80.7	62.2	5.0	6.3	63.4	38.7	990.5
Levies										
On insurance companies	\$m	653.3	2.0	_	_	na	17.0	_	_	672.3
On property owners	\$m	_	588.0	435.5	289.7	198.1	36.8	_	_	1 548.1
Total levies	\$m	653.3	590.0	435.5	289.7	198.1	53.9	-	_	2 220.4
User charges	\$m	40.6	67.4	53.7	9.4	5.6	11.1	_	_	187.8
Miscellaneous revenue	\$m	49.0	17.9	52.1	3.9	3.3	2.7	4.8	_	133.7
Indirect government funding	\$m	_	5.2	_	_	_	_	_	_	5.2
Total revenue	\$m	1 019.0	1 138.6	622.1	365.2	212.1	73.9	68.2	38.7	3 537.7
Percent of total revenue										
Government grants	%	27.1	40.2	13.0	17.0	2.4	8.5	92.9	100.0	28.0
Levies	%	64.1	51.8	70.0	79.3	93.4	72.9	_	_	62.8
User charges	%	4.0	5.9	8.6	2.6	2.7	15.0	_	_	5.3
Miscellaneous revenue	%	4.8	1.6	8.4	1.1	1.5	3.6	7.1	_	3.8
Indirect government funds	%	_	0.5	_	_	_	_	_	_	0.1
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2013-14										
Revenue										
Government grants										
Australian	\$m	4.7	_	3.7	4.5	3.1	1.4	_	0.2	17.7
State/Territory	\$m	262.5	497.3	103.1	53.0	7.7	5.1	60.3	32.9	1 021.9
Local	\$m	105.3	_	_	0.9	_	_	_	_	106.2
Total government grants	\$m	372.5	497.3	106.8	58.4	10.7	6.6	60.3	33.1	1 145.8
Levies										
On insurance companies	\$m	658.1	5.7	_	_	_	18.0	_	_	681.7
On property owners	\$m	6.7	641.5	397.3	277.8	191.7	35.5	_	_	1 550.5
Total levies	\$m	664.8	647.2	397.3	277.8	191.7	53.5	_	_	2 232.3
User charges	\$m	36.5	48.4	51.0	7.9	6.3	13.0	_	_	163.0
Miscellaneous revenue	\$m	47.1	17.4	77.7	3.0	2.7	2.4	3.6	_	153.8
Indirect government funding	\$m	_	6.9	_	_	_	_	_	_	6.9
Total revenue	\$m	1 120.9	1 217.2	632.9	347.0	211.4	75.4	63.9	33.1	3 701.8
Percent of total revenue										
Government grants	%	33.2	40.9	16.9	16.8	5.1	8.7	94.3	100.0	31.0
Levies	%	59.3	53.2	62.8	80.1	90.7	70.9	_	_	60.3
User charges	%	3.3	4.0	8.1	2.3	3.0	17.2	_	_	4.4
Miscellaneous revenue	%	4.2	1.4	12.3	0.9	1.3	3.2	5.7	_	4.2
Indirect government funds	%	_	0.6	_	_	_	_	_	_	0.2
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2012-13										
Revenue										
Government grants										
Australian	\$m	4.4	3.0	5.0	6.6	3.3	1.5	_	0.2	23.9
State/Territory	\$m	228.0	484.0	99.6	95.8	_	17.1	58.6	47.5	1 030.7
Local	\$m	103.4	39.0	_	0.4	_	_	_	_	142.8
Total government grants	\$m	335.8	526.0	104.6	102.8	3.3	18.5	58.6	47.7	1 197.3
Levies										
On insurance companies	\$m	641.1	583.8	_	_	_	17.7	_	_	1 242.6
On property owners	\$m	8.9	5.6	358.6	258.6	172.9	34.6	_	_	839.2
Total levies	\$m	650.0	589.4	358.6	258.6	172.9	52.4	_	_	2 081.8
User charges	\$m	27.1	33.3	50.5	7.3	5.1	10.4	_	2.7	136.4
Miscellaneous revenue	\$m	33.4	31.1	6.4	5.4	2.6	4.8	4.5	_	88.2
Indirect government funding	\$m	_	3.5	_	_	_	_	_	_	3.5
Total revenue	\$m	1 046.2	1 183.3	520.1	374.2	184.0	86.0	63.1	50.4	3 507.3
Percent of total revenue										
Government grants	%	32.1	44.5	20.1	27.5	1.8	21.5	92.8	94.7	34.1
Levies	%	62.1	49.8	68.9	69.1	94.0	60.9	_	_	59.4
User charges	%	2.6	2.8	9.7	2.0	2.8	12.1	_	5.3	3.9
Miscellaneous revenue	%	3.2	2.6	1.2	1.4	1.4	5.5	7.2	_	2.5
Indirect government funds	%	_	0.3	_	_	_	_	_	_	0.1
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2011-12										
Revenue										
Government grants										
Australian	\$m	6.0	4.4	5.1	8.6	3.5	1.4	_	_	29.0
State/Territory	\$m	136.6	390.8	113.7	158.2	_	5.0	53.4	35.2	892.9
Local	\$m	106.2	39.9	_	1.4	_	_	_	_	147.5
Total government grants	\$m	248.9	435.1	118.9	168.2	3.5	6.4	53.4	35.2	1 069.4
Levies										
On insurance companies	\$m	686.9	690.2	_	_	_	18.3	_	_	1 395.5
On property owners	\$m	0.5	7.0	347.6	243.3	175.8	33.7	_	_	807.9
Total levies	\$m	687.5	697.2	347.6	243.3	175.8	52.1	_	_	2 203.4
User charges	\$m	28.0	37.4	56.0	6.4	5.4	10.3	10.8	2.7	157.0
Miscellaneous revenue	\$m	33.4	44.0	3.7	10.4	2.4	2.6	3.2	0.1	99.9
Indirect government funding	\$m	_	5.4	_	_	_	_	_	_	5.4
Total revenue	\$m	997.7	1 219.1	526.2	428.4	187.0	71.4	67.4	37.9	3 535.1
Percent of total revenue										
Government grants	%	24.9	35.7	22.6	39.3	1.9	8.9	79.2	92.7	30.3
Levies	%	68.9	57.2	66.0	56.8	94.0	72.9	_	_	62.3
User charges	%	2.8	3.1	10.6	1.5	2.9	14.4	16.1	7.0	4.4
Miscellaneous revenue	%	3.3	3.6	0.7	2.4	1.3	3.7	4.8	0.2	2.8
Indirect government funds	%	_	0.4	_	_	_	_	_	_	0.2
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2010-11										
Revenue										
Government grants										
Australian	\$m	0.8	8.3	8.8	7.6	3.3	1.3	_	_	30.2
State/Territory	\$m	192.9	360.0	118.8	164.3	_	5.1	40.4	28.4	909.9
Local	\$m	105.5	38.0	_	1.3	_	_	_	_	144.8
Total government grants	\$m	299.2	406.3	127.6	173.2	3.3	6.4	40.4	28.4	1 084.9
Levies										
On insurance companies	\$m	667.1	571.9	_	_	_	17.3	_	_	1 256.4
On property owners	\$m	0.6	5.8	333.0	232.3	165.9	33.3	_	_	770.8
Total levies	\$m	667.7	577.7	333.0	232.3	165.9	50.6	_	_	2 027.1
User charges	\$m	15.6	33.0	54.4	5.3	4.4	10.3	10.4	2.8	136.2
Miscellaneous revenue	\$m	34.8	42.2	5.0	9.5	2.9	1.6	1.7	0.1	97.9
Indirect government funding	\$m	_	4.3	_	_	_	_	_	_	4.3
Total revenue	\$m	1 017.3	1 063.5	519.9	420.3	176.6	68.9	52.5	31.3	3 350.4
Percent of total revenue										
Government grants	%	29.4	38.2	24.5	41.2	1.9	9.4	76.9	90.8	32.4
Levies	%	65.6	54.3	64.0	55.3	93.9	73.4	_	_	60.5
User charges	%	1.5	3.1	10.5	1.3	2.5	14.9	19.8	9.0	4.1
Miscellaneous revenue	%	3.4	4.0	1.0	2.3	1.7	2.3	3.2	0.2	2.9
Indirect government funds	%	_	0.4	_	_	_	_	_	_	0.1
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2009-10										
Revenue										
Government grants										
Australian	\$m	_	4.3	6.5	11.4	3.9	1.0	_	0.2	27.3
State/Territory	\$m	224.3	328.2	107.8	52.4	_	7.1	43.5	26.0	789.2
Local	\$m	94.0	38.3	_	1.0	_	_	_	_	133.3
Total government grants	\$m	318.3	370.9	114.3	64.8	3.9	8.0	43.5	26.2	949.8
Levies										
On insurance companies	\$m	578.0	591.5	_	_	_	19.0	_	_	1 188.4
On property owners	\$m	68.4	9.0	336.6	201.0	180.6	33.3	_	_	828.9
Total levies	\$m	646.3	600.5	336.6	201.0	180.6	52.3	_	_	2 017.3
User charges	\$m	15.6	47.3	42.3	4.4	4.2	12.9	10.3	2.5	139.4
Miscellaneous revenue	\$m	42.2	34.2	5.7	7.2	2.9	3.3	4.6	0.1	100.2
Indirect government funding	\$m	_	5.9	_	_	_	_	_	_	5.9
Total revenue	\$m	1 022.5	1 058.8	498.9	277.3	191.5	76.5	58.4	28.8	3 212.6
Percent of total revenue										
Government grants	%	31.1	35.0	22.9	23.4	2.0	10.5	74.5	90.9	29.6
Levies	%	63.2	56.7	67.5	72.5	94.3	68.4	_	_	62.8
User charges	%	1.5	4.5	8.5	1.6	2.2	16.8	17.6	8.8	4.3
Miscellaneous revenue	%	4.1	3.2	1.1	2.6	1.5	4.3	7.9	0.3	3.1
Indirect government funds	%	_	0.6	_	_	_	_	_	_	0.2
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2008-09										
Revenue										
Government grants										
Australian	\$m	_	3.9	5.2	6.0	4.3	0.7	0.9	0.3	21.3
State/Territory	\$m	184.8	756.4	85.0	51.0	_	5.5	45.4	24.6	1 152.8
Local	\$m	68.9	37.8	_	0.9	_	_	_	_	107.6
Total government grants	\$m	253.7	798.1	90.3	57.9	4.3	6.2	46.3	25.0	1 281.6
Levies										
On insurance companies	\$m	604.3	501.0	_	_	_	17.9	_	_	1 123.1
On property owners	\$m	101.2	9.7	324.3	193.7	185.1	32.6	_	_	846.6
Total levies	\$m	705.5	510.7	324.3	193.7	185.1	50.5	-	_	1 969.8
User charges	\$m	16.3	39.8	37.3	4.3	5.3	9.9	9.6	2.5	125.0
Miscellaneous revenue	\$m	46.5	18.3	7.6	9.9	5.4	2.6	1.0	_	91.3
Indirect government funding	\$m	_	12.7	_	_	_	_	1.1	_	13.8
Total revenue	\$m	1 022.0	1 379.6	459.5	265.8	200.1	69.1	58.0	27.5	3 481.4
Percent of total revenue										
Government grants	%	24.8	57.8	19.6	21.8	2.1	9.0	79.8	90.8	36.8
Levies	%	69.0	37.0	70.6	72.9	92.5	73.0	_	_	56.6
User charges	%	1.6	2.9	8.1	1.6	2.7	14.3	16.5	9.2	3.6
Miscellaneous revenue	%	4.5	1.3	1.7	3.7	2.7	3.8	1.8	0.1	2.6
Indirect government funds	%	_	0.9	_	_	_	_	1.9	_	0.4
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2007-08										
Revenue										
Government grants										
Australian	\$m	_	3.8	5.9	7.1	5.9	1.5	_	1.8	26.0
State/Territory	\$m	121.5	301.7	77.3	57.5	_	6.7	46.4	18.4	629.5
Local	\$m	76.6	37.9	_	4.3	_	_	_	_	118.8
Total government grants	\$m	198.0	343.5	83.2	68.9	5.9	8.2	46.4	20.1	774.2
Levies										
On insurance companies	\$m	620.6	478.4	_	_	_	17.6	_	_	1 116.6
On property owners	\$m	31.5	11.6	311.4	191.8	181.5	32.3	_	_	760.1
Total levies	\$m	652.1	490.0	311.4	191.8	181.5	49.9	-	_	1 876.7
User charges	\$m	15.7	37.3	31.6	5.2	6.2	8.1	10.0	2.3	116.4
Miscellaneous revenue	\$m	48.6	34.1	5.0	11.0	4.1	1.8	1.4	0.4	106.4
Indirect government funding	\$m	_	_	_	_	_	_	_	_	_
Total revenue	\$m	914.4	905.0	431.3	276.9	197.6	67.9	57.8	22.9	2 873.8
Percent of total revenue										
Government grants	%	21.7	38.0	19.3	24.9	3.0	12.0	80.3	88.0	26.9
Levies	%	71.3	54.1	72.2	69.3	91.8	73.5	_	_	65.3
User charges	%	1.7	4.1	7.3	1.9	3.1	11.9	17.4	10.3	4.0
Miscellaneous revenue	%	5.3	3.8	1.2	4.0	2.1	2.6	2.4	1.7	3.7
Indirect government funds	%	_	_	_	_	_	_	_	_	_
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2006-07										
Revenue										
Government grants										
Australian	\$m	_	8.6	6.0	5.7	0.7	0.6	_	0.4	22.0
State/Territory	\$m	210.0	477.1	71.4	73.5	0.4	8.6	44.3	23.5	908.8
Local	\$m	73.6	38.1	_	2.0	_	_	_	_	113.7
Total government grants	\$m	283.6	523.8	77.4	81.2	1.1	9.2	44.3	23.9	1 044.5
Levies										
On insurance companies	\$m	593.2	456.5	_	_	_	16.0	_	_	1 065.7
On property owners	\$m	27.7	11.0	312.2	181.0	172.3	30.5	_	_	734.7
Total levies	\$m	620.9	467.5	312.2	181.0	172.3	46.5	_	_	1 800.4
User charges	\$m	16.0	26.8	29.4	4.8	4.2	8.2	10.7	2.5	102.6
Miscellaneous revenue	\$m	39.3	84.6	7.2	15.2	4.0	2.2	7.3	1.0	160.8
Indirect government funding	\$m	_	_	_	_	_	_	0.3	_	0.3
Total revenue	\$m	959.8	1 102.7	426.1	282.3	181.6	66.2	62.5	27.3	3 108.6
Percent of total revenue										
Government grants	%	29.6	47.5	18.2	28.8	0.6	13.9	70.8	87.3	33.6
Levies	%	64.7	42.4	73.3	64.1	94.9	70.3	_	_	57.9
User charges	%	1.7	2.4	6.9	1.7	2.3	12.4	17.1	9.0	3.3
Miscellaneous revenue	%	4.1	7.7	1.7	5.4	2.2	3.4	11.7	3.6	5.2
Indirect government funds	%	_	_	_	_	_	_	0.4	_	_
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Table 9A.4 Major sources of fire service organisations revenue (2014-15 dollars) (a), (b)

			_		-					
		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)	(c)	(c)	(c)		(c)	(c)	
2005-06										
Revenue										
Government grants										
Australian	\$m	_	8.8	5.4	1.7	1.9	0.4	_	0.7	18.9
State/Territory	\$m	122.6	99.2	65.0	31.9	_	4.5	52.8	22.6	398.6
Local	\$m	73.7	37.8	_	_	_	_	_	_	111.4
Total government grants	\$m	196.3	145.8	70.4	33.6	1.9	5.0	52.8	23.3	529.0
Levies										
On insurance companies	\$m	583.8	441.6	_	_	_	18.6	_	_	1 044.0
On property owners	\$m	24.0	11.6	306.8	134.9	171.1	28.1	_	_	676.6
Total levies	\$m	607.8	453.2	306.8	134.9	171.1	46.7	-	_	1 720.6
User charges	\$m	16.0	23.7	23.2	3.0	2.8	7.9	10.7	2.4	89.6
Miscellaneous revenue	\$m	35.4	42.7	7.9	2.7	5.1	1.4	0.1	1.0	96.3
Indirect government funding	\$m	_	_	_	_	_	_	2.8	_	2.8
Total revenue	\$m	855.5	665.4	408.3	174.1	180.8	61.0	66.3	26.8	2 438.2
Percent of total revenue										
Government grants	%	22.9	21.9	17.2	19.3	1.0	8.2	79.6	87.1	21.7
Levies	%	71.0	68.1	75.1	77.5	94.6	76.6	_	_	70.6
User charges	%	1.9	3.6	5.7	1.7	1.5	12.9	16.1	9.1	3.7
Miscellaneous revenue	%	4.1	6.4	1.9	1.5	2.8	2.3	0.1	3.8	3.9
Indirect government funds	%	_	_	_	_	_	_	4.2	_	0.1
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

<sup>(</sup>a) Time series financial data are adjusted to 2014-15 dollars using the General Government Final Consumption Expenditure (GGFCE) chain price deflator (2014-15 = 100) (table 9A.51). See table 2A.48 and chapter 2 (sections 2.5-6) for more information.

NSW: From 2009-10 data include funding for the Department of Environment, Climate Change and Water.

<sup>(</sup>b) Figures vary from year to year as a result of abnormal expenditure related to the response to specific major emergencies.

<sup>(</sup>c) Jurisdiction notes:

Table 9A.4	Major sources of fire so	ervice organisations revenue	(2014-15 dollars) (a), (b)

 VSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
(c)	(c)	(c)	(c)	(c)		(c)	(c)	

- Vic: The proportions of principal funding contributions from State Governments, local governments and insurance companies are established in legislation. The actual proportions received may vary as a result of the level of income from user charges and other income sources.
  - 2008-09 data include a significant increase in government grants due to emergency funding arising from the Black Saturday Bushfires.
  - From 2006-07 data include funding and expenditure for the Department of Environment and Primary Industries (DEPI) (formerly Department of Sustainability and Environment (DSE)).
- Qld: Revenue represents funding for the Queensland Fire and Emergency Services (excluding State Emergency Services costs) following the transfer of some functions and assets to the Public Safety Business Agency on 1 November 2013. The 2014-15 results reflect the first full year following the transfers. In addition, from 1 July 2014 the Office of the Inspector General Emergency Management is no longer part of the Queensland Fire and Emergency Services and is now reported as a seperate entity. The 2014-15 results are therefore not comparable to prior years.
- WA: DFES provides a wide range of emergency services under an integrated management structure. From 2006-07 data are not segregated by service and include funding related to delivery of other emergency services including SES and volunteer marine rescue. Revenue also includes funding related to Wildfire Suppression and Western Australia Natural Disaster Relief and Recovery Arrangements (WANDRRA). WANDRRA function was administered item in 2013-14, and the function was transferred to other state government agency on 1 April 2014. As consequence, administered income of \$12.423m related to WANDRRA was not included in DFES 2013-14 financial statements. Fire levies include a property-based Emergency Services Levy (ESL) introduced in 2003. The ESL provides for the delivery of all emergency services except for volunteer marine rescue.
  - Data cannot be segregated by service and includes State Emergency Service and volunteer marine services as well as fire. Data for the Department of Parks and Wildlife are not included.
- SA: The major source of revenue for the SA Metropolitan Fire Service and SA Country Fire Service is the Community Emergency Services Fund, which is funded by the Emergency Services Levy.
  - Commonwealth government revenue is for aerial firefighting and the protection of Commonwealth properties.
- ACT: In 2012-13 revenue previously reported as Fire User Charges has been allocated to Government Grant due to changes in underlying service arrangement.

  In 2006-07 funding is included under miscellaneous revenue for the placement of an Ericson sky crane in the ACT as part of the National Aerial Firefighting Strategy.
  - The increase from 2004-05 to 2005-06 is due to a significant upgrade of Emergency Services Communications systems and inclusion of Joint Emergency Services Training Costs.
- NT: 2013-14 data include a Bushfires NT Commonwealth grant of \$200k from NAFC to subsidise aerial firefighting costs.
  - Nil or rounded to zero.

Source: State and Territory Governments (unpublished); ABS 2015, Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0, Canberra (table 2A.48).

Table 9A.5 Fire service organisations human resources (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(c)	(c)	(c)	(c)	(c)			(c)	
2014-15										
Firefighting workforce										
Permanent	FTE	3 415	3 571	2 214	963	862	306	351	218	11 900
Part time & other	FTE	699	1 161	298	139	22	_	_	65	2 384
By age group										
Under 30 years	FTE	299	246	167	101	80	15	22	17	947
30–39 years	FTE	969	727	553	304	240	72	82	69	3 016
40-49 years	FTE	1 501	712	841	351	313	127	115	79	4 038
50-59 years	FTE	1 169	972	791	310	366	81	122	44	3 855
60 or over years	FTE	175	147	160	37	80	11	10	13	633
Total	FTE	4 114	2 804	2 512	1 102	1 079	306	350	222	12 489
Support workforce	FTE	1 254	1 893	532	403	182	176	105	24	4 569
Total	FTE	5 368	4 697	3 044	1 505	1 261	482	455	246	18 853
Firefighting workforce, attrition	%	1.4	-	3.3	2.5	2.9	2.0	3.1	8.1	1.7
Firefighting workforce (proportion of total)	%	76.6	59.7	82.5	73.2	85.5	63.5	76.9	90.2	66.2
Volunteers (b)	no.	82 835	57 461	35 000	28 941	13 836	5 045	1 538	1 396	226 052
2013-14										
Firefighting workforce										
Permanent	FTE	3 432	3 484	2 238	1 120	868	295	359	215	12 011
Part time & other	FTE	507	2 044	205	_	22	_	_	16	2 794
Total	FTE	3 939	5 528	2 443	1 120	890	295	359	231	14 805
Support workforce	FTE	1 277	1 841	500	309	178	172	90	26	4 393
Total	FTE	5 216	7 369	2 943	1 429	1 068	467	449	257	19 198
Firefighting workforce (proportion of total)	%	75.5	75.0	83.0	78.4	83.3	63.2	80.0	89.9	77.1

FIRE AND AMBULANCE SERVICES PAGE 1 of TABLE 9A.5

Table 9A.5 Fire service organisations human resources (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(c)	(c)	(c)	(c)	(c)			(c)	
Volunteers (b)	no.	80 761	57 243	35 000	29 072	13 600	5 021	1 621	1 409	223 727
2012-13										
Firefighting workforce										
Permanent	FTE	3 450	3 372	2 272	1 111	874	286	361	214	11 940
Part time & other	FTE	_	1 597	206	_	146	_	_	15	1 964
Total	FTE	3 450	4 969	2 478	1 111	1 020	286	361	229	13 904
Support workforce	FTE	1 246	1 780	623	337	52	166	77	23	4 304
Total	FTE	4 696	6 749	3 101	1 448	1 072	452	438	252	18 208
Firefighting workforce (proportion of total)	%	73.5	73.6	79.9	76.7	95.1	63.3	82.4	90.9	76.4
Volunteers (b)	no.	79 176	57 608	35 000	29 037	13 660	4 872	1 599	1 392	222 344
2011-12										
Firefighting workforce										
Permanent	FTE	3 498	3 202	2 262	1 123	889	275	351	202	11 802
Part time & other	FTE	499	998	202	_	140	_	_	12	1 851
Total	FTE	3 997	4 200	2 464	1 123	1 029	275	351	214	13 653
Support workforce	FTE	1 328	1 510	737	299	52	173	62	40	4 201
Total	FTE	5 325	5 710	3 201	1 422	1 081	448	413	254	17 854
Firefighting workforce (proportion of total)	%	75.1	73.6	77.0	79.0	95.2	61.4	85.0	84.3	76.5
Volunteers (b)	no.	70 246	57 843	34 000	28 354	14 127	4 823	1 382	1 123	211 898
2010-11										
Firefighting workforce										
Permanent	FTE	3 516	3 021	2 262	1 052	865	274	305	201	11 496
Part time & other	FTE	507	890	160	24	140	_	_	12	1 733
Total	FTE	4 023	3 911	2 422	1 076	1 005	274	305	213	13 229
REPORT ON GOVERNMENT SERVICES 2016										AMBULANCE SERVICES of TABLE 9A.5

Table 9A.5 Fire service organisations human resources (a)

	Unit	NSW (c)	Vic (c)	Q <i>ld</i> (c)	<i>WA</i> (c)	SA (c)	Tas	ACT	<i>NT</i> (c)	Aust
Support workforce	FTE	1 321	1 526	777	332	(c) 45	190	78	47	4 316
Total	FTE	5 344	5 437	3 199	1 408	1 050	464	383	260	17 545
Firefighting workforce (proportion of total)	%	75.3	71.9	75.7	76.4	95.7	59.1	79.6	81.9	75.4
Volunteers (b)	no.	77 410	58 063	34 000	28 922	14 583	4 777	1 233	777	219 765
2009-10										
Firefighting workforce										
Permanent	FTE	3 498	2 864	2 215	1 003	873	280	294	198	11 225
Part time & other	FTE	515	1 181	158	25	147	_	_	9	2 035
Total	FTE	4 013	4 045	2 373	1 028	1 020	280	294	207	13 260
Support workforce	FTE	1 196	1 419	759	296	44	180	83	41	4 018
Total	FTE	5 209	5 464	3 132	1 324	1 064	460	377	248	17 278
Firefighting workforce (proportion of total)	%	77.0	74.0	75.8	77.6	95.9	60.9	78.0	83.5	76.7
Volunteers (b)	no.	77 422	59 180	34 000	29 343	15 064	4 861	1 228	750	221 848
2008-09										
Firefighting workforce										
Permanent	FTE	3 485	3 580	2 195	970	852	267	296	184	11 829
Part time & other	FTE	497	1 107	158	26	124	_	_	10	1 923
Total	FTE	3 982	4 687	2 353	996	976	267	296	194	13 752
Support workforce	FTE	1 088	1 593	726	308	47	193	84	43	4 082
Total	FTE	5 070	6 280	3 079	1 304	1 023	460	380	237	17 833
Firefighting workforce (proportion of total)	%	78.5	74.6	76.4	76.4	95.4	58.0	77.9	81.9	77.1
Volunteers (b)	no.	75 436	58 943	34 000	27 249	15 415	4 859	1 230	540	217 672
2007-08										

FIRE AND AMBULANCE SERVICES PAGE **3** of TABLE 9A.5

Table 9A.5 Fire service organisations human resources (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(c)	(c)	(c)	(c)	(c)			(c)	
Firefighting workforce										
Permanent	FTE	3 443	3 340	2 193	919	813	296	276	176	11 456
Part time & other	FTE	483	845	165	54	125	_	53	10	1 735
Total	FTE	3 926	4 185	2 358	973	938	296	329	186	13 191
Support workforce	FTE	1 406	2 047	665	277	46	180	36	43	4 700
Total	FTE	5 332	6 232	3 023	1 250	984	476	365	229	17 891
Firefighting workforce (proportion of total)	%	73.6	67.2	78.0	77.8	95.3	62.2	90.1	81.2	73.7
Volunteers (b)	no.	75 474	58 362	35 000	27 457	15 744	4 909	1 367	540	218 853
2006-07										
Firefighting workforce										
Permanent	FTE	3 406	3 274	2 076	896	779	287	291	176	11 185
Part time & other	FTE	481	845	163	36	126	_	_	6	1 657
Total	FTE	3 887	4 119	2 239	932	905	287	291	182	12 842
Support workforce	FTE	996	2 008	732	278	40	170	81	41	4 346
Total	FTE	4 883	6 127	2 971	1 210	945	457	372	223	17 188
Firefighting workforce (proportion of total)	%	79.6	67.2	75.4	77.0	95.8	62.8	78.2	81.6	74.7
Volunteers (b)	no.	76 302	59 509	36 000	27 305	15 517	4 978	1 261	550	221 422
2005-06										
Firefighting workforce										
Permanent	FTE	3 312	3 307	2 056	870	773	280	289	176	11 063
Part time & other	FTE	479	616	165	36	93	_	_	6	1 395
Total	FTE	3 791	3 923	2 221	906	866	280	289	182	12 458
Support workforce	FTE	1 156	2 077	689	308	36	166	93	37	4 562

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Table 9A.5 Fire service organisations human resources (a)

	Unit	NSW (c)	Vic (c)	Qld (c)	WA (c)	SA (c)	Tas	ACT	NT (c)	Aust
Total	FTE	4 947	6 000	2 910	1 214	902	446	382	219	17 020
Firefighting workforce (proportion of total)	%	76.6	65.4	76.3	74.6	96.0	62.8	75.7	83.1	73.2
Volunteers (b)	no.	76 195	58 849	41 324	26 890	15 120	4 765	1 018	539	224 700

(a) Human resource data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.

(b) Numbers for Volunteer firefighters include volunteer fire support staff.

(c) Jurisdiction notes:

NSW: In 2013-14, the change in the breakdown of volunteers (firefighting workforce and fire support workforce) has been improved through the availability

of better data to differentiate the roles undertaken by NSW Rurual Fire Service volunteers.

Vic: 2014-15 workforce by age group data do not include Victoria's land management agency, DELWP.

In 2012-13, the former Department of Environment and Primary Industries (DEPI) engaged a large number of firefighters from Parks Victoria, and from interstate and overseas to manage significant campaign fires.

In 2007-08, DEPI (formerly Department of Sustainability and Environment (DSE)) figures have been derived from 2006-07 DEPI figures, due to data quality issues.

From 2005-06, data include Victoria's land management agency, DELWP, or its predecessors.

Qld: It is not possible to compare 2013-14 data (support workforce and total workforce [firefighting and support]) to that previously provided by the former

Queensland Fire and Rescue Service as a division of the former Department of Community Safety. Effective 1 November 2013, Queensland Fire and Emergency Services (QFES) was established as an independent department encompassing fire and rescue, emergency management, the

State Emergency Service and the Rural Fire Service.

Firefighting personnel include senior fire officers, Assistant Commissioners, the Deputy Commissioner and the Commissioner.

Volunteer firefighter data for Queensland include all recorded members of Rural Fire Brigades, including those fulfilling operational and support

roles.

Volunteers data include all recorded members of Rural Fire Brigades fulfilling both operational and support roles. The decrease in numbers of volunteer firefighters from 2005-06 to 2008-09 is a result of data cleansing efforts such as removing duplicate records, incorrect records and those which were no longer current. State Emergency Service volunteer numbers have been reported in State Emergency Service data (sector overview

D).

From 2006-07 support staff data include all non-fire specific staff, including those that support SES and Volunteer Marine Rescue. Volunteer

firefighter data include volunteers from local government bush fire brigades, Volunteer Fire and Rescue brigades, Volunteer Fire Services and multi-

skilled Volunteer Emergency Services. Data for the Department of Parks and Wildlife are not included.

WA:

Table 9A.5 Fire service organisations human resources (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(c)	(c)	(c)	(c)	(c)			(c)	
SA:	Total firefighting staff by age a	are for actual r	numbers (not l	TE) and are	for MFS only	. Non-firefigh	nting staff and	d all paid staff	are for MFS	and CFS
	(FTE numbers) and fire service	e training, build	ding inspection	and fire caus	se investigator	y staff.				

NT:

Numbers reflect NT Fire and Rescue Service and Bushfires NT uniformed, non-uniformed and volunteers. In 2012-13 Bushfires NT conducted an audit of volunteer workforce and identified a number of persons who act in voluntary support roles who were previously counted as volunteer firefighters. In 2013-14 NT Fire and Rescue Service did not distinguish between volunteer firefighters and volunteer fire support staff therefore all volunteers have been shown as firefighters.

- Nil or rounded to zero.

Source:

State and Territory governments (unpublished).

Table 9A.6 Fire death rate (a), (b), (c), (d)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust (e)
Fire deaths									
Annual rate				per mi	Ilion peop	ole			
2013	4.5	4.0	4.9	2.8	4.8	_	2.6	4.2	4.3
2012	4.4	3.7	3.3	7.8	6.0	7.8	_	42.6	4.3
2011	6.5	4.3	6.0	5.9	6.1	11.7	16.3	34.6	5.6
2010	4.8	4.8	4.3	5.7	1.8	2.0	_	17.4	4.4
2009	4.8	36.7	3.7	4.9	8.7	19.8	11.3	17.7	12.4
2008	4.3	6.7	5.0	7.8	9.4	18.1	_	4.5	5.6
2007	3.5	5.8	6.1	6.2	7.0	8.1	5.8	32.7	5.4
2006	5.0	5.3	5.7	5.4	11.6	2.0	3.0	_	5.1
2005	9.3	5.4	4.6	3.5	8.4	10.3	9.1	9.7	6.8
2004	5.9	4.7	3.9	3.0	7.9	22.8	3.0	4.9	5.5
2003	6.9	6.0	4.8	10.2	10.5	14.6	3.1	5.0	7.3
2002	7.4	7.1	6.6	5.2	7.9	16.9	3.1	9.9	7.2
2001	4.1	3.4	4.8	6.8	10.6	19.0	9.3	5.0	5.4
2000	8.5	6.4	9.7	3.7	6.0	2.1	12.6	5.0	7.7
1999	5.8	5.6	9.6	2.7	10.7	6.3	9.5	20.4	6.6
1998	8.9	6.7	8.2	7.1	7.4	25.3	_	5.2	8.3
1997	6.4	6.8	9.5	9.5	11.5	16.8	9.7	21.1	8.0
1996	11.3	8.8	6.7	4.5	10.2	6.3	_	21.7	8.9
1995	9.5	8.2	13.0	6.3	14.3	12.6	_	_	9.9
1994	8.3	9.2	11.1	5.9	15.0	14.8	19.9	_	9.7
1993	10.3	8.7	6.8	7.1	10.3	6.4	10.0	17.5	8.8
1992	10.1	11.2	6.0	4.2	17.9	14.9	_	29.7	10.0
1991	13.6	10.4	7.8	4.3	14.5	10.7	_	18.1	10.6
1990	6.0	8.2	6.9	11.8	9.1	10.8	_	18.3	7.7
1989	10.7	10.2	13.1	3.2	12.0	6.6	18.1	_	10.4
1988	9.6	11.3	5.8	7.2	12.1	13.3	_	18.9	9.6
1987	12.8	12.1	6.0	6.7	6.5	6.7	_	19.0	10.1
1986	11.6	11.1	9.9	8.9	8.7	11.2	_	19.4	10.6
1985	13.2	13.3	10.9	7.8	11.7	_	11.9	_	11.9
1984	10.0	8.8	10.3	15.1	8.1	13.7	_	-	9.9
Annual rate (3 ye	ear average)			per mi	illion peop	ole			
2011 to 2013	5.1	4.0	4.7	5.5	5.6	6.5	6.2	26.9	4.7
2010 to 2012	5.2	4.3	4.5	6.5	4.7	7.2	5.4	31.6	4.8
2009 to 2011	5.4	15.1	4.7	5.5	5.5	11.1	9.2	23.3	7.5
2008 to 2010	4.6	16.0	4.3	6.1	6.6	13.2	3.8	13.3	7.5
2007 to 2009	4.2	16.6	4.9	6.3	8.4	15.4	5.7	18.2	7.9
2006 to 2008	4.3	5.9	5.6	6.5	9.3	9.5	2.9	12.4	5.4
2005 to 2007	5.9	5.5	5.5	5.0	9.0	6.8	5.9	14.3	5.8
2004 to 2006	6.7	5.1	4.8	4.0	9.3	11.7	5.0	4.9	5.8
2003 to 2005	7.4	5.3	4.4	5.6	8.9	15.9	5.1	6.6	6.5
2002 to 2004	6.7	5.9	5.1	6.1	8.8	18.1	3.1	6.6	6.7
2001 to 2003	6.2	5.5	5.4	7.4	9.7	16.8	5.1	6.6	6.6

FIRE AND AMBULANCE SERVICES PAGE 1 of TABLE 9A.6

Table 9A.6 Fire death rate (a), (b), (c), (d)

	1/0//								
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust (e)
2000 to 2002	6.7	5.6	7.0	5.3	8.2	12.7	8.3	6.6	6.8
1999 to 2001	6.1	5.1	8.0	4.4	9.1	9.2	10.5	10.1	6.6
1998 to 2000	7.7	6.2	9.2	4.5	8.1	11.3	7.4	10.2	7.5
1997 to 1999	7.0	6.4	9.1	6.4	9.9	16.2	6.4	15.6	7.6
1996 to 1998	8.9	7.4	8.1	7.0	9.7	16.2	3.2	15.9	8.4
1995 to 1997	9.1	7.9	9.7	6.8	12.0	11.9	3.2	14.4	8.9
1994 to 1996	9.7	8.7	10.2	5.6	13.2	11.2	6.5	7.4	9.5
1993 to 1995	9.4	8.7	10.3	6.4	13.2	11.3	9.9	5.7	9.5
1992 to 1994	9.6	9.7	8.0	5.8	14.4	12.0	10.0	15.5	9.5
1991 to 1993	11.3	10.1	6.8	5.2	14.2	10.6	3.4	21.8	9.8
1990 to 1992	9.9	10.0	6.9	6.7	13.8	12.2	_	22.1	9.5
1989 to 1991	10.1	9.6	9.2	6.4	11.9	9.4	5.9	12.2	9.6
1988 to 1990	8.8	9.9	8.6	7.4	11.0	10.2	6.0	12.4	9.2
1987 to 1989	11.1	11.2	8.4	5.6	10.2	8.9	6.1	12.5	10.0
1986 to 1988	11.3	11.5	7.2	7.6	9.1	10.4	_	19.1	10.1
1985 to 1987	12.5	12.2	8.9	7.8	8.9	6.0	3.9	13.0	10.9
1984 to 1986	11.6	11.1	10.4	10.5	9.5	8.3	4.0	6.7	10.8
Annual fire death	hs			n	umber				
2013	33	23	23	7	8	_	1	1	99
2012	32	21	15	19	10	4	_	10	98
2011	47	24	27	14	10	6	6	8	126
2010	34	26	19	13	3	1	_	4	98
2009	34	197	16	11	14	10	4	4	269
2008	30	35	21	17	15	9	_	1	120
2007	24	30	25	13	11	4	2	7	113
2006	34	27	23	11	18	1	1	_	104
2005	62	27	18	7	13	5	3	2	138
2004	39	23	15	6	12	11	1	1	110
2003	46	29	18	20	16	7	1	1	143
2002	49	34	24	10	12	8	1	2	141
2001	27	16	17	13	16	9	3	1	104
2000	55	30	34	7	9	1	4	1	146
1999	37	26	33	5	16	3	3	4	125
1998	56	31	28	13	11	12	_	1	155
1997	40	31	32	17	17	8	3	4	147
1996	70	40	22	8	15	3	_	4	163
1995	58	37	42	11	21	6	_	_	178
1994	50	41	35	10	22	7	6	_	172
1993	62	39	21	12	15	3	3	3	156
1992	60	50	18	7	26	7	_	5	175
1991	80	46	23	7	21	5	_	3	183
1990	35	36	20	19	13	5	_	3	132
1990									
1989	62	44	37	5	17	3	5	_	175

Table 9A.6 Fire death rate (a), (b), (c), (d)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust (e)
1987	72	51	16	10	9	3	_	3	165
1986	64	46	26	13	12	5	_	3	170
1985	72	55	28	11	16	_	3	_	188
1984	54	36	26	21	11	6	_	_	155

- (a) Data for 2013 are preliminary and subject to a revisions process. Data for 2012 and 2011 have been subject to revisions. See Causes of Death, Australia (Cat. no. 3303.0). Cells in this table have been randomly adjusted to avoid the release of confidential data. Where necessary, totals have been adjusted separately to the component cells and totals are not necessarily the sum of the component cells.
- (b) Fire deaths are coded according to the International Classification of Diseases (ICD) and Related Health Problems Revision 10 (ICD-10) and include ICD fire death codes Exposure (X00-X09) plus X76, X97 and Y26. Fire deaths data are reported by the State or Territory of the deceased's usual residence, and by the year the death was registered.
- (c) Population data used to derive rates are as at 30 June. Estimated Resident Population (ERP) data for 1983 to 2011 are final, based on the 2011 Census of Population and Housing. Estimates for 2012 onwards are preliminary. See chapter 2 (table 2A.1) for details.
- (d) The small number of deaths means it is difficult to establish patterns and provide detailed analysis.
- (e) Includes Other Territories.
  - Nil or rounded to zero.

Source: ABS 2015, Causes of Death, Australia, Cat. no. 3303.0; ABS 2015, Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.1).

Table 9A.7 Fire deaths (a), (b), (c), (d)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust (e)
2013										
Deaths from smoke, fire	and flames	, due to:								
Exposure	no.	22	14	8	5	6	_	_	1	56
Intentional self-harm	no.	5	5	15	1	1	_	1	_	33
Assault	no.	4	_	_	_	_	_	_	_	1
Undetermined intent	no.	2	4	_	1	1	_	_	_	9
Total	no.	33	23	23	7	8	-	1	1	99
2012										
Deaths from smoke, fire	and flames	, due to:								
Exposure	no.	23	11	8	11	4	_	_	4	56
Intentional self-harm	no.	6	6	5	6	2	2	_	3	28
Assault	no.	1	2	_	_	4	_	_	3	7
Undetermined intent	no.	2	2	2	2	_	2	_	_	7
Total	no.	32	21	15	19	10	4	-	10	98
2011										
Deaths from smoke, fire	and flames	, due to:								
Exposure	no.	27	12	21	10	5	3	3	3	81
Intentional self-harm	no.	7	6	3	4	3	3	3	4	21
Assault	no.	11	3	3	_	_	_	_	_	14
Undetermined intent	no.	2	3	_	_	2	_	_	1	10
Total	no.	47	24	27	14	10	6	6	8	126
2010										
Deaths from smoke, fire	and flames	, due to:								
Exposure	no.	26	18	10	12	3	_	_	4	71
Intentional self-harm	no.	5	6	6	_	_	1	_	_	19
Assault	no.	_	2	_	_	_	_	_	_	2
Undetermined intent	no.	3	_	3	1	_	_	_	_	6
Total	no.	34	26	19	13	3	1	_	4	98

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Table 9A.7 Fire deaths (a), (b), (c), (d)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust (e)
2009										
Deaths from smoke, fire	and flames	s, due to:								
Exposure	no.	19	183	14	4	4	4	4	4	227
Intentional self-harm	no.	8	7	2	3	6	3	_	_	25
Assault	no.	4	_	_	4	4	_	_	_	6
Undetermined intent	no.	3	7	_	_	_	3	_	_	11
Total	no.	34	197	16	11	14	10	4	4	269
2008										
Deaths from smoke, fire	and flames	s, due to:								
Exposure	no.	23	20	15	14	5	6	_	1	84
Intentional self-harm	no.	2	9	6	3	3	3	_	_	22
Assault	no.	_	_	_	_	4	_	_	_	1
Undetermined intent	no.	5	6	_	_	3	_	_	_	13
Total	no.	30	35	21	17	15	9	-	1	120
2007										
Deaths from smoke, fire	and flames	, due to:								
Exposure	no.	17	21	8	10	9	2	_	5	72
Intentional self-harm	no.	5	5	12	1	2	2	2	_	28
Assault	no.	_	_	3	_	_	_	_	_	2
Undetermined intent	no.	2	4	2	2	_	_	_	2	11
Total	no.	24	30	25	13	11	4	2	7	113
2006										
Deaths from smoke, fire	and flames	s, due to:								
Exposure	no.	24	15	14	1	8	1	1	_	68
Intentional self-harm	no.	4	5	7	4	4	_	_	_	18
Assault	no.	3	4	1	2	2	_	_	_	10
Undetermined intent	no.	3	3	1	4	4	_	_	_	8
Total	no.	34	27	23	11	18	1	1	_	104

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Table 9A.7 Fire deaths (a), (b), (c), (d)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust (e)
2005										
Deaths from smoke, fire	and flames	s, due to:								
Exposure	no.	48	21	12	6	12	2	2	1	109
Intentional self-harm	no.	13	2	5	1	4	_	_	_	23
Assault	no.	_	3	_	_	_	2	_	_	np
Undetermined intent	no.	4	1	2	_	_	_	_	_	4
Total	no.	62	27	18	7	13	5	3	2	138
2004										
Deaths from smoke, fire	and flames	s, due to:								
Exposure	no.	33	14	12	6	8	10	1	3	86
Intentional self-harm	no.	3	9	3	_	3	1	1	_	21
Assault	no.	4	_	_	_	_	_	_	_	np
Undetermined intent	no.	1	_	3	_	_	_	_	_	np
Total	no.	39	23	15	6	12	11	1	1	110

- (a) Data for 2013 are preliminary and subject to a revisions process. Data for 2012 and 2011 have been subject to revisions. See Causes of Death, Australia (Cat. no. 3303.0) Technical Note: Causes of Death Revisions. Cells in this table have been randomly adjusted to avoid the release of confidential data. Where necessary, totals have been adjusted separately to the component cells and totals are not necessarily the sum of the component cells.
- (b) Fire deaths are coded according to the ICD and Related Health Problems Revision 10 (ICD-10) and include ICD fire death codes Exposure (X00-X09) plus X76, X97 and Y26. Fire deaths data are reported by the State or Territory of the deceased's usual residence, and by the year the death was registered.
- (c) Population data used to derive rates are as at 30 June. Estimated Resident Population (ERP) data for 1983 to 2011 are final, based on the 2011 Census of Population and Housing. Estimates for 2012 onwards are preliminary. See chapter 2 (table 2A.1) for details.
- (d) The small number of deaths means it is difficult to establish patterns and provide detailed analysis.
- (e) Includes Other Territories.
  - Nil or rounded to zero.
     np Not published.

Source: ABS 2015, Causes of Death, Australia, Cat. no. 3303.0; ABS 2015, Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.1).

Table 9A.8 Landscape fire deaths (a), (b), (c), (d)

Landscape fire death Annual rate 2014-15	ıs								
2014-15				per mil	lion peop	ole			
201110	_	_	_	_	1.2	_	_	_	0.1
2013-14	0.3	0.2	_	0.4	_	_	_	_	0.2
2012-13	_	0.9	_	1.2	_	2.0	_	_	0.4
2011-12	_	0.2	0.2	_	_	_	_	_	0.1
2010-11	0.3	_	_	0.4	_	_	_	_	0.1
2009-10	0.1	0.2	_	_	_	_	_	_	0.1
2008-09	0.1	33.5	_	_	_	_	_	_	8.3
2007-08	_	0.4	_	1.4	0.6	_	_	4.6	0.3
2006-07	0.1	0.2	_	0.5	_	2.0	_	_	0.2
2005-06	0.4	8.0	_	_	_	_	_	_	0.3
2004-05	_	_	_	_	5.9	_	_	_	0.4
2003-04	_	_	_	1.0	_	_	_	_	0.1
2002-03	0.5	0.2	0.3	1.0	_	_	12.3	5.0	0.6
2001-02	_	0.2	0.3	_	_	_	_	_	0.1
2000-01	0.2	_	_	_	_	_	_	5.0	0.1
1999-00	0.6	_	_	_	_	_	_	_	0.2
1998-99	_	1.1	_	_	_	_	_	_	0.3
1997-98	0.6	_	0.3	0.6	_	_	_	_	0.3
1996-97	_	0.7	_	_	_	_	_	_	0.2
1995-96	-	0.2	-	_	-	_	_	_	0.1
1994-95	_	_	_	_	_	_	_	_	-
1993-94	0.7	0.2	_	_	_	_	_	_	0.3
1992-93	_	-	_	_	_	_	_	_	_
1991-92	0.3	-	0.3	_	_	_	_	_	0.2
1990-91	_	-	_	_	_	_	_	_	_
1991-92	_	_	_	_	0.7	_	_	_	0.1
1988-89	0.2	-	_	_	_	_	_	_	0.1
1987-88	_	_	_	_	_	_	_	_	_
1986-87	0.5	-	_	_	_	_	_	_	0.2
1985-86	0.2	_	-	_	-	-	_	_	0.1
Total landscape fire	deaths			n	umber				
2014-15	_	_	_	_	2	_	_	_	2
2013-14	2	1	_	1	_	_	_	_	4
2012-13	_	5	_	3	_	1	_	_	9
2011-12	_	1	1	_	_	_	_	_	2
2010-11	2	_	_	1	_	_	_	_	3
2009-10	1	1	_	_	_	_	_	_	2
2008-09	1	178	-	_	_	_	_	_	179

Table 9A.8 Landscape fire deaths (a), (b), (c), (d)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2007-08	_	2	_	3	1	_	_	1	7
2006-07	1	1	_	1	_	1	_	_	4
2005-06	3	4	_	_	_	_	_	_	7
2004-05	_	_	_	_	9	_	_	_	9
2003-04	_	_	_	2	_	_	_	_	2
2002-03	3	1	1	2	_	_	4	1	12
2001-02	_	1	1	_	_	_	_	_	2
2000-01	1	_	_	_	_	_	_	1	2
1999-00	4	_	_	_	_	_	_	_	4
1998-99	_	5	_	_	_	_	_	_	5
1997-98	4	_	1	1	_	_	_	_	6
1996-97	_	3	_	_	_	_	_	_	4
1995-96	_	1	-	_	-	-	-	_	1
1994-95	_	_	_	_	_	_	_	_	_
1993-94	4	1	_	_	_	_	_	_	5
1992-93	_	_	_	_	_	_	_	_	_
1991-92	2	_	1	_	_	_	_	_	3
1990-91	_	_	_	_	_	_	_	_	_
1991-92	_	_	_	_	1	_	_	_	1
1988-89	1	_	_	_	_	_	_	_	1
1987-88	_	_	_	_	_	_	_	_	_
1986-87	3	_	_	_	_	_	_	_	3
1985-86	1	_	_			_		_	1

- (a) The small number of deaths means it is difficult to establish patterns and provide detailed analysis.
- (b) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 1984 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.
- (c) Data may be subject to a revision process as new or amended information is made available.
- (d) The landscape fire death rate and the fire death rate (table 9A.7) rate are different. The scope and definition of the two measures differ according to:
  - Fire type the scope of the landscape fire death rate is landscape fires only (such as bushfires).
  - Cause of death the total fire death rate (ABS) includes only deaths primarily caused due to smoke, fire and flames. The landscape fire death rate includes all deaths that may have resulted from the landscape fire, but whose primary cause may be related to other factors (such as the onset of a stress related coronary death or a road crash death as a result of attempting to escape a fire).
  - Location of death the landscape fire death rate records the location of death according to the location of the fire (not residential address of the victim).
  - Nil or rounded to zero.

Source: Australasian Fire and Emergency Service Authorities Council (AFAC) (unpublished) Landscape Fire Deaths database; ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.9 Fire injuries (a), (b), (c), (d)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
						(e)	(e)	(e)	
Hospital admissions due	e to fire inju	ry							
Annual rate					00 people				
2013-14	15.1	12.0	19.2	19.3	28.6	15.4	9.6	78.3	17.2
2012-13	15.8	11.3	21.9	22.2	24.8	16.2	9.5	92.5	18.0
2011-12	15.2	14.0	21.1	20.1	23.0	16.0	8.6	84.8	17.8
2010-11	12.8	14.1	20.2	19.4	21.4	16.9	4.7	86.8	16.6
2009-10	12.5	13.5	17.6	16.3	20.1	17.4	4.8	89.6	15.5
2008-09	11.4	13.4	21.0	15.3	20.8	16.1	8.8	88.1	15.8
2007-08	14.6	12.4	17.9	16.7	20.9	15.9	5.8	90.0	16.1
2006-07	14.0	12.9	15.9	18.8	22.0	np	np	np	16.0
2005-06	16.4	10.7	16.5	17.6	24.1	np	np	np	16.3
2004-05	14.7	12.8	18.1	15.6	19.3	np	np	np	15.8
Annual rate (3 year ave	rage)		p	er 100 00	00 people	<del>)</del>			
2011-12 to 2013-14	15.4	12.4	20.7	20.6	25.5	15.9	9.3	85.1	17.6
2010-11 to 2012-13	14.6	13.1	21.1	20.6	23.1	16.4	7.6	88.1	17.5
2009-10 to 2011-12	13.5	13.9	19.6	18.6	21.5	16.7	6.0	87.0	16.7
2008-09 to 2010-11	12.2	13.7	19.6	17.0	20.8	16.8	6.1	88.2	16.0
2007-08 to 2009-10	12.8	13.1	18.8	16.1	20.6	16.5	6.5	89.2	15.8
2006-07 to 2008-09	13.3	12.9	18.3	16.9	21.2	np	np	np	16.0
2005-06 to 2007-08	15.0	12.0	16.8	17.7	22.3	np	np	np	16.1
2004-05 to 2006-07	15.0	12.1	16.8	17.4	21.8	np	np	np	16.0
Total fire injury admiss	ions		n	umber					
2013-14	1 125	697	899	493	480	79	37	190	4 000
2012-13	1 162	639	1 012	550	413	83	36	219	4 114
2011-12	1 100	782	950	480	378	82	32	197	4 001
2010-11	918	773	898	449	350	86	17	200	3 691
2009-10	885	730	767	368	326	88	17	204	3 385
2008-09	798	713	900	338	333	81	31	196	3 390
2007-08	1 008	644	745	357	330	79	20	195	3 378
2006-07	951	656	644	391	343	np	np	np	3 305
2005-06	1 100	537	653	357	373	np	np	np	3 305
2004-05	979	633	702	312	296	np	np	np	3 170

<sup>(</sup>a) Fire injuries are represented by hospital admissions and are reported by the State or Territory where the injury is treated.

<sup>(</sup>b) Fire injuries are coded according to the ICD and Related Health Problems Revision 10 (ICD-10) and include ICD fire injury codes X00-X09 plus X76, X97 and Y26.

<sup>(</sup>c) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

<sup>(</sup>d) The AIHW note that for the fire injuries measure, the period of the extended time series covers all six editions of the ICD-10-AM classification. Data providers have expressed concerns over the length of the series due to possible changes in the classification and inconsistent coding over time. Therefore, AIHW have expressed the opinion that a review of the consistency in coding over time is warranted.

Table 9A.9 Fire injuries (a), (b), (c), (d)

NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
					(e)	(e)	(e)	

#### (e) Jurisdiction notes:

#### Tas, ACT and NT:

Data for 2001-02 to 2006-07 are not available. For 2005-06 to 2007-08, the average is calculated on only one year of data for these jurisdictions, and two years of data for the period 2006-07 to 2008-09.

#### np Not published.

Source: AIHW (unpublished) Australian Hospital Statistics, Cat. no. HSE 145; ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.10 Confinement of building fires to room of origin (per cent) (a), (b)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
		(c)	(c)	(c)	(c)	(c)		
All ignition types								
2014-15	68.3	71.8	69.5	65.9	66.2	60.4	73.4	94.0
2013-14	63.2	73.5	69.0	66.1	66.1	59.9	80.3	81.8
2012-13	66.5	75.3	71.3	64.3	64.8	63.6	65.8	85.5
2011-12	66.1	74.9	70.0	63.7	62.0	57.9	72.8	69.4
2010-11	69.7	75.6	72.3	65.0	67.0	59.2	75.9	75.5
2009-10	67.4	73.1	70.6	71.1	67.4	59.5	72.2	75.5
2008-09	66.9	75.9	66.3	67.7	69.7	62.6	72.5	73.4
2007-08	65.7	73.7	68.4	65.4	72.8	62.5	77.0	67.4
2006-07	69.4	73.9	66.6	64.1	65.1	66.3	75.7	68.3
2005-06	69.2	74.3	65.2	66.4	64.7	64.5	82.0	65.4
Incendiary and su	spicious struc	cture fires						
2014-15	54.0	57.6	50.0	54.2	64.4	52.9	80.0	80.0
2013-14	50.9	60.1	47.8	54.5	64.4	50.4	76.5	75.0
2012-13	52.8	60.2	41.9	51.1	39.3	46.9	57.7	100.0
2011-12	54.4	58.1	51.8	50.9	45.0	43.2	66.7	100.0
2010-11	58.0	63.1	63.7	59.8	66.0	37.5	62.8	100.0
2009-10	53.2	59.6	57.6	61.4	46.8	53.8	64.4	57.1
2008-09	50.8	62.2	58.9	59.1	65.2	47.2	69.8	61.5
2007-08	65.4	57.8	60.4	57.1	59.4	50.6	69.8	55.6
2006-07	55.7	60.9	61.5	55.3	64.4	53.1	61.1	60.0
2005-06	57.5	59.7	54.4	55.2	71.4	53.1	60.0	100.0
Accidental structu	re fires							
2014-15	80.3	79.6	80.0	77.3	75.2	70.8	75.6	95.6
2013-14	77.5	80.7	77.9	75.2	75.0	70.7	87.7	90.7
2012-13	80.0	82.8	80.8	73.9	75.9	72.7	76.3	86.0
2011-12	80.6	83.1	81.1	74.1	70.0	64.3	76.3	83.3
2010-11	81.5	82.6	82.2	82.9	73.0	76.6	84.6	72.0
2009-10	80.6	81.4	84.4	82.9	80.2	69.6	76.6	86.7
2008-09	78.9	83.6	77.2	85.2	79.9	73.9	80.0	74.2
2007-08	77.5	81.7	80.5	82.4	83.7	72.6	85.7	79.5
2006-07	80.7	82.1	80.6	83.7	79.0	76.0	85.0	70.4
2005-06	80.9	82.8	80.1	77.4	64.3	74.6	84.5	56.3

<sup>(</sup>a) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.

<sup>(</sup>b) Jurisdictions provide data for both urban and rural services and for both career and volunteer services, other than Queensland and the NT — see footnote c for caveats.

<sup>(</sup>c) Jurisdiction notes:

Vic: Due to data collection issues, data are incomplete for 2005-06.

Qld: Structure fires within the Urban Service Administrative Areas are included. Excluded are nonemergency calls and those where QFES experienced delays due to either extreme weather conditions or where the initial response was by another agency or brigade.

### Table 9A.10 Confinement of building fires to room of origin (per cent) (a), (b)

NSW	Vic	Qld	WA	SA	Tas	ACT	NT
	(c)	(c)	(c)	(c)	(c)		

WA: Total confinement percentages include fires confined but not classified as either accidental or suspicious.

Data exclude incidents where containment codes are not completed.

SA: Total confinement percentages include fires confined but not classified as either accidental or suspicious.

For 2013-14, Country Fire Service (CFS) industrial action between 1/12/2013 and 30/06/2014 affected the collection of CFS incident data.

For 2004-05, Metropolitan Fire Service (MFS) industrial action between 18/4/05 to 20/06/05 affected the collection of MFS incident data (no incident reports completed during this period).

Tas: Due to industrial action 90 incident reports are incomplete in 2008-09.

Source: State and Territory governments (unpublished).

Table 9A.11 Confinement of building and other structure fires to room/object of origin (per cent) (a), (b)

	<u> </u>							
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
	(c)		(c)	(c)	(c)	(c)		
All ignition types								
2014-15	80.4	78.8	83.9	73.6	72.7	72.2	85.7	94.0
2013-14	76.9	94.9	84.0	74.6	72.6	71.6	89.2	81.8
2012-13	79.6	82.9	84.4	76.2	71.0	71.8	81.4	85.5
2011-12	80.1	82.9	84.5	77.7	70.0	74.7	85.8	82.6
2010-11	82.0	83.6	87.6	76.3	73.0	85.3	77.1	86.9
2009-10	na	80.9	na	66.3	75.0	72.5	78.5	83.0
2008-09	na	81.6	na	70.1	70.0	74.5	80.5	80.3
2007-08	na	80.6	na	64.6	73.0	73.8	81.6	78.3
Incendiary and sus	spicious struc	cture fires						
2014-15	58.9	61.1	56.1	56.8	65.2	54.5	84.4	80.0
2013-14	57.0	63.5	53.3	59.1	65.2	53.4	83.7	75.0
2012-13	58.6	64.1	46.1	56.1	41.3	50.0	69.4	100.0
2011-12	60.1	62.6	55.6	57.6	47.0	46.6	77.7	100.0
2010-11	63.0	68.1	68.1	55.9	67.0	39.9	63.6	100.0
2009-10	na	61.6	na	56.7	na	56.9	67.3	44.4
2008-09	na	64.9	na	54.8	na	52.5	74.5	70.0
2007-08	na	60.1	na	54.8	na	59.4	70.0	61.9
Accidental structu	re fires							
2014-15	89.8	85.4	89.6	84.0	81.9	82.7	87.9	95.6
2013-14	88.7	87.5	88.7	70.1	81.8	82.1	93.6	90.7
2012-13	89.9	88.9	89.4	84.5	81.6	82.7	84.1	86.0
2011-12	90.0	89.2	90.0	85.3	78.0	83.7	88.5	93.8
2010-11	91.0	89.0	91.2	72.9	80.0	56.4	85.7	81.6
2009-10	na	87.8	na	74.6	87.0	82.8	83.0	89.7
2008-09	na	88.0	na	80.0	80.0	84.4	87.2	96.1
2007-08	na	87.1	na	72.7	84.0	82.0	89.5	87.3

<sup>(</sup>a) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.

NSW: Data for other structure fires confined to object of origin are not available prior to 2010-11.

Qld: Structure fires within the Urban Service Administrative Areas are included. Excluded are nonemergency calls and those where QFES experienced delays due to either extreme weather conditions or where the initial response was by another agency or brigade.

Data for other structure fires confined to object of origin are not available prior to 2010-11.

WA: Total confinement percentages include fires confined but not classified as either accidental or suspicious.

<sup>(</sup>b) Jurisdictions provide data for both urban and rural services and for both career and volunteer services, other than Queensland and the NT — see footnote c for caveats.

<sup>(</sup>c) Jurisdiction notes:

Table 9A.11 Confinement of building and other structure fires to room/object of origin (per cent) (a), (b)

NSW	Vic	Qld	WA	SA	Tas	ACT	NT
(c)		(c)	(c)	(c)	(c)		

Data exclude incidents where containment codes are not completed.

SA: Data include MFS, but exclude the CFS as they do not routinely collect the source data.

Data for confinement of small fires to object of origin are not available in 2006-07 and exclude incendiary incidents prior to 2010-11.

For 2013-14, Country Fire Service (CFS) industrial action between 1/12/2013 and 30/06/2014 affected the collection of CFS incident data.

For 2004-05, Metropolitan Fire Service (MFS) industrial action between 18/4/05 to 20/06/05 affected the collection of MFS incident data (no incident reports were completed during this period).

Tas: Due to industrial action 90 incident reports are incomplete in 2008-09.

na Not available.

Source: State and Territory governments (unpublished).

Table 9A.12 Building and contents insurance, fire event claims (2014-15 dollars) (a), (b), (c), (d), (e)

NSW         Vic         Qld         WA         SA         Tas (i)         ACT         NT         Aux           Total value fire event insurance claims incurred           2014-15         \$m         131.9         119.0         102.3         34.3         53.1         32.5         4.7         3.8         481.           2013-14         \$m         156.6         140.9         67.5         30.6         24.7         28.0         4.4         3.0         455.           2012-13         \$m         146.4         124.9         67.8         32.3         25.2         72.9         3.5         5.3         478.           2011-12         \$m         129.5         117.9         75.6         66.0         26.3         19.8         6.1         4.1         445.           2010-11         \$m         123.2         102.8         70.8         60.9         23.2         14.9         4.7         2.0         402.           2009-10         \$m         121.4         102.3         70.9         35.0         23.9         17.3         4.9         2.4         378.           2008-09         \$m         94.2         80.9         62.8         25.7         14.1	Commercial (f)	Total
2014-15       \$m       131.9       119.0       102.3       34.3       53.1       32.5       4.7       3.8       481.2         2013-14       \$m       156.6       140.9       67.5       30.6       24.7       28.0       4.4       3.0       455.2         2012-13       \$m       146.4       124.9       67.8       32.3       25.2       72.9       3.5       5.3       478.2         2011-12       \$m       129.5       117.9       75.6       66.0       26.3       19.8       6.1       4.1       445.2         2010-11       \$m       123.2       102.8       70.8       60.9       23.2       14.9       4.7       2.0       402.2         2009-10       \$m       121.4       102.3       70.9       35.0       23.9       17.3       4.9       2.4       378.2         2008-09       \$m       94.2       80.9       62.8       25.7       14.1       15.2       5.5       1.9       300.2         2007-08       \$m       92.2       79.4       58.5       20.1       17.1       14.1       3.7       1.5       269.2         2006-07       \$m       83.2       80.8       47.8	t Aust	Aust
2013-14       \$m       156.6       140.9       67.5       30.6       24.7       28.0       4.4       3.0       455.         2012-13       \$m       146.4       124.9       67.8       32.3       25.2       72.9       3.5       5.3       478.         2011-12       \$m       129.5       117.9       75.6       66.0       26.3       19.8       6.1       4.1       445.         2010-11       \$m       123.2       102.8       70.8       60.9       23.2       14.9       4.7       2.0       402.         2009-10       \$m       121.4       102.3       70.9       35.0       23.9       17.3       4.9       2.4       378.         2008-09       \$m       94.2       80.9       62.8       25.7       14.1       15.2       5.5       1.9       300.         2007-08       \$m       92.2       79.4       58.5       20.1       17.1       14.1       3.7       1.5       286.         2006-07       \$m       83.2       80.8       47.8       21.2       14.5       17.3       3.1       1.5       269.         2005-06       \$m       91.1       75.9       61.4		
2012-13       \$m       146.4       124.9       67.8       32.3       25.2       72.9       3.5       5.3       478.         2011-12       \$m       129.5       117.9       75.6       66.0       26.3       19.8       6.1       4.1       445.         2010-11       \$m       123.2       102.8       70.8       60.9       23.2       14.9       4.7       2.0       402.         2009-10       \$m       121.4       102.3       70.9       35.0       23.9       17.3       4.9       2.4       378.         2008-09       \$m       94.2       80.9       62.8       25.7       14.1       15.2       5.5       1.9       300.         2007-08       \$m       92.2       79.4       58.5       20.1       17.1       14.1       3.7       1.5       286.         2006-07       \$m       83.2       80.8       47.8       21.2       14.5       17.3       3.1       1.5       269.         2005-06       \$m       91.1       75.9       61.4       13.8       11.7       12.3       4.7       1.3       272.	6 320.0	801.6
2011-12       \$m       129.5       117.9       75.6       66.0       26.3       19.8       6.1       4.1       445.2         2010-11       \$m       123.2       102.8       70.8       60.9       23.2       14.9       4.7       2.0       402.2         2009-10       \$m       121.4       102.3       70.9       35.0       23.9       17.3       4.9       2.4       378.2         2008-09       \$m       94.2       80.9       62.8       25.7       14.1       15.2       5.5       1.9       300.2         2007-08       \$m       92.2       79.4       58.5       20.1       17.1       14.1       3.7       1.5       286.2         2006-07       \$m       83.2       80.8       47.8       21.2       14.5       17.3       3.1       1.5       269.2         2005-06       \$m       91.1       75.9       61.4       13.8       11.7       12.3       4.7       1.3       272.2	8 289.0	744.8
2010-11       \$m       123.2       102.8       70.8       60.9       23.2       14.9       4.7       2.0       402.         2009-10       \$m       121.4       102.3       70.9       35.0       23.9       17.3       4.9       2.4       378.         2008-09       \$m       94.2       80.9       62.8       25.7       14.1       15.2       5.5       1.9       300.         2007-08       \$m       92.2       79.4       58.5       20.1       17.1       14.1       3.7       1.5       286.         2006-07       \$m       83.2       80.8       47.8       21.2       14.5       17.3       3.1       1.5       269.         2005-06       \$m       91.1       75.9       61.4       13.8       11.7       12.3       4.7       1.3       272.	3 276.4	754.7
2009-10       \$m       121.4       102.3       70.9       35.0       23.9       17.3       4.9       2.4       378.0         2008-09       \$m       94.2       80.9       62.8       25.7       14.1       15.2       5.5       1.9       300.0         2007-08       \$m       92.2       79.4       58.5       20.1       17.1       14.1       3.7       1.5       286.0         2006-07       \$m       83.2       80.8       47.8       21.2       14.5       17.3       3.1       1.5       269.0         2005-06       \$m       91.1       75.9       61.4       13.8       11.7       12.3       4.7       1.3       272.0	4 381.2	826.6
2008-09       \$m       94.2       80.9       62.8       25.7       14.1       15.2       5.5       1.9       300.0         2007-08       \$m       92.2       79.4       58.5       20.1       17.1       14.1       3.7       1.5       286.0         2006-07       \$m       83.2       80.8       47.8       21.2       14.5       17.3       3.1       1.5       269.0         2005-06       \$m       91.1       75.9       61.4       13.8       11.7       12.3       4.7       1.3       272.0	4 238.2	640.6
2007-08       \$m       92.2       79.4       58.5       20.1       17.1       14.1       3.7       1.5       286.2         2006-07       \$m       83.2       80.8       47.8       21.2       14.5       17.3       3.1       1.5       269.2         2005-06       \$m       91.1       75.9       61.4       13.8       11.7       12.3       4.7       1.3       272.2	2 248.3	626.5
2006-07 \$m 83.2 80.8 47.8 21.2 14.5 17.3 3.1 1.5 269. 2005-06 \$m 91.1 75.9 61.4 13.8 11.7 12.3 4.7 1.3 272.	2 314.7	614.9
2005-06 \$m 91.1 75.9 61.4 13.8 11.7 12.3 4.7 1.3 272.	4 339.8	626.2
	4 265.5	534.9
Share of potential market (q), (h)	2 319.0	591.2
1 10// 17		
2014-15 % 62.9 70.7 66.0 68.2 71.0 75.6 64.1 53.9 67.	o na	na
2013-14 % 63.6 72.3 67.1 68.7 71.9 76.2 64.6 54.0 68.	0 na	na
2012-13 % 64.3 72.8 69.1 68.8 72.0 77.5 65.8 54.0 68.	8 na	na
2011-12 % 65.4 73.1 70.9 68.4 68.9 78.7 67.1 53.8 69.	4 na	na
2010-11 % 66.4 74.1 71.3 67.7 66.3 80.1 68.7 50.1 69.	7 na	na
2009-10 % 67.1 74.4 72.5 68.7 66.6 79.3 69.6 49.5 70.	4 na	na
2008-09 % 61.7 65.8 65.5 61.7 51.0 67.6 65.6 42.2 62	7 na	na
2007-08 % 50.6 58.5 64.4 58.2 48.9 64.6 58.7 37.6 56.	4 na	na
2006-07 % 50.2 58.5 64.1 58.6 48.7 65.0 59.0 36.9 56.	2 na	na
2005-06 % 49.5 58.5 63.9 58.8 49.2 65.2 59.4 36.5 56.	o na	na

Table 9A.12 Building and contents insurance, fire event claims (2014-15 dollars) (a), (b), (c), (d), (e)

		_										
	•				Н	ousehold					Commercial (f)	Total
	•	NSW	Vic	Qld	WA	SA	Tas (i)	ACT	NT	Aust	Aust	Aust
Number of fire	event insu	rance claim	s incurred									
2014-15	no.	2 406	2 524	1 823	1 008	1 130	379	96	265	9 630	2 297	11 927
2013-14	no.	2 445	3 034	1 412	1 099	862	429	102	224	9 604	2 124	11 728
2012-13	no.	2 617	2 892	1 652	1 044	866	851	129	177	10 226	2 672	12 898
2011-12	no.	2 716	2 890	1 826	1 111	841	462	136	122	10 102	2 435	12 537
2010-11	no.	3 011	3 059	1 847	1 334	895	502	130	61	10 837	2 448	13 285
2009-10	no.	3 098	3 060	2 150	1 193	905	483	120	46	11 053	3 005	14 058
2008-09	no.	2 574	2 795	1 969	1 049	716	478	151	46	9 777	2 650	12 427
2007-08	no.	2 189	2 321	1 893	1 016	702	435	123	42	8 719	2 901	11 620
2006-07	no.	2 340	2 878	1 981	1 104	745	570	131	39	9 786	2 867	12 653
2005-06	no.	2 432	2 520	2 650	1 040	624	400	132	31	9 826	3 258	13 084
Average value o	of fire ever	nt insurance	claims									
2014-15	\$	54 827	47 131	56 090	34 001	47 038	85 797	49 546	14 503	50 013	139 319	67 211
2013-14	\$	64 035	46 459	47 799	27 875	28 694	65 439	43 786	13 437	47 461	125 152	63 503
2012-13	\$	55 928	43 198	41 065	30 940	29 065	85 739	26 917	30 110	46 771	116 667	58 510
2011-12	\$	47 685	40 802	41 405	59 381	31 317	42 998	44 684	34 148	44 088	142 840	65 933
2010-11	\$	40 906	33 615	38 326	45 668	25 870	29 671	36 066	33 320	37 133	105 529	48 217
2009-10	\$	39 196	33 437	32 979	29 376	26 458	35 843	41 355	51 112	34 216	91 375	44 563
2008-09	\$	36 602	28 945	31 893	24 499	19 690	31 700	36 364	41 682	30 709	107 819	49 485
2007-08	\$	42 130	34 207	30 880	19 737	24 330	32 447	29 967	35 349	32 853	124 056	53 891
2006-07	\$	35 568	28 083	24 127	19 219	19 451	30 430	23 506	37 782	27 529	94 231	42 277
2005-06	\$	37 467	30 140	23 159	13 255	18 734	30 697	36 070	43 573	27 703	105 887	45 189

Table 9A.12 Building and contents insurance, fire event claims (2014-15 dollars) (a), (b), (c), (d), (e)

	-				Но	usehold					Commercial (f)	Total
		NSW	Vic	Qld	WA	SA	Tas (i)	ACT	NT	Aust	Aust	Aust
Total value of fire ev	ent ins	urance cla	ims per pe	rson in the	population							
2014-15	\$	17.44	20.21	21.52	13.27	31.41	63.11	12.21	15.73	20.38	13.55	33.93
2013-14	\$	20.97	24.34	14.38	12.00	14.74	54.56	11.57	12.38	19.55	12.39	31.94
2012-13	\$	19.92	22.00	14.71	13.06	15.14	142.31	9.11	22.44	20.88	12.07	32.95
2011-12	\$	17.87	21.15	16.75	27.64	16.00	38.78	16.39	17.86	19.81	16.96	36.76
2010-11	\$	17.15	18.71	15.95	26.27	14.18	29.16	12.80	8.75	18.15	10.74	28.89
2009-10	\$	17.10	18.88	16.23	15.48	14.79	34.18	13.81	10.32	17.30	11.35	28.65
2008-09	\$	13.45	15.23	14.69	11.63	8.82	30.20	15.64	8.52	13.98	14.65	28.63
2007-08	\$	13.39	15.27	14.05	9.39	10.81	28.43	10.71	6.85	13.63	16.17	29.80
2006-07	\$	12.26	15.83	11.78	10.22	9.28	35.26	9.07	6.98	13.06	12.87	25.93
2005-06	\$	13.56	15.12	15.48	6.79	7.57	25.12	14.22	6.41	13.40	15.71	29.11
Total value of fire ev	ent ins	urance cla	ims per pe	rson in the	population	— Three y	ear average	)				
2012-13 to 2014-15	\$	19.44	22.18	16.87	12.78	20.43	86.66	10.96	16.85	20.27	12.67	32.94
2011-12 to 2013-14	\$	19.59	22.49	15.28	17.57	15.29	78.55	12.36	17.56	20.08	13.80	33.88
2010-11 to 2012-13	\$	18.31	20.62	15.80	22.32	15.11	70.08	12.77	16.35	19.61	13.25	32.87
2009-10 to 2011-12	\$	17.37	19.58	16.31	23.13	14.99	34.04	14.33	12.31	18.42	13.02	31.43
2008-09 to 2010-11	\$	15.90	17.60	15.62	17.79	12.60	31.18	14.08	9.20	16.47	12.25	28.73
2007-08 to 2009-10	\$	14.65	16.46	14.99	12.17	11.47	30.94	13.39	8.57	14.97	14.06	29.03
2006-07 to 2008-09	\$	13.04	15.44	13.51	10.41	9.64	31.30	11.80	7.45	13.56	14.57	28.12
2005-06 to 2007-08	\$	13.07	15.41	13.77	8.80	9.22	29.61	11.33	6.75	13.36	14.92	28.28

<sup>(</sup>a) Time series financial data are adjusted to 2014-15 dollars using the Domestic Final Demand (DFD) deflator (2014-15 = 100) (table 9A.51). The DFD deflator is preferred to the General Government Final Consumption Expenditure deflator for this table, as asset losses are more closely aligned to the range of consumption and capital goods represented in the DFD than general government consumption. See tables 9A.51, 2A.48 and chapter 2 (sections 2.5-6) for more information.

<sup>(</sup>b) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

<sup>(</sup>c) Building and content insurance data are subject to revisions. As a part of their regular submissions to Insurance Statistics Australia (ISA), insurance companies update historic data on claims for fire events which were finalised after the end of the financial year.

Table 9A.12 Building and contents insurance, fire event claims (2014-15 dollars) (a), (b), (c), (d), (e)

			Нοι	ısehold					Commercial (f)	Total
NSW	Vic	Qld	WA	SA	Tas (i)	ACT	NT	Aust	Aust	Aust

- (d) Not to be reproduced, published or used without the permission of Insurance Statistics Australia Limited. Please include acknowledgements of Insurance Statistics Australia Ltd as the source.
- (e) Data exclude major events (total claims greater than \$100 million).
- (f) Data for commercial property are not available by State and Territory.
- (g) The percentage of market figures for householder and homeowners insurance are based on projections of the numbers of private dwellings (excluding strata units) and number of households using data from various ABS publications including estimated resident populations. These projections are undertaken by Finity Consulting on behalf of ISA. An average of the number of households and private dwellings is taken as a measure of the potential market for householders insurance.
- (h) ISA estimate that their data cover approximately 69 and 60 per cent of the potential domestic and commercial insurance markets respectively.
- (i) Jurisdiction notes:

Tas: A large increase in the fire event insurance claims in 2012-13 coincides with the Tasmanian 2013 bushfires. The insurance claims did not exceed \$100 million and have therefore not been classified as a major event.

Source: ISA Database (unpublished); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2); ABS 2015, Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0 (table 2A.48).

Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

	NSW	Vic (d)	Qld (d)	WA (d)	SA (d)	Tas (d)	ACT (d)	NT (d)	Aust
2014-15									
Fires									
Structure fires	7 166	5 663	2 704	1 327	1 502	553	240	201	19 356
Landscape fires	11 866	6 591	9 924	6 540	2 946	1 443	185	2 296	41 791
Attended to by fire service provider	11 475	5 442	9 924	5 954	2 946	1 <b>4</b> 26	185	1 887	39 239
Attended to by land management agency	391	1 149	na	586	na	17	na	409	2 552
Other fires	11 845	9 702	6 393	3 561	2 694	1 452	429	322	36 398
Total fires	30 877	21 956	19 021	11 428	7 142	3 448	854	2 819	97 545
Other emergencies and incidents									
Non-fire rescue calls incl. road crash rescue	20 333	14 635	16 997	3 283	6 595	1 285	1 440	870	65 438
Hazardous conditions	10 800	7 279	3 735	1 060	1 541	262	449	154	25 280
Floods, storm and tempest and other natural disasters	6 133	3 994	5 498	34	2 761	355	800	7	19 582
Good intent calls	13 762	10 799	3 430	2 956	2 869	1 245	655	261	35 977
Malicious false calls	1 181	1 201	734	188	284	95	48	49	3 780
System initiated false alarms	50 371	14 889	19 037	9 583	7 075	3 393	5 731	2 777	112 856
Other	12 760	2 282	3 021	2 311	960	53	336	482	22 205
Total other emergencies and incidents	115 340	55 079	52 452	19 415	22 085	6 688	9 459	4 600	285 118
Incident type not determined or not classified	1 793	8	-	na	_	654	-	na	na
Total fires, other emergencies and incidents	148 010	77 043	71 473	30 843	29 227	10 790	10 313	7 419	385 118

2013-14

REPORT ON GOVERNMENT SERVICES 2016 FIRE AND AMBULANCE SERVICES PAGE 1 of TABLE 9A.13

Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

	NSW	Vic (d)	Qld (d)	<i>WA</i> (d)	SA (d)	Tas (d)	ACT (d)	NT (d)	Aust
Fires		. ,	. ,	( )	( )	. ,	( )	( )	
Structure fires	6 992	5 977	2 713	1 360	1 475	631	239	137	19 524
Landscape fires	13 958	5 872	11 066	5 805	3 240	1 658	210	2 013	43 822
Other fires	13 134	9 837	6 978	3 821	2 729	1 452	426	320	38 697
Total fires	34 084	21 686	20 757	10 986	7 444	3 741	875	2 470	102 043
Other emergencies and incidents									
Non-fire rescue calls incl. road crash rescue	19 648	13 862	16 770	3 100	6 151	1 360	1 315	782	62 988
Hazardous conditions	9 588	7 347	3 646	1 173	1 587	252	366	135	24 094
Floods, storm and tempest and other natural disasters	10 436	3 704	4 367	22	3 939	309	1 003	196	23 976
Good intent calls	15 749	10 841	3 351	2 592	2 916	1 191	648	269	37 557
Malicious false calls	1 685	1 307	803	170	327	93	50	37	4 472
System initiated false alarms	43 068	14 530	18 187	9 387	7 708	3 566	5 919	2 774	105 139
Other	11 483	2 212	2 553	2 625	1 120	55	335	281	20 664
Total other emergencies and incidents	111 657	53 803	49 677	19 069	23 748	6 826	9 636	4 474	278 890
Incident type not determined or not classified	2 277	6	_	-	_	383	na	594	na
Total fires, other emergencies and incidents	148 018	75 495	70 434	30 055	31 192	10 950	10 511	7 538	384 193
2012-13									
Fires									
Structure fires	6 719	6 200	2 949	1 475	1 540	676	228	160	19 947
Landscape fires	17 932	7 529	11 480	6 044	1 280	1 893	290	2 308	48 756
Other fires	15 807	10 916	7 328	4 049	3 068	1 549	487	378	43 582
Total fires	40 458	24 645	21 757	11 568	5 888	4 118	1 005	2 846	112 285

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Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

	NSW	Vic (d)	Q <i>ld</i> (d)	<i>WA</i> (d)	<i>SA</i> (d)	Tas (d)	<i>ACT</i> (d)	<i>NT</i> (d)	Aust
Other emergencies and incidents		7.0 (0)	470 (0)	(4)	37 · (a)	7.40 (4)	7107 (a)	717 (4)	7.0.01
<u> </u>									
Non-fire rescue calls incl. road crash rescue	19 005	12 422	17 201	3 128	6 114	1 217	1 372	723	61 182
Hazardous conditions	10 402	7 161	4 080	871	1 582	244	415	163	24 918
Floods, storm and tempest and other natural disasters	10 344	3 394	4 777	14	2 968	304	1 032	207	23 040
Good intent calls	15 926	11 131	3 491	2 534	2 978	1 235	639	265	38 199
Malicious false calls	2 188	1 450	883	359	301	92	80	41	5 394
System initiated false alarms	49 966	13 973	19 717	10 100	7 306	3 368	5 888	2 421	112 739
Other	7 573	1 976	3 763	1 564	847	44	297	280	16 344
Total other emergencies and incidents	115 404	51 507	53 912	18 570	22 096	6 504	9 723	4 100	281 816
Incident type not determined or not classified	1 536	6	-	_	-	788	-	495	2 825
Total fires, other emergencies and incidents	157 398	76 158	75 669	30 138	27 984	11 410	10 728	7 441	396 926
2011-12									
Fires									
Structure fires	6 402	6 278	3 017	1 442	1 494	645	265	175	19 718
Landscape fires	10 568	4 825	9 367	6 366	2 382	1 775	199	2 504	37 986
Other fires	15 963	10 154	6 870	4 105	3 211	1 701	505	375	42 884
Total fires	32 933	21 257	19 254	11 913	7 087	4 121	969	3 054	100 588
Other emergencies and incidents									
Non-fire rescue calls incl. road crash rescue	19 268	11 785	16 754	2 728	5 934	1 259	1 372	684	59 784
Hazardous conditions	10 386	6 530	3 462	1 031	1 618	256	408	151	23 842

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Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

This page has been changed since an earlier version of the Report. See errata at <a href="http://www.pc.gov.au/research/ongoing/report-on-government-services/2016/emergency-management#errata">http://www.pc.gov.au/research/ongoing/report-on-government-services/2016/emergency-management#errata</a>

	NSW	Vic (d)	Qld (d)	WA (d)	SA (d)	Tas (d)	ACT (d)	NT (d)	Aust
Floods, storm and tempest and other natural disasters	10 517	3 265	3 887	701	2 998	387	1 203	191	23 149
Good intent calls	13 864	10 535	2 892	1 807	2 628	1 105	655	262	33 748
Malicious false calls	2 267	1 647	852	335	324	126	146	77	5 774
System initiated false alarms	53 336	14 102	20 548	10 627	7 804	3 807	6 280	2 658	119 162
Other	5 422	1 970	2 420	1 240	_	44	334	329	11 759
Total other emergencies and incidents	115 060	49 834	50 815	18 469	21 306	6 984	10 398	4 352	277 218
Incident type not determined or not classified	1 743	6	_	_	_	432	-	401	2 582
Total fires, other emergencies and incidents	149 736	71 097	70 069	30 382	28 393	11 537	11 367	7 807	380 388
010-11									
Fires									
Structure fires	6 675	6 307	2 811	1 567	1 403	663	245	136	19 807
Landscape fires	11 222	2 520	5 072	7 175	1 944	1 413	142	1 393	30 881
Other fires	16 130	8 929	5 897	3 753	3 215	1 582	513	317	40 336
Total fires	34 027	17 756	13 780	12 495	6 562	3 658	900	1 846	91 024
Other emergencies and incidents									
Non-fire rescue calls incl. road crash rescue	18 453	10 629	16 151	2 585	6 289	1 381	1 497	717	57 702
Hazardous conditions	10 734	6 371	3 769	908	1 717	227	438	155	24 319
Floods, storm and tempest and other natural disasters	9 755	3 604	5 013	51	3 805	440	1 452	208	24 328
Good intent calls	13 709	10 048	3 026	1 683	2 581	1 079	651	333	33 110
Malicious false calls	2 731	1 605	985	327	307	150	125	62	6 292
System initiated false alarms	53 615	14 835	22 725	9 283	8 261	4 067	6 468	2 801	122 055

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Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

	NSW	Vic (d)	Qld (d)	<i>WA</i> (d)	SA (d)	Tas (d)	ACT (d)	NT (d)	Aust
Other	5 855	2 114	3 040	1 680	1 082	51	321	654	14 797
Total other emergencies and incidents	114 852	49 206	54 709	16 517	24 042	7 395	10 952	4 930	282 603
Incident type not determined or not classified	937	7	_	-	1	384	-	474	1 803
Total fires, other emergencies and incidents	149 816	66 969	68 489	29 012	30 605	11 437	11 852	7 250	375 430
2009-10									
Fires									
Structure fires	7 044	6 286	2 688	1 550	1 418	694	246	114	20 040
Landscape fires	16 201	5 253	10 298	7 199	2 810	1 925	268	1 343	45 297
Other fires	17 540	10 511	5 463	3 909	3 486	1 669	709	378	43 665
Total fires	40 785	22 050	18 449	12 658	7 714	4 288	1 223	1 835	109 002
Other emergencies and incidents									
Non-fire rescue calls incl. road crash rescue	16 969	9 668	14 914	1 984	5 864	1 293	1 461	693	52 846
Hazardous conditions	11 126	6 391	3 437	857	1 608	223	403	180	24 225
Floods, storm and tempest and other natural disasters	9 098	2 853	2 822	739	2 378	431	1 062	210	19 593
Good intent calls	14 278	10 528	5 618	1 401	2 654	1 104	621	254	36 458
Malicious false calls	3 208	1 896	1 222	330	367	135	117	87	7 362
System initiated false alarms	49 324	12 732	20 418	8 972	7 714	3 872	5 713	2 470	111 215
Other	10 241	1 846	1 939	1 066	934	110	325	471	16 932
Total other emergencies and incidents	114 244	45 914	50 370	15 349	21 519	7 168	9 702	4 365	268 631
Incident type not determined or not classified	730	5	_	_	_	751	_	450	1 936

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Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

	NSW	Vic (d)	Q <i>ld</i> (d)	<i>WA</i> (d)	<i>SA</i> (d)	Tas (d)	ACT (d)	NT (d)	Aust
Total fires, other emergencies and incidents	155 759	67 969	68 819	28 007	29 233	12 207	10 925	6 650	379 569
2008-09									
Fires									
Structure fires	6 917	6 459	2 960	1 543	1 469	805	263	172	20 588
Landscape fires	14 583	7 661	7 358	7 607	2 749	1 966	337	1 640	43 901
Other fires	18 452	12 507	5 565	4 419	3 754	1 617	899	383	47 596
Total fires	39 952	26 627	15 883	13 569	7 972	4 388	1 499	2 195	112 085
Other emergencies and incidents									
Non-fire rescue calls incl. road crash rescue	16 548	9 606	17 831	1 869	5 717	1 422	1 274	714	54 981
Hazardous conditions	12 570	6 181	3 529	922	1 522	222	440	147	25 533
Floods, storm and tempest and other natural disasters	8 197	2 839	2 784	955	2 131	398	888	248	18 440
Good intent calls	13 561	11 421	5 100	1 571	2 332	1 121	597	342	36 045
Malicious false calls	3 747	2 229	1 441	380	372	124	110	139	8 542
System initiated false alarms	54 706	12 590	21 264	8 657	7 364	3 742	5 622	2 676	116 621
Other	5 652	1 839	2 198	931	745	53	354	334	12 106
Total other emergencies and incidents	114 981	46 705	54 147	15 285	20 183	7 082	9 285	4 600	272 268
Incident type not determined or not classified	1 682	4	-	-	-	301	24	_	2 011
Total fires, other emergencies and incidents	156 615	73 336	70 030	28 854	28 155	11 771	10 808	6 795	386 364
2007-08									
Fires									
Structure fires	7 179	6 391	2 893	1 538	1 544	639	246	173	20 603
REPORT ON								FIRE AN	ND AMBULAN
GOVERNMENT SERVICES 2016									SERVIC of TABLE 9A

Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

	NSW	Vic (d)	Qld (d)	<i>WA</i> (d)	SA (d)	Tas (d)	ACT (d)	NT (d)	Aust
Landscape fires	13 605	7 553	8 093	7 114	2 862	2 048	237	1 789	43 301
Other fires	18 461	11 297	5 774	4 251	4 137	1 381	541	361	46 203
Total fires	39 245	25 241	16 760	12 903	8 543	4 068	1 024	2 323	110 107
Other emergencies and incidents									
Non-fire rescue calls incl. road crash rescue	15 465	8 954	17 261	1 686	5 240	1 153	1 315	638	51 712
Hazardous conditions	12 508	6 365	3 468	1 109	1 599	212	431	200	25 892
Floods, storm and tempest and other natural disasters	7 508	3 005	2 859	842	2 043	388	809	234	17 688
Good intent calls	12 976	10 821	5 241	1 285	2 053	1 126	603	309	34 414
Malicious false calls	4 321	2 521	1 598	395	410	152	164	123	9 684
System initiated false alarms	51 193	12 807	20 916	8 682	8 423	3 290	5 768	2 319	113 398
Other	8 716	1 584	2 042	906	763	69	298	428	14 806
Total other emergencies and incidents	112 687	46 057	53 385	14 905	20 531	6 390	9 388	4 251	267 594
Incident type not determined or not classified	528	1	_	-	22	1 605	_	_	2 156
Total fires, other emergencies and incidents	152 460	71 299	70 145	27 808	29 096	12 063	10 412	6 574	379 857
006-07									
Fires									
Structure fires	6 971	6 233	2 747	1 452	1 534	708	278	146	20 069
Landscape fires	17 993	10 008	10 912	7 836	3 170	2 441	481	1 714	54 555
Other fires	18 597	11 143	5 526	4 128	4 352	1 517	838	394	46 495
Total fires	43 561	27 384	19 185	13 416	9 056	4 666	1 597	2 254	121 119
Other emergencies and incidents									

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Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

	NSW	Vic (d)	Qld (d)	<i>WA</i> (d)	SA (d)	Tas (d)	ACT (d)	NT (d)	Aust
Non-fire rescue calls incl. road crash rescue	14 970	8 591	16 109	1 590	4 535	990	1 278	624	48 687
Hazardous conditions	13 523	6 959	3 304	917	1 939	249	239	181	27 311
Floods, storm and tempest and other natural disasters	7 864	4 034	2 686	857	2 000	409	941	181	18 972
Good intent calls	13 628	10 865	4 717	1 456	1 978	1 206	636	345	34 831
Malicious false calls	5 093	2 547	1 752	321	591	169	181	111	10 765
System initiated false alarms	49 724	13 026	19 130	7 688	4 799	3 771	5 361	2 359	105 858
Other	9 757	1 928	1 778	831	4 796	69	444	408	20 011
Total other emergencies and incidents	114 559	47 950	49 476	13 660	20 638	6 863	9 080	4 209	266 435
Incident type not determined or not classified	423	1	-	_	50	291	-	_	765
Total fires, other emergencies and incidents	158 543	75 335	68 661	27 076	29 744	11 820	10 677	6 463	388 319
2005-06									
Fires									
Structure fires	7 342	5 574	2 720	1 348	1 455	696	331	144	19 610
Landscape fires	19 806	5 534	8 780	6 981	2 371	1 775	263	1 338	46 848
Other fires	19 118	9 124	5 305	3 675	3 840	1 358	681	357	43 458
Total fires	46 266	20 232	16 805	12 004	7 666	3 829	1 275	1 839	109 916
Other emergencies and incidents									
Non-fire rescue calls incl. road crash rescue	12 929	6 127	13 722	876	4 158	527	1 246	653	40 238
Hazardous conditions	12 481	6 097	3 202	928	1 830	234	191	211	25 174
Floods, storm and tempest and other natural disasters	6 607	4 459	2 352	814	2 259	392	1 095	184	18 162

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Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

	NSW	Vic (d)	Qld (d)	<i>WA</i> (d)	SA (d)	Tas (d)	ACT (d)	NT (d)	Aust
Good intent calls	12 922	7 821	4 212	1 290	1 617	1 047	592	246	29 747
Malicious false calls	5 061	2 005	1 584	264	629	141	161	95	9 940
System initiated false alarms	49 270	9 224	20 699	7 540	5 016	3 784	5 313	2 307	103 153
Other	9 495	11 387	2 044	759	4 580	49	450	454	29 218
Total other emergencies and incidents	108 765	47 120	47 815	12 471	20 089	6 174	9 048	4 150	255 632
Incident type not determined or not classified	_	38	8	-	45	228	_	_	319
otal fires, other emergencies nd incidents	155 031	67 390	64 628	24 475	27 800	10 231	10 323	5 989	365 867

- (a) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.
- (b) These data report the type of incident that reflects the most serious situation as determined by operational personnel after arriving at the scene and not the incident type relayed by the communication centre.
- (c) Jurisdictions provide data for both urban and rural services (including land management agencies) and for both career and volunteer services (other than the NT) see footnote d for caveats.
- (d) Jurisdiction notes:
- Vic: Landscape fires data include incidents from the Department of Environment Land Water & Planning, or its predecessors, from 2004-05 onwards. Some degree of duplicate counting may be present across Country Fire Authority and Department of Sustainability and Environment figures.
  - Due to data collection issues, data are incomplete for 2005-06.
- Qld: Accurate identification of incidents attended by the former Queensland Fire and Rescue Service (QFRS) Rural brigades prior to the 2012-13 fiscal year was not possible due to incomplete voluntary reporting procedures. Improved reporting practices have resulted in a higher rate of completion of incident reports for incidents where rural brigades are responsible. New procedures were fully implemented from 1 July 2013 in an endeavour to enhance the rate of reporting for volunteer attendances. Queensland Fire and Emergency Services (QFES) Urban stations are estimated to serve 87.6 per cent of Queensland's population.

Flooding and wet weather in 2010-11 resulted in a lower than anticipated number of landscape fires. Despite an increase in false alarms across regions affected by wet weather in 2010-11, the total number of false alarms was lower than anticipated as a result of ongoing work with building owners who have high alarm frequencies.

## Table 9A.13 Reported fires and other primary incidents attended to by fire service organisations (no.) (a), (b), (c)

This page has been changed since an earlier version of the Report. See errata at http://www.pc.gov.au/research/ongoing/report-on-government-services/2016/emergency-management#errata

NSW Vic (d) Qld (d) WA (d) SA (d) Tas (d) ACT (d) NT (d) Aust

SA: For 2013-14, the number of incidents may be understated due to Country Fire Service (CFS) industrial action between 1/12/2013 and 30/06/2014 affecting the collection of CFS incident data.

For 2004-05, the number of incidents may be understated due to Metropolitan Fire Service industrial action between 18/4/05 to 20/06/05 (no incident reports were completed during this period).

Tas: Due to industrial action 90 incident reports are incomplete in 2008-09.

ACT: Landscape fire activity increased in 2012-13 as result of a warmer and drier summer. This has also resulted in a corresponding reduction in calls to storm, tempest, flooding and other natural disasters.

For 2009-2010 and 2010-11 the lower number of landscape fires was attributable to wetter than average summer conditions.

NT: Excludes data from Bushfires NT and some NT Fire and Rescue Service volunteer brigades.

**na** Not available. – Nil or rounded to zero.

Source: State and Territory governments (unpublished).

Table 9A.14 Fire incidents attended by fire service organisations (number per 100 000 people) (a), (b), (c)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(d)	(d)		(d)	(d)		(d)	
Total fire incidents	per 100 000 peopl	le							
2014-15	408	373	400	443	422	669	220	1 154	413
2013-14	457	374	442	431	444	728	228	1 018	438
2012-13	551	434	472	468	354	804	265	1 202	490
2011-12	454	381	427	499	431	805	261	1 314	447
2010-11	474	323	311	539	402	717	247	802	411
2009-10	574	407	422	559	477	847	342	806	499
2008-09	571	501	371	614	499	874	427	986	522
2007-08	570	485	403	604	541	820	298	1 072	524
2006-07	642	537	473	646	580	949	472	1 068	587
2005-06	689	403	424	591	496	784	382	887	541
Structure fire incid	ents per 100 000 p	eople							
2014-15	95	96	57	51	89	107	62	82	82
2013-14	94	103	58	53	88	123	62	56	84
2012-13	91	109	64	60	93	132	60	68	87
2011-12	88	113	67	60	91	126	71	75	88
2010-11	93	115	63	68	86	130	67	59	89
2009-10	99	116	62	68	88	137	69	50	92
2008-09	99	122	69	70	92	160	75	77	96
2007-08	104	123	70	72	98	129	71	80	98
2006-07	103	122	68	70	98	144	82	69	97
2005-06	109	111	69	66	94	143	99	69	97
Landscape fire inc	idents per 100 000	people							
2014-15	157	112	209	253	174	280	48	940	177
2013-14	187	101	236	228	193	323	55	830	188

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Table 9A.14 Fire incidents attended by fire service organisations (number per 100 000 people) (a), (b), (c)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(d)	(d)		(d)	(d)		(d)	
2012-13	244	133	249	244	77	369	76	974	213
2011-12	146	87	208	267	145	347	54	1 078	169
2010-11	156	46	114	309	119	277	39	605	139
2009-10	228	97	236	318	174	380	75	590	207
2008-09	208	144	172	344	172	392	96	737	204
2007-08	198	145	195	333	181	413	69	826	206
2006-07	265	196	269	377	203	497	142	812	264
2005-06	295	110	221	344	153	364	79	645	231
Other fire incidents	s per 100 000 peop	le							
2014-15	157	165	135	138	159	282	111	132	154
2013-14	176	170	149	150	163	283	111	132	166
2012-13	215	192	159	164	185	302	128	160	190
2011-12	220	182	152	172	195	332	136	161	191
2010-11	225	162	133	162	197	310	141	138	182
2009-10	247	194	125	173	215	330	198	166	200
2008-09	264	235	130	200	235	322	256	172	222
2007-08	268	217	139	199	262	279	157	167	220
2006-07	274	218	136	199	279	309	248	187	225
2005-06	285	182	134	181	249	278	204	172	214

<sup>(</sup>a) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.

(b)

<sup>(</sup>c) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

<sup>(</sup>d) Jurisdiction notes:

Table 9A.14 Fire incidents attended by fire service organisations (number per 100 000 people) (a), (b), (c)

http://www.pc.gov.au/re	0				ency-managem	ent#errata			
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(d)	(d)		(d)	(d)		(d)	

Vic: Landscape fires data include incidents from the Department of Environment Land Water & Planning, or its predecessors, from 2004-05 onwards. Some degree of duplicate counting may be present across Country Fire Authority and Department of Sustainability and Environment figures.

Data for 2005-06 are incomplete, due to data collection issues.

Qld: Accurate identification of incidents attended by the former Queensland Fire and Rescue Service (QFRS) Rural brigades prior to the 2012-13 fiscal year was not possible due to incomplete voluntary reporting procedures. Improved reporting practices have resulted in a higher rate of completion of incident reports for incidents where rural brigades are responsible. New procedures were fully implemented from 1 July 2013 in an endeavour to enhance the rate of reporting for volunteer attendances. Queensland Fire and Emergency Services (QFES) Urban stations are estimated to serve 87.6 per cent of Queensland's population.

Flooding and wet weather in 2010-11 resulted in a lower than anticipated number of landscape fires.

SA: For 2013-14, the number of incidents may be understated due to Country Fire Service (CFS) industrial action between 1/12/2013 and 30/06/2014 affecting the collection of CFS incident data.

For 2004-05, the number of incidents may be understated due to Metropolitan Fire Service industrial action between 18/4/05 to 20/06/05 (no incident reports were completed during this period).

Tas: Due to industrial action 90 incident reports are incomplete in 2008-09.

NT: The high number of incidents per 100 000 people can be attributed to deliberately lit fires and the large number of grass fires in northern Australia that are caused by the annual growth of vegetation following the wet season.

Source: State and Territory governments; ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.15 Accidental residential structure fires reported to fire service organisations per 100 000 households (a), (b), (c)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(d)	(d)		(d)	(d)		(d)	
2014-15	95.2	113.4	46.9	60.2	73.6	112.9	89.1	51.4	84.5
2013-14	98.5	121.2	46.4	61.8	75.2	127.1	84.1	59.2	88.1
2012-13	114.3	128.7	50.4	62.7	76.9	147.1	96.9	86.5	97.0
2011-12	111.1	136.0	48.9	64.1	77.5	140.8	114.5	71.4	97.8
2010-11	115.5	142.8	49.9	71.4	75.1	130.7	91.7	41.0	100.8
2009-10	121.3	144.5	60.1	70.5	67.8	145.2	91.4	35.6	104.8
2008-09	123.1	140.4	61.9	76.4	71.7	173.7	100.4	53.9	106.8
2007-08	128.7	143.6	67.3	70.2	72.0	141.3	73.7	67.2	108.8
2006-07	124.3	142.9	64.7	72.2	48.2	163.8	108.7	50.6	106.1
2005-06	131.6	106.6	65.9	65.5	50.6	167.7	107.7	52.2	99.4

- (a) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.
- (b) Jurisdictions provide data for both urban and rural services (including land management agencies) and for both career and volunteer services, other than the NT see footnote d for caveats.
- (c) Rates may not be entirely comparable. The numerator (the number of accidental residential structure fires) is affected by the number of fires where the cause has been determined and classified by fire service personnel. Data for the denominator are derived from ABS Australian Demographic Statistics Household projection series by averaging household data from the start and end of a financial year to derive the financial year midpoint estimate. For example, household data for the 2012-13 financial year are the average of total households as at 30 June 2012 and as at 30 June 2013.

## (d) Jurisdiction notes:

Vic: Due to data collection issues, data are incomplete for 2005-06.

Qld: Accurate identification of incidents attended by the former Queensland Fire and Rescue Service (QFRS) Rural brigades prior to the 2012-13 fiscal year was not possible due to incomplete voluntary reporting procedures. Improved reporting practices have resulted in a higher rate of completion of incident reports for incidents where rural brigades are responsible. New procedures were fully implemented from 1 July 2013 in an endeavour to enhance the rate of reporting for volunteer attendances. Queensland Fire and Emergency Services (QFES) Urban stations are estimated to serve 87.6 per cent of Queensland's population.

SA: For 2013-14, the number of incidents may be understated due to Country Fire Service (CFS) industrial action between 1/12/2013 and 30/06/2014 affecting the collection of CFS incident data.

For 2004-05, the number of incidents may be understated due to Metropolitan Fire Service industrial action between 18/4/05 to 20/06/05 (no incident reports were completed during this period).

Tas: Due to industrial action 90 incident reports are incomplete in 2008-09.

NT: Data are for NT Fire and Rescue Service permanent fire stations only.

Source: State and Territory governments (unpublished); ABS 2010, Household and Family Projections, 2006 to 2031, Cat. no. 3236.0, Canberra (table 2A.25).

Table 9A.16 Fire service organisations (including land management agencies) reported total landscape fires (bush and grass) incidents (no.) and rates (a), (b), (c)

	raics (a	), (D), (C)	,						
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(e)	(e)		(e)	(e)	(e)	(e)	
Number of land	scape fires								
2014-15	11 866	6 591	9 924	6 540	2 946	1 443	185	2 296	41 791
2013-14	13 958	5 872	11 066	5 805	3 240	1 658	210	2 013	43 822
2012-13	17 932	7 529	11 480	6 044	1 280	1 893	290	2 308	48 756
2011-12	10 568	4 825	9 367	6 366	2 382	1 775	199	2 504	37 986
2010-11	11 222	2 520	5 072	7 175	1 944	1 413	142	1 393	30 881
2009-10	16 201	5 253	10 298	7 199	2 810	1 925	268	1 343	45 297
2008-09	14 583	7 661	7 358	7 607	2 749	1 966	337	1 640	43 901
2007-08	13 605	7 553	8 093	7 114	2 862	2 048	237	1 789	43 301
2006-07	17 993	10 008	10 912	7 836	3 170	2 441	481	1 714	54 555
2005-06	19 806	5 534	8 780	6 981	2 371	1 775	263	1 338	46 848
Landscape fires	per 100 000	people							
2014-15	157	112	209	253	174	280	48	940	177
2013-14	187	101	236	228	193	323	55	830	188
2012-13	244	133	249	244	77	369	76	974	213
2011-12	146	87	208	267	145	347	54	1078	169
2010-11	156	46	114	309	119	277	39	605	139
2009-10	228	97	236	318	174	380	75	590	207
2008-09	208	144	172	344	172	392	96	737	204
2007-08	198	145	195	333	181	413	69	826	206
2006-07	265	196	269	377	203	497	142	812	264
2005-06	295	110	221	344	153	364	79	645	231
Landscape fires	per 100 000	hectares	(d)						
2014-15	14.8	29.0	5.7	2.6	3.0	21.1	78.5	1.7	5.4
2013-14	17.4	25.8	6.4	2.3	3.3	24.2	89.1	1.5	5.7
2012-13	22.4	33.1	6.6	2.4	1.3	27.7	123.0	1.7	6.3
2011-12	13.2	21.2	5.4	2.5	2.4	25.9	84.4	1.9	4.9
2010-11	14.0	11.1	2.9	2.8	2.0	20.7	60.2	1.0	4.0
2009-10	20.2	23.1	6.0	2.8	2.9	28.1	113.7	1.0	5.9
2008-09	18.2	33.7	4.3	3.0	2.8	28.7	142.9	1.2	5.7
2007-08	17.0	33.2	4.7	2.8	2.9	29.9	100.5	1.3	5.6
2006-07	22.5	44.0	6.3	3.1	3.2	35.7	204.0	1.3	7.1
2005-06	24.7	24.3	5.1	2.8	2.4	25.9	111.5	1.0	6.1

<sup>(</sup>a) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.

<sup>(</sup>b) Jurisdictions provide data for both urban and rural services (including land management agencies) and for both career and volunteer services, other than the NT — see footnote e for caveats. Landscape fire incidents include all bush and grass fires regardless of size of area burnt.

<sup>(</sup>c) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

<sup>(</sup>d) 100 hectares equals one square kilometre.

Table 9A.16 Fire service organisations (including land management agencies) reported total landscape fires (bush and grass) incidents (no.) and rates (a), (b), (c)

 NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
	(e)	(e)		(e)	(e)	(e)	(e)	

(e) Jurisdiction notes:

Vic: From 2004-05 data include incidents from the Department of Environment Land Water & Planning, or its predecessors.

Black Saturday (Victorian fires 2009) is treated as a single landscape fire event in 2008-09.

Due to data collection issues, data are incomplete for 2005-06.

Qld: Accurate identification of incidents attended by the former Queensland Fire and Rescue Service (QFRS) Rural brigades prior to the 2012-13 fiscal year was not possible due to incomplete voluntary reporting procedures. Improved reporting practices have resulted in a higher rate of completion of incident reports for incidents where rural brigades are responsible. New procedures were fully implemented from 1 July 2013 in an endeavour to enhance the rate of reporting for volunteer attendances. Queensland Fire and Emergency Services (QFES) Urban stations are estimated to serve 87.6 per cent of Queensland's population.

Flooding and wet weather in 2010-11 resulted in a lower than anticipated number of landscape fires.

SA: For 2013-14, the number of incidents may be understated due to Country Fire Service (CFS) industrial action between 1/12/2013 and 30/06/2014 affecting the collection of CFS incident data.

For 2004-05, the number of incidents may be understated due to Metropolitan Fire Service industrial action between 18/4/05 to 20/06/05 (no incident reports were completed during this period).

Tas: Due to industrial action 90 incident reports are incomplete in 2008-09.

ACT: Landscape fire activity increased in 2012-13 as result of a warmer and drier summer.

For 2009-10 and 2010-11 the lower number of landscape fires were attributable to wetter than average summer conditions.

NT: Excludes data from Bushfires NT and some NT Fire and Rescue Service volunteer brigades. Includes 11 responses from NT Emergency Service who provide response in some remote communities across the Northern Territory.

Source: State and Territory governments (unpublished); Geoscience Australia 2011, Area of Australia - States and Territories, www.ga.gov.au/education/geoscience-basics/dimensions/area-of-australia-states-and-territories.html (accessed October 2011); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.17 **Ignition factors for structure fires** 

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust		Aust
		(k)		(k)		(k)			(k)			
2014-15												
Structure fires ignited due to misuse, failure or deficiency	%	60.6	62.4	52.1	65.5	12.7	48.1	73.8	62.7	55.9	no.	9 712
Misuse of heat of ignition (a)	%	13.4	9.9	12.5	13.9	3.9	4.2	24.2	10.6	11.2	no.	1 937
Abandoned, discarded material - incl. cigarettes	%	3.0	5.0	2.6	3.2	3.9	3.3	9.2	5.0	3.8	no.	658
Other	%	10.4	4.9	9.9	10.7	_	0.9	15.0	5.6	7.4	no.	1 279
Misuse of material ignited (b)	%	3.2	3.6	3.8	4.1	_	2.4	7.1	6.8	3.3	no.	569
Mechanical failure, malfunction (c)	%	20.2	19.7	13.4	22.9	7.2	9.2	16.3	23.0	17.7	no.	3 068
Short-circuit and other electrical failure	%	11.2	12.0	7.8	14.8	7.2	7.2	4.2	18.6	10.7	no.	1 865
Other	%	8.9	7.6	5.5	8.1	_	2.0	12.1	4.3	6.9	no.	1 203
Design, construction, installation deficiency (d)	%	1.8	2.6	1.1	5.2	8.0	3.8	3.3	1.9	2.2	no.	384
Operational deficiency (e)	%	22.1	26.7	21.3	19.3	0.8	28.6	22.9	20.5	21.6	no.	3 754
Unattended heat sources	%	13.7	18.0	13.2	9.8	_	16.1	10.4	7.5	13.5	no.	2 348
Other	%	8.4	8.6	8.1	9.5	0.8	12.5	12.5	13.0	8.1	no.	1 406
Deliberately or suspiciously set fires	%	9.0	11.7	7.5	19.7	7.6	22.2	13.8	9.3	10.8	no.	1 882
Incendiary (f)	%	3.6	8.0	4.0	7.5	0.1	22.2	2.5	6.2	3.3	no.	580
Suspicious (g)	%	5.4	10.9	3.6	12.3	7.5	_	11.3	3.1	7.5	no.	1 302
Other ignition factors	%	5.1	12.4	3.3	3.0	39.5	18.8	5.4	1.9	10.4	no.	1 811
Natural event (h)	%	2.0	0.9	0.3	1.6	_	0.5	1.7	0.6	1.1	no.	196
Other factors (i)	%	3.0	11.5	3.0	1.4	39.5	18.3	3.8	1.2	9.3	no.	1 615
Ignition factors not determined (j)	%	25.3	13.5	37.0	11.8	40.2	10.8	7.1	26.1	22.8	no.	3 964
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0		
Total Structure fires	no.	5 219	5 663	2 704	1 327	1 502	553	240	161	17 369		17 369

Table 9A.17 **Ignition factors for structure fires** 

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust		Aust
		(k)		(k)		(k)			(k)			
2013-14												
Structure fires ignited due to misuse, failure or deficiency	%	61.3	62.4	50.7	66.5	15.9	47.4	67.8	49.6	56.6	no.	10 974
Misuse of heat of ignition (such as Abandoned, discarded material - incl. cigarettes) (a)	%	13.7	9.0	10.7	15.5	4.2	3.5	20.9	21.2	11.0	no.	2 140
Misuse of material ignited (b)	%	3.3	3.3	4.5	5.1	_	2.1	4.6	2.9	3.3	no.	646
Mechanical failure, malfunction (such as electrical failure) (c)	%	19.1	19.5	12.7	21.3	9.6	9.8	12.6	21.9	17.4	no.	3 372
Design, construction, installation deficiency (d)	%	1.9	2.6	1.0	4.9	0.7	3.8	2.1	_	2.1	no.	416
Operational deficiency (such as unattended heat sources) (e)	%	23.3	28.0	21.9	19.8	1.4	28.2	27.6	3.6	22.7	no.	4 400
Deliberately or suspiciously set fires	%	9.8	10.4	6.0	16.2	7.7	20.8	20.9	12.4	10.2	no.	1 986
Incendiary (f)	%	3.9	0.5	3.2	5.7	0.1	20.8	5.0	0.7	3.1	no.	604
Suspicious (g)	%	5.9	9.9	2.8	10.5	7.7	_	15.9	11.7	7.1	no.	1 382
Other ignition factors	%	3.8	13.3	2.7	3.9	38.4	21.1	4.2	2.9	9.8	no.	1 896
Natural event (h)	%	0.9	0.7	0.2	0.9	0.3	0.3	_	_	0.7	no.	128
Other factors (i)	%	2.9	12.6	2.5	3.0	38.1	20.8	4.2	2.9	9.1	no.	1 768
Undetermined (j)	%	25.1	13.9	40.6	13.4	38.0	10.8	7.1	35.0	23.3	no.	4 522
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0		
Total structure fires	no.	6 846	5 977	2 713	1 360	1 475	631	239	137	19 378		19 378
2012-13												
Structure fires ignited due to misuse, failure or deficiency	%	62.3	73.7	49.8	62.0	22.7	50.7	75.0	55.0	60.2	no.	12 037
Misuse of heat of ignition (such as Abandoned, discarded material - incl. cigarettes) (a)	%	14.3	11.9	12.6	14.2	5.8	5.5	23.2	16.9	12.4	no.	2 471
Misuse of material ignited (b)	%	3.8	4.8	3.9	4.7	1.0	3.4	5.7	4.4	4.0	no.	794
Design, construction, installation deficiency (d)	%	1.8	2.8	1.2	4.0	0.7	3.0	2.2	0.6	2.1	no.	425

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Table 9A.17 **Ignition factors for structure fires** 

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust		Aust
		(k)		(k)		(k)			(k)			
Operational deficiency (such as unattended heat sources) (e)	%	25.7	31.8	19.5	18.1	1.9	28.6	25.9	15.0	24.1	no.	4 807
Deliberately or suspiciously set fires	%	9.0	10.2	6.1	14.4	12.2	22.8	16.7	15.6	10.2	no.	2 048
Incendiary (f)	%	3.4	0.5	3.7	3.5	_	22.8	3.9	1.3	2.9	no.	577
Suspicious (g)	%	5.7	9.7	2.3	10.8	12.2	_	12.7	14.4	7.4	no.	1 471
Other ignition factors	%	7.4	3.3	2.9	3.5	30.2	18.3	4.8	2.5	7.5	no.	1 492
Natural event (h)	%	0.5	0.8	0.4	1.2	_	0.9	_	0.6	0.6	no.	125
Other factors (i)	%	6.8	2.5	2.5	2.3	30.2	17.5	4.8	1.9	6.8	no.	1 367
Undetermined (j)	%	21.2	12.8	41.2	20.1	34.9	8.1	3.5	26.9	22.1	no.	4 407
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0		
Total structure fires	no.	6 557	6 200	2 949	1 475	1 739	676	228	160	19 984		19 984
2011-12												
Structure fires ignited due to misuse, failure or deficiency	%	46.5	53.4	33.2	42.2	16.5	49.8	65.9	32.6	44.3	no.	<b>8 70</b> 1
Misuse of heat of ignition (such as Abandoned, discarded material - incl. cigarettes) (a)	%	6.8	6.3	5.7	8.5	3.3	4.0	15.9	5.7	6.3	no.	1 245
Misuse of material ignited (b)	%	2.5	2.5	3.0	2.4	_	2.2	2.4	1.1	2.3	no.	462
Mechanical failure, malfunction (such as electrical failure) (c)	%	12.3	16.9	7.8	14.4	10.7	11.5	13.9	17.1	13.1	no.	2 583
Design, construction, installation deficiency (d)	%	1.7	2.9	0.8	4.2	0.9	3.1	4.8	_	2.1	no.	415
Operational deficiency (such as unattended heat sources) (e)	%	23.3	24.9	15.9	12.6	1.6	29.0	28.8	8.6	20.3	no.	3 996
Deliberately or suspiciously set fires	%	10.3	10.4	6.3	13.5	8.4	21.4	23.1	5.7	10.3	no.	2 021
Incendiary (f)	%	3.8	0.5	3.5	4.1	0.2	21.4	2.4	0.6	3.0	no.	587
Suspicious (g)	%	6.5	9.9	2.7	9.4	8.2	_	20.7	5.1	7.3	no.	1 434
Other ignition factors	%	20.0	24.2	15.2	23.3	38.8	21.1	6.7	25.1	22.2	no.	4 369

Table 9A.17 **Ignition factors for structure fires** 

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust		Aust
		(k)		(k)		(k)			(k)			
Natural event (h)	%	0.5	0.8	0.3	1.0	0.2	1.1	_	0.6	0.6	no.	116
Other factors (i)	%	19.6	23.3	15.0	22.3	38.6	20.0	6.7	24.6	21.6	no.	4 253
Undetermined (j)	%	23.1	12.0	45.3	21.1	36.3	7.8	4.3	36.6	23.2	no.	4 570
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0		•
Total structure fires	no.	6 402	6 278	3 017	1 442	1 494	645	208	175	19 661		19 661
2010-11												
Structure fires ignited due to misuse, failure or deficiency	%	48.2	54.1	31.5	42.7	16.9	47.7	52.2	19.9	44.9	no.	8 894
Misuse of heat of ignition (such as Abandoned, discarded material - incl. cigarettes) (a)	%	7.4	5.9	6.2	8.7	2.8	2.9	15.5	8.1	6.5	no.	1 283
Misuse of material ignited (b)	%	2.8	2.6	2.4	2.1	_	2.9	4.9	0.7	2.4	no.	482
Mechanical failure, malfunction (such as electrical failure) (c)	%	12.6	15.9	7.8	16.0	10.8	9.8	9.4	5.9	12.9	no.	2 561
Design, construction, installation deficiency (d)	%	2.4	2.8	1.4	5.0	0.7	4.1	3.3	0.7	2.5	no.	494
Operational deficiency (such as unattended heat sources) (e)	%	23.0	27.1	13.8	10.9	2.6	28.1	19.2	4.4	20.6	no.	4 074
Deliberately or suspiciously set fires	%	9.6	10.7	5.9	14.7	9.1	23.7	21.6	2.2	10.4	no.	2 051
Incendiary (f)	%	3.2	0.4	3.5	3.5	0.2	23.7	5.7	0.7	2.9	no.	567
Suspicious (g)	%	6.4	10.2	2.4	11.2	8.8	_	15.9	1.5	7.5	no.	1 484
Other ignition factors	%	19.9	23.3	16.5	23.9	34.2	15.2	23.7	24.3	21.7	no.	4 305
Natural event (h)	%	0.5	0.7	0.3	0.9	0.2	0.5	0.8	1.5	0.6	no.	111
Other factors (i)	%	19.4	22.6	16.2	23.0	34.0	14.8	22.9	22.8	21.2	no.	4 194
Undetermined (j)	%	22.3	12.0	46.1	18.7	39.8	13.4	2.4	53.7	23.0	no.	4 557
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0		
Total structure fires	no.	6 675	6 307	2 811	1 567	1 403	663	245	136	19 807		19 807
2009-10												

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Table 9A.17 **Ignition factors for structure fires** 

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust		Aust
		(k)		(k)		(k)			(k)			
Structure fires ignited due to misuse, failure or deficiency	%	47.1	55.0	36.7	43.2	15.7	46.1	51.8	27.2	45.6	no.	9 132
Misuse of heat of ignition (such as Abandoned, discarded material - incl. cigarettes) (a)	%	8.5	6.1	7.8	8.8	3.7	4.5	10.7	5.3	7.2	no.	1 442
Misuse of material ignited (b)	%	2.8	2.2	1.9	2.1	_	3.2	3.2	0.9	2.2	no.	446
Mechanical failure, malfunction (such as electrical failure) (c)	%	11.2	16.1	8.8	15.7	9.7	7.9	13.8	10.5	12.6	no.	2 523
Design, construction, installation deficiency (d)	%	1.9	3.5	2.2	4.5	1.0	1.4	4.0	1.8	2.6	no.	519
Operational deficiency (such as unattended heat sources) (e)	%	22.7	27.2	16.0	12.1	1.3	29.1	20.2	8.8	21.0	no.	4 202
Deliberately or suspiciously set fires	%	10.4	10.4	9.4	12.6	10.4	23.6	22.1	3.5	11.0	no.	2 200
Incendiary (f)	%	3.6	0.5	5.2	3.5	na	23.6	3.2	_	3.3	no.	652
Suspicious (g)	%	6.8	9.9	4.2	9.0	10.4	_	19.0	3.5	7.7	no.	1 548
Other ignition factors	%	20.7	22.4	19.6	23.0	32.7	17.9	23.3	15.8	22.0	no.	4 413
Natural event (h)	%	0.5	0.9	0.6	1.0	0.1	_	0.8	_	0.6	no.	130
Other factors (i)	%	20.1	21.5	19.0	22.1	32.6	17.9	22.5	15.8	21.4	no.	4 283
Undetermined (j)	%	21.9	12.3	34.2	21.2	41.3	12.4	2.8	53.5	21.5	no.	4 302
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0		
Total structure fires	no.	7 044	6 286	2 688	1 550	1 418	694	253	114	20 047		20 047
2008-09												
Structure fires ignited due to misuse, failure or deficiency	%	47.9	52.3	36.0	44.0	16.5	50.3	48.7	21.5	45.0	no.	9 207
Misuse of heat of ignition (such as Abandoned, discarded material - incl. cigarettes) (a)	%	8.5	6.4	7.3	8.7	3.6	4.5	13.3	7.0	7.2	no.	1 48
Misuse of material ignited (b)	%	2.9	2.2	2.1	2.9	0.7	2.1	3.4	0.6	2.4	no.	484
Mechanical failure, malfunction (such as electrical failure) (c)	%	11.8	15.9	8.8	16.1	9.3	10.1	11.8	4.7	12.7	no.	2 600

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Table 9A.17 **Ignition factors for structure fires** 

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust		Aust
		(k)		(k)		(k)			(k)			
Design, construction, installation deficiency (d)	%	1.9	2.7	1.8	4.5	1.0	3.1	1.5	2.3	2.3	no.	474
Operational deficiency (such as unattended heat sources) (e)	%	22.8	25.1	15.9	11.9	2.0	30.6	18.6	7.0	20.4	no.	4 168
Deliberately or suspiciously set fires	%	11.6	11.1	11.4	18.4	13.1	17.6	20.5	5.8	12.4	no.	2 528
Incendiary (a)	%	3.7	0.5	5.6	4.8	na	17.6	1.5	1.2	3.3	no.	676
Suspicious (b)	%	7.9	10.6	5.8	13.6	13.1	_	19.0	4.7	9.1	no.	1 852
Other ignition factors	%	22.6	24.2	18.6	14.5	31.9	21.0	26.2	22.7	22.6	no.	4 625
Natural event (h)	%	0.6	8.0	0.4	0.5	0.3	0.9	0.4	1.2	0.6	no.	122
Other factors (i)	%	22.1	23.4	18.2	14.0	31.6	20.1	25.9	21.5	22.0	no.	4 503
Undetermined (j)	%	17.9	12.4	33.9	23.1	38.5	11.1	4.6	50.0	20.1	no.	4 104
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0		
Total structure fires	no.	6 917	6 459	2 836	1 543	1 469	805	263	172	20 464		20 464

- (a) Misuse of heat of ignition includes: Abandoned, discarded material (including discarded cigarettes); Thawing; Falling asleep; Inadequate control of open fire; Cutting, welding; Children playing with heat of ignition (such as matches); Unconscious; Mental impairment; Physical impairment; Affected by drugs; Intoxication by alcohol.
- (b) Misuse of material ignited includes: Fuel spilled, released accidentally; Improper fuelling technique; Flammable liquid used to kindle fire; Washing part, cleaning, refinishing, painting; Improper container; Combustible too close to heat; Children with ignited material.
- (c) Mechanical failure, malfunction includes: Short-circuit, ground fault; Part failure, leak, break; Automatic/Manual control failure; Other electrical failure; Lack of maintenance, worn out; and Backfire.
- (d) Design, construction, installation deficiency includes: Design deficiency; Construction deficiency; Installed too close to combustibles; Other installation deficiency; Property too close to other heat source.
- (e) Operational deficiency includes: Collision, overturn, knock over; Accidentally turned on, not turned off; Unattended Overloaded; Spontaneous heating; Improper start-up, shut-down procedures; Failure to clean included is a fouled flue.
- (f) Incendiary, legal decision or physical evidence indicates that the fire was deliberately set.
- (g) Suspicious circumstances indicate the possibility that the fire may have been deliberately set.
- (h) Factors include: High wind; Earthquake; High water, including floods; Lightning.
- (i) Factors include: Animal; Re-kindled from a previous fire; Vehicle included are exhaust systems and other vehicle parts.
- (j) Structure fires whose cause was either undetermined or not reported

## Table 9A.17 **Ignition factors for structure fires**

NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust	Aust
 (k)		(k)		(k)			(k)		

## (k) Jurisdiction notes:

- NSW: For the NSW Rural Fire Service volunteer brigades, ignition factor is not mandatory data item to be reported for Structure Fires. In cases where ignition factor is not entered, the data are excluded from the total structure fires calculation in this table. As a result, the totals may not add up to the total structure fires in table 9A.14.
- Qld: Accurate identification of incidents attended by the former Queensland Fire and Rescue Service (QFRS) Rural brigades prior to the 2012-13 fiscal year was not possible due to incomplete voluntary reporting procedures. Improved reporting practices have resulted in a higher rate of completion of incident reports for incidents where rural brigades are responsible. New procedures were fully implemented from 1 July 2013 in an endeavour to enhance the rate of reporting for volunteer attendances. Queensland Fire and Emergency Services (QFES) Urban stations are estimated to serve 87.6 per cent of Queensland's population.
- SA: For 2013-14, Country Fire Service (CFS) industrial action between 1/12/2013 and 30/06/2014 affected the collection of CFS incident data. 2012–13 data for structure fires ignited due to misuse, failure or deficiency data have been revised.
  - For 2004-05, Metropolitan Fire Service (MFS) industrial action between 18/4/05 to 20/06/05 affected the collection of MFS incident data (no incident reports were completed during this period).
- NT: A change to the grouping for suspicious structure fires has resulted in a increase in figures for this category in 2012-13.

Source: State and Territory Governments (unpublished).

Table 9A.18 Hazardous materials incidents (a), (b), (c), (d), (e)

						, , , , ,	•		
	NSW (f)	Vic (f)	Qld (f)	WA	SA	Tas	ACT	NT	Aust
Hazardous mat	erials incider	nts (per 10	00 000 peo <sub>l</sub>	ple)					
2014-15	29.4	16.8	6.5	7.6	10.9	7.2	35.6	62.6	17.9
2013-14	12.3	15.1	6.7	6.5	13.1	8.4	26.0	54.4	11.9
2012-13	11.0	18.0	9.6	6.8	13.9	6.0	32.7	59.9	13.0
2011-12	10.5	16.1	6.6	5.7	11.9	7.2	39.7	58.1	11.6
2010-11	11.3	17.0	7.8	5.5	12.4	6.1	37.8	56.9	12.3
2009-10	12.0	17.9	7.3	4.5	10.1	9.1	36.0	76.8	12.6
2008-09	13.0	17.1	10.1	3.2	29.2	6.2	37.0	82.7	14.6
2007-08	11.3	27.8	10.0	4.1	11.4	5.2	52.0	41.5	15.2
2006-07	14.3	32.1	8.0	4.5	69.0	7.3	37.5	77.7	21.5
2005-06	12.6	24.8	7.3	4.1	72.2	6.1	18.6	114.8	19.3
Hazardous mat	erials incider	nts (numb	er)						
2014-15	2 221	989	309	195	185	37	138	153	4 227
2013-14	915	877	313	167	219	43	100	132	2 766
2012-13	806	1 023	443	169	231	31	124	142	2 969
2011-12	760	898	300	135	196	37	147	135	2 608
2010-11	809	937	347	127	202	31	138	131	2 722
2009-10	854	970	319	101	164	46	129	175	2 758
2008-09	911	910	430	70	466	31	130	184	3 132
2007-08	777	1 448	415	87	180	26	179	90	3 202
2006-07	971	1 637	324	94	1 077	36	127	164	4 430
2005-06	848	1 245	288	84	1 116	30	62	238	3 911

- (a) Data may differ from those in table 9A.4 which include fires involving or releasing hazardous materials. Data also exclude minor fuel or other flammable liquid spills/leaks less than 200 litres except for SA in 2006-07 and the ACT for all years.
- (b) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September guarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.
- (c) Data represent incidents attended by Fire Service Organisations (FSOs). FSOs may not be notified of all hazardous materials incidents occurring in the community.
- (d) Coding of hazardous materials incidents is based on the judgment of the reporting fire officer shortly after the time of the incident. Some coding of incidents may be inaccurate due to the information available at the time of reporting.
- (e) Changes to hazardous materials incident reporting were accepted and ratified by the AFAC SIMSG in November 2005 for implementation from July 1 2006. However, each fire service may have implemented these changes at different times, with implementation complete in the 2009-10 year.
- (f) Jurisdiction notes:

NSW: In 2015 FRNSW implemented a new reporting system. The data fields eAIRS Incident Type, Primary Response Activity and Additional Response Activity were used to derive the number of materials incidents attended by FSO. The increase in the number of materials incidents attended by FSO may be a result of better reporting and not an actual increase in incidents.

Vic: 2011-12 and 2012-13 hazardous material data have been revised from the data published in the 2013 and 2014 reports to correct a coding error.

Table 9A.18 Hazardous materials incidents (a), (b), (c), (d), (e)

NSW (f) Vic (f) Qld (f) WA SA Tas ACT NT Aust

Qld: Accurate identification of incidents attended by the former Queensland Fire and Rescue Service (QFRS) Rural brigades prior to the 2012-13 fiscal year was not possible due to incomplete voluntary reporting procedures. Improved reporting practices have resulted in a higher rate of completion of incident reports for incidents where rural brigades are responsible. New procedures were fully implemented from 1 July 2013 in an endeavour to enhance the rate of reporting for volunteer attendances. Queensland Fire and Emergency Services (QFES) Urban stations are estimated to serve 87.6 per cent of Queensland's population.

Source: State and Territory governments; ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.19 Reported road crash rescue incidents (number) (a), (b)

	•				•		, , , , ,		
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(d)	(d)				(d)	(d)	
Total incidents									_
2014-15	3 761	2 086	7 542	1 081	6 517	466	697	554	22 704
2013-14	4 512	2 157	7 733	1 021	6 090	524	625	303	22 965
2012-13	4 542	2 013	7 685	1 031	6 022	475	658	28	22 454
2011-12	5 332	2 235	7 675	937	5 593	475	666	70	22 983
2010-11	5 247	2 157	7 501	1 053	6 633	494	630	332	24 047
2009-10	5 515	1 910	6 995	791	5 788	395	668	304	22 366
2008-09	6 163	2 166	8 436	885	5 799	476	451	430	24 806
2007-08	6 166	2 200	8 192	798	3 592	460	489	408	22 305
2006-07	7 002	2 258	7 809	845	1 997	475	954	437	21 777
2005-06	6 358	2 151	6 814	584	2 379	520	903	446	20 155
Incidents per 100 0	)00 people (	<b>c</b> )							
2014-15	49.7	35.4	158.8	41.9	385.3	90.4	179.8	226.8	96.1
2013-14	60.4	37.2	164.9	40.0	363.1	102.0	162.7	124.9	98.5
2012-13	61.8	35.4	166.7	41.7	362.3	92.7	173.4	11.8	98.0
2011-12	73.6	40.1	170.1	39.3	340.0	92.8	179.6	30.1	102.2
2010-11	73.1	39.2	169.1	45.4	406.3	96.8	172.7	144.2	108.5
2009-10	77.7	35.2	160.2	34.9	357.6	78.0	186.7	133.5	102.3
2008-09	88.0	40.8	197.3	40.1	362.9	94.9	128.5	193.2	115.5
2007-08	89.6	42.3	196.9	37.4	227.6	92.8	142.1	188.3	106.1
2006-07	103.2	44.2	192.5	40.7	127.9	96.6	281.9	207.1	105.6
2005-06	94.6	42.8	171.9	28.8	154.0	106.5	270.8	215.1	99.2

- (a) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.
- (b) For road crash rescue, jurisdictions provide data for both fire service organisations and State/Territory Emergency Services. Data are counted for both urban and rural services and for both career and volunteer services, other than the NT see footnote d for caveats.
- (c) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.
- (d) Jurisdiction notes:
  - Vic: 2010-11 data excludes 'cancelled before arrival' incidents.
    - Due to data collection issues, data are incomplete for 2005-06.
  - Qld: The decrease in the former Queensland Fire and Rescue Service (QFRS) attendance at traffic incidents in 2009-10 and 2010-11 can be attributed to the revised road crash rescue protocols implemented in September 2009 to reduce unnecessary attendance by the Queensland Fire and Emergency Services (QFES) at mobile property crashes.
    - Flooding and wet weather in 2010-11 also resulted in a lower than anticipated number of road crash rescue incidents.
  - ACT: Data analysis has been refined in 2007-08 to better reflect road crash rescue incidents.

Table 9A.19 Reported road crash rescue incidents (number) (a), (b)

NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
	(d)	(d)				(d)	(d)	

NT: The Northern Territory Fire and Rescue Service is currently examining its data reporting and inputting processes to ensure accurate reporting in line with the counting rules as defined in the data dictionary. Figures for 2012-13 are likely to indicate considerable under-reporting.

The number of reported road rescue incidents for NTES volunteers does not include those RCR assists with police where a PROMIS number has been created.

Source: State and Territory governments; ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.20 Reported road crash rescue extrications (number)

1 4510 07 1120	Nopolioa loaa (	51 a 511 1 5 5 5 a	o oxti ioatio						
	NSW	Vic (f)	Qld (f)	WA (f)	SA	Tas	ACT	NT (f)	Aust
Total extrications	3								
2014-15	2 879	1 216	2 163	536	557	104	261	121	7 837
2013-14	3 890	1 494	2 170	507	416	125	257	130	8 989
2012-13	3 933	1 390	2 443	506	365	120	249	19	9 025
2011-12	4 046	1 499	2 405	487	391	31	244	37	9 140
2010-11	4 105	2 517	2 260	517	589	166	261	122	10 537
2009-10	4 111	2 113	1 982	413	550	104	323	113	9 709
2008-09	4 481	1 672	2 382	508	549	129	80	138	9 939
2007-08	4 180	1 704	2 183	446	533	146	108	108	9 408
2006-07	4 453	1 751	2 104	570	524	117	487	91	10 097
2005-06	4 073	1 831	1 829	373	666	389	485	294	9 940
Extrications per	100 000 people (a)								
2014-15	38.1	20.7	45.5	20.8	32.9	20.2	67.3	49.5	33.2
2013-14	52.1	25.8	46.3	19.9	24.8	24.3	66.9	53.6	38.5
2012-13	53.5	24.5	53.0	20.5	22.0	23.4	65.6	8.0	39.4
2011-12	55.8	26.9	53.3	20.4	23.8	6.1	65.8	15.9	40.6
2010-11	57.2	45.8	50.9	22.3	36.1	32.5	71.5	53.0	47.5
2009-10	57.9	39.0	45.4	18.2	34.0	20.5	90.3	49.6	44.4
2008-09	64.0	31.5	55.7	23.0	34.4	25.7	22.8	62.0	46.3
2007-08	60.7	32.8	52.5	20.9	33.8	29.4	31.4	49.9	44.8
2006-07	65.6	34.3	51.9	27.4	33.6	23.8	143.9	43.1	48.9
2005-06	60.6	36.5	46.1	18.4	43.1	79.7	145.4	141.8	48.9
Extrications per	100 000 registered ve	hicles (b)							
2014-15	54.9	26.6	57.4	24.5	41.3	23.1	92.0	78.0	43.5
2013-14	76.2	33.3	58.6	23.7	31.4	28.2	92.0	85.4	51.0
2012-13	78.9	31.7	67.7	24.7	28.1	27.5	90.9	12.8	52.5
2011-12	83.1	35.0	68.9	24.6	30.7	7.2	91.3	26.2	54.6
2010-11	85.9	60.0	66.4	27.0	46.7	39.6	100.8	89.0	64.4

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Table 9A.20 Reported road crash rescue extrications (number)

	NSW	Vic (f)	Qld (f)	WA (f)	SA	Tas	ACT	NT (f)	Aust
2009-10	87.8	51.4	59.0	22.1	44.4	25.4	127.2	83.9	60.5
2008-09	98.1	41.7	72.6	27.8	45.4	32.2	32.4	107.2	63.4
2007-08	93.7	43.5	68.8	25.5	45.2	37.3	44.7	87.8	61.7
2006-07	102.1	45.9	69.4	34.0	45.3	30.7	207.6	77.0	68.3
2005-06	95.4	48.9	63.1	23.3	58.5	103.8	211.5	257.9	69.2
Extrications per 100	million vehicle ki	lometres trave	elled (c)						
2014-15	4.0	1.9	3.9	1.8	3.2	2.0	6.5	2.2	3.1
2013-14	5.6	2.4	4.0	1.7	2.5	2.5	6.5	2.5	3.7
2012-13	5.8	2.3	4.6	1.8	2.2	2.4	6.4	0.4	3.8
2011-12	6.1	2.5	4.7	1.8	2.4	0.6	6.4	0.8	3.9
2010-11	6.2	4.2	4.5	1.9	3.8	3.4	7.1	3.6	4.6
2009-10	6.2	3.5	4.1	1.6	3.8	2.1	9.1	5.8	4.3
2008-09	6.7	2.8	4.9	1.9	3.8	2.6	2.3	7.1	4.4
2007-08	6.7	2.9	4.7	1.8	3.8	2.9	3.4	6.1	4.4
2006-07	7.1	3.0	4.6	2.3	3.7	2.3	15.4	5.1	4.7
2005-06	6.6	3.3	4.0	2.4	2.9	7.7	16.1	17.9	4.7

<sup>(</sup>a) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.

Vic: A higher number of extrications has been observed for 2009-10 due to incidents involving more than one extrication.

<sup>(</sup>b) For road crash rescue, jurisdictions provide data for both fire service organisations and State/Territory Emergency Services. Data are counted for both urban and rural services and for both career and volunteer services, other than the NT — see footnote f for caveats.

<sup>(</sup>c) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

<sup>(</sup>d) Registered vehicle numbers from the ABS *Motor Vehicle Census* (ABS 2014 and various years). ABS revisions to census data means that the rates shown here may differ from those in previous reports.

<sup>(</sup>e) Kilometres travelled: For years 2006-07 (and prior), 2009-10, and 2011-12 data are from the ABS *Survey of Motor Vehicle Use* (ABS 2013). For 2007-08 data are from ABS *Experimental estimates of motor vehicle use* (ABS 2009). For 2008-09 and 2010-11 data are estimated as the mid point between ABS published points. 2012-13 data are estimated as 2011-12 data plus a growth factor (equal to the growth of the number of registered vehicles). ABS revisions to survey data means that the rates shown here may differ from those in previous reports.

<sup>(</sup>f) Jurisdiction notes:

Table 9A.20 Reported road crash rescue extrications (number)

NSW Vic (f) Qld (f) WA (f) SA Tas ACT NT (f) Aust

Due to data collection issues, data are incomplete for 2005-06.

Qld: The decrease in the former Queensland Fire and Rescue Service (QFRS) attendance at traffic incidents in 2009-10 and 2010-11 can be attributed to the revised road crash rescue protocols implemented in September 2009 to reduce unnecessary attendance at mobile property crashes. Flooding and wet weather in 2010-11 also resulted in a lower than anticipated number of road crash rescue incidents and extrications. Data for 2009-10 and 2010-11 were revised in RoGS 2013.

WA: Currently extrication data is not collected for SES road crash rescue incidents.

NT: The Northern Territory Fire and Rescue Service is currently examining its data reporting and inputting processes to ensure accurate reporting in line with the counting rules as defined in the data dictionary. Figures for 2012-13 are likely to indicate considerable under-reporting.

Source: ABS 2015, Motor Vehicle Census, Cat. no. 9309.0, Canberra; ABS 2015, Survey of Motor Vehicle Use, Cat. No. 9208.0, Canberra; ABS 2009, Experimental estimates of motor vehicle use, Cat. No. 9222.0, Canberra; ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2); State and Territory governments (unpublished).

Table 9A.21 Prevention activities of fire service organisations

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
Promotion of:								
Smoke alarms	$\checkmark$							
Maintenance of smoke alarms	$\checkmark$							
Safety switches	$\checkmark$							
Fire extinguishers	$\checkmark$							
Fire blankets	$\checkmark$							
General prevention and awareness for:								
Residential	$\checkmark$							
Business and government	$\checkmark$							
Industry	$\checkmark$							
Rural/farming	$\checkmark$							
Targeted programs for:								
Cultural and language diversity groups	✓	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	×
Aboriginal and Torres Strait Islander communities	✓	✓	✓	✓	✓	×	×	×
Other risk groups	✓	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	$\checkmark$	×
Conduct of community engagement and awareness programs in bush fire prone areas	✓	✓	✓	✓	✓	✓	✓	✓

Table 9A.22 Selected fire risk management/mitigation strategies (a)

	Bushfire risk management strategies	Community awareness and fire education programs	Smoke alarm legislation
NSW	Implementation of bushfire risk management plans	School fire education programs (Fire Safe and Fire Sa	Mandatory legislation for new homes or homes
	Community Fire Units	Science)	undergoing major renovations.
	Amendments to Rural Fires Act leading to changes to the effect of the	Preschool fire education	The Building Legislation Amendment (Smoke Alarms)
	Bushfire Code of Practice	Aboriginal Fire Stories	Act 2005 and the Environmental Planning and assessment Amendment (Smoke Alarms) regulation
	Static Water Supply Program	Juvenile Intervention and Fire Awareness Program	2006 commenced on 1 May 2006 and requires: the
	Standards of Fire Cover Program for vehicle resource allocation	Partnerships with agencies with similar objectives	installation of one or more smoke alarms in buildings in which persons sleep; smoke alarms in such buildings
	Development of a brigade classification system based on risk analysis	<ul> <li>Development and distribution of education teaching resources, community safety videotapes, fact sheets available</li> </ul>	must be operational; and persons do not remove or interfere with the operation of smoke alarms installed in such buildings.
	Service Delivery Model to guide District activities and ongoing	Womens Bush Fire Safety workshops	
	community education strategies	Farm Fire Wise program	
		Street and Community meetings	
/ic	Creation of commercial plantation industry brigades	Community Fire Awareness Programs including:	Mandatory for all homes supported by public awareness
	(Forestry Industry Brigades)	Brigades in Schools	campaigns
	<ul> <li>Wildfire Management Overlay and Planning Control</li> </ul>	Early FireSafe	
	Bushfire Prone Area building control	Isolated Elderly	
	Fire access road subsidy scheme	• FireReady	
	Integrate fire management planning with municipalities and other	Fired up English	
	agencies	Community Fireguard	
	Roadside fire management planning	<ul> <li>Summer Street Meetings, Vic Deaf Fire Safety Campaign, MFB Multicultural Liaison Officers, InFlame - Mailout and social media messaging</li> </ul>	
Qld	Wildfire mitigation coordination: Cooperative approach to bushfire	• Fire Ed — for Year one students	From 1 July 2007, mandatory legislation exists for hard
	prevention at many levels (State Inter-departmental Committees [IDC], Regional IDC, Local Fire Management Groups)	Safehome initiative	wired smoke alarm installation in all new households and homes undergoing major renovations. Homes built prior
	<ul> <li>Wildfire Readiness Plans (Wildfire Mitigation Plans; Wildfire Operations Plans)</li> </ul>	<ul> <li>Initiatives to support people with a disability in preparing for emergencies</li> </ul>	to 1 July 2007 have a minimum requirement to install at least one 9 volt battery operation smoke alarm.
	<ul> <li>Rural brigade classification and resource allocation system based on risk analysis</li> </ul>	<ul> <li>PREPARE.ACT.SURVIVE. Bushfire preparedness campaign</li> </ul>	

Table 9A.22 Selected fire risk management/mitigation strategies (a)

	Bushfire risk management strategies	Community awareness and fire education programs	Smoke alarm legislation
	Fire Danger Ratings Signs	Volunteer Community Educator Network	
	Neighbourhood safer places		
WA	<ul> <li>Partnership agreements between Department of Fire and Emergency Services (DFES) and local governments and between DFES and the Department of Parks and Wildlife.</li> </ul>	<ul> <li>Community fire education programs</li> <li>School education programs</li> </ul>	Mandatory legislation for hard wired smoke alarm installation in all new households and homes undergoing major renovations
	<ul> <li>DFES provides a fire risk management service to the Department of Parks and Wildlife for unallocated Crown land and unmanaged reserves.</li> </ul>		
SA	Comprehensive Statewide bushfire prevention planning process with a local government focus	Community fireguard fire safety education for junior and primary schools	Legislation mandates hard wired smoke alarms in all new households and homes and in all households and homes before sale
	<ul> <li>Statewide consultation with government land management agencies and utilities on bushfire prevention planning processes</li> </ul>	Community fire safe programs	
	<ul> <li>Mandatory consultation by State and local planning authorities with CFS for new residential and tourist developments in bushfire-prone areas</li> </ul>	Junior Fire Lighters Intervention Program (JFLIP)	
Tas	Development of Fire Protection Plans for areas at risk from bushfire.	Partnerships with agencies with similar objectives	Legislation mandating hard wired smoke alarms in all new homes and those undergoing major renovations
	<ul> <li>Establishment of Multi-Agency Coordination Group comprising TFS, Forestry Tasmania and the Parks and Wildlife Service to jointly manage significant landscape fires</li> </ul>	<ul> <li>Specific fire safety programs for at-risk sectors of domestic and business community</li> </ul>	
	<ul> <li>Establishment of self sustaining neighbourhood groups to develop local bushfire survival strategies</li> </ul>	The appoinment of additional Community Development Officers	
	<ul> <li>Permit system to control the number, type and location of prescribed fires burning during the bushfire season.</li> </ul>		
	<ul> <li>Review of State Air Operations Procedures has been undertaken to improve operational efficiencies during bushfires</li> </ul>		
	Command and Control arrangements have been documented for the Regional and State Fire Operations Centres		

## Table 9A.22 Selected fire risk management/mitigation strategies (a)

	Bushfire risk management strategies	Community awareness and fire education programs	Smoke alarm legislation
	<ul> <li>Joint Bushfire Arrangements between Tasmania Police and the Tasmania Fire Service have been agreed</li> </ul>		
	<ul> <li>Staging of machinery, aircraft and strike teams at strategic areas around the state on days of total fire ban.</li> </ul>		
СТ	<ul> <li>Strategic bushfire management plan outlines a strategic risk management approach to bushfires and includes: risk assessment, prevention, preparedness, response, recovery, standards monitoring and reporting, and resource planning.</li> </ul>	<ul> <li>Juvenile Firelighting Awareness Intervention Program (JFAIP) - fire prevention program to children 3-16 yrs presenting with dangerous firelighting behaviours</li> </ul>	Mandatory legislation for new homes or homes undergoing major renovations
	Community Fire Units commenced.	Fire Ed (primary school fire safety education)	
	<ul> <li>Permit system, in accordance with Emergencies Act, 2004, to control the number, type, and location of prescribed fires during the bushfire season.</li> </ul>	<ul> <li>Community Liaison and Safety Program (CLASP) - assists older people to reduce safety and security risks in the home</li> </ul>	1
	<ul> <li>MOUs between the ESA and other government agencies, both ACT and NSW.</li> </ul>	<ul> <li>Community Fire Unit Saturday and RFS open day campaigns</li> </ul>	
		Bush FireWise program     provide information and increase resilience of community living in rural interface     Revised Yellow Pages incorporating the 'Handy Map'     Extensive consultation in lead up to SBMP     Televised community service announcements     Attendance at The Canberra Show     Publication of several community information booklets	
IT	Implementation of hazard reduction plans	Community fire awareness programs	Mandatory Territory Legislation (2011) for photoelectric
		School education programs	smoke installation in all Northern Territory households including caravans, demountable, transportables and
		Hazard abatement programs	resort style tents. The Building Code of Australia calls for hard wired smoke alarms in premises built after January 1998

Table 9A.22 Selected fire risk management/mitigation strategies (a)

	Bushfire risk management strategies	Community awareness and fire education programs	Smoke alarm legislation
Aus Gov	<ul> <li>Bushfire risk management studies in the Hobart Region and Faulkner (Tas); the Great Lakes, Baulkham Hills and Lake Macquarie/ Newcastle (NSW); and Caboolture (Qld) which are funded in part under the Natural Disaster Risk Management Studies Program</li> </ul>	<ul> <li>Development and distribution of school education teaching resources, television programs, videotapes, maps and bushfire action guides by EMA</li> </ul>	Requirement under Building Code of Australia (developed and managed by the Australian Building Codes Board) that smoke alarms be installed in all nethomes
	<ul> <li>Requirement under Building Code of Australia that residential type buildings in bushfire prone areas be constructed to provide protection against embers, radiation and direct flame contact to reduce danger to life and minimise the risk of the loss of the building</li> </ul>	Enhancement of Disaster Education in Schools in EMA website	

<sup>(</sup>a) This table does not provide an exhaustive list of fire risk management/mitigation strategies across jurisdictions. Some jurisdictions also operate ambulance risk management/mitigation strategies.

Source: Australian Government and State and Territory emergency management agencies (unpublished).

Table 9A.23 Households with a smoke alarm or smoke detector installed

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
		(b)	(b)	(b)	(b)			(b)	(b)
Estimated percer	ntage of house	holds with a sm	oke alarm/det	ector					
2014-15	%	94.4	97.2	94.9	na	na	na	na	80.0
2013-14	%	94.1	97.2	96.6	94.0	na	na	na	na
2012-13	%	92.8	97.2	95.5	91.0	na	na	na	na
2011-12	%	na	97.2	94.7	92.0	na	na	na	na
2010-11	%	94.2	97.2	95.0	90.0	na	na	na	na
2009-10	%	93.7	97.2	96.4	89.0	na	na	na	na
2008-09	%	93.6	97.2	97.3	86.0	na	na	na	na
2007-08	%	92.9	97.2	96.2	86.0	na	na	89.7	na
2006-07	%	86.9	95.5	87.1	86.0	na	na	na	na
2005-06	%	76.9	95.5	84.2	86.0	na	na	na	73.0
Estimated percer	ntage of house	holds with a sm	oke alarm/det	ector that is o	perational/has	been tested (a	1)		
2014-15	%	na	na	85.9	na	na	na	na	na
2013-14	%	na	na	88.1	na	na	na	na	na
2012-13	%	na	na	87.0	na	na	na	na	na
2011-12	%	na	na	87.0	na	na	na	na	na
2010-11	%	na	na	86.6	na	na	na	na	na
2009-10	%	na	na	89.2	na	na	na	na	na
2008-09	%	na	na	90.1	na	na	na	na	na
2007-08	%	na	82.2	87.6	na	na	na	69.6	na
2006-07	%	na	na	79.0	na	na	na	na	na
2005-06	%	na	na	76.4	na	na	na	na	na

<sup>(</sup>a) Tested manually tested within the last 12 months.

<sup>(</sup>b) Jurisdiction notes:

Table 9A.23 Households with a smoke alarm or smoke detector installed

l	Unit NS	V Vic	Qld	WA	SA	Tas	ACT	NT
	(	b) (b)	(b)	(b)			(b)	(b)

NSW: Estimates are based on the following numbers of respondents for NSW: 2014 (12,217) 2013 (2,430), 2010 (7,333), 2009 (7,846), 2008 (8,417), 2007 (7,301), 2006 (7,795), 2005 (11,500), 2004 (9,786), 2003 (13,008), 2002 (12,564), 1998 (17,416), 1997 (17,467). The indicator includes those who have a smoke alarm or detector in their home. The question used to define the indicator was "Do you have smoke alarms installed in your home?" where the Relative Standard Error (RSE) >= 25% n/a or '\*' is shown. Data were sourced from the NSW Adult Population Health Survey (SAPHaRI). Centre for Epidemiology and Evidence, NSW Ministry Health. Results for 2013 are based on the Jan-Mar 2013 Quarter only (2,400 respondents). It includes data from both landline and mobile phone surveys. No data were collected in 2011 and 2012.

Vic: 2007-08 data are sourced from ABS Household Preparedness for Emergencies Survey.

In 2008-09 and subsequent years, this data is used as a proxy as no subsequent survey has been conducted.

Data prior to 2007-08, sourced from a random telephone survey of 2,304 respondents residing within the 23 local government areas significant to the metropolitan fire district which was conducted in April 2004.

Qld: The 2013-14 result is sourced from an online survey undertaken in November 2013. This survey is conducted annually. Data are estimates for the whole population of Queensland. Legislation requiring the compulsory installation of smoke alarms in all Queensland homes was introduced in July 2007. The QFES continues to deliver promotional strategies to increase the percentage of households with an operational smoke alarm.

WA: No survey was conducted in 2014-15.

ACT: Data for 2007-08 supplied by ABS Household Preparedness for Emergencies survey.

NT: The Northern Territory Fire and Emergency Regulations places a requirement to install smoke alarms upon the owner of residential permises or a moveable dwelling. Approved smoke alarms must comply with AS 3786.

na Not available.

Table 9A.24 Firefighter workforce per 100 000 people (a), (b)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(c)	(c)	(c)				(c)	
Firefighting pers	sonnel, FTE p	er 100 00	0 people						
2014-15	54.4	80.4	52.9	42.7	52.3	59.4	90.5	115.9	60.5
2013-14	52.8	95.5	52.1	43.9	53.1	57.4	93.5	95.2	63.5
2012-13	46.9	87.5	53.7	44.9	61.4	55.8	95.1	96.7	60.7
2011-12	55.1	75.3	54.6	47.0	62.6	53.7	94.7	92.1	60.7
2010-11	56.0	71.2	54.6	46.4	61.6	53.7	83.6	92.5	59.7
2009-10	56.5	74.6	54.3	45.4	63.0	55.3	82.2	90.9	60.6
2008-09	56.9	88.2	55.0	45.1	61.1	53.2	84.3	87.2	64.0
2007-08	57.0	80.5	56.7	45.6	59.4	59.7	95.6	85.9	62.8
2006-07	57.3	80.7	55.2	44.9	58.0	58.4	86.0	86.2	62.3
2005-06	56.4	78.1	56.0	44.6	56.1	57.4	86.7	87.8	61.3
Fire service orga	anisation volu	unteers, n	umber pe	er 100 000	people				
2014-15	1 094.9	976.2	736.8	1 121.2	818.0	979.2	396.8	571.5	956.8
2013-14	1 081.8	988.5	746.1	1 139.7	810.9	976.9	422.0	580.9	959.4
2012-13	1 077.4	1 014.3	759.1	1 174.3	821.8	950.8	421.3	587.7	970.7
2011-12	969.2	1 037.6	753.4	1 187.7	858.8	942.5	372.8	483.3	942.4
2010-11	1 078.2	1 056.5	766.3	1 247.1	893.3	936.3	338.0	337.4	991.2
2009-10	1 090.2	1 092.0	778.5	1 296.2	930.7	959.8	343.2	329.3	1 014.6
2008-09	1 077.4	1 109.4	795.2	1 233.6	964.7	968.4	350.3	242.7	1 013.6
2007-08	1 096.4	1 122.5	841.3	1 286.0	997.4	990.0	397.2	249.3	1 041.4
2006-07	1 124.4	1 165.9	887.6	1 314.7	993.9	1 012.8	372.7	260.6	1 073.4
2005-06	1 134.2	1 171.5	1 042.4	1 324.7	978.7	976.2	305.2	259.9	1 106.3

FTE = full time equivalent.

- (a) Human resource data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.
- (b) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.
- (c) Jurisdiction notes:
  - Vic: Numbers for Volunteer fire fighters include volunteer support staff.

In 2012-13, the former Department of Environment and Primary Industries (DEPI) engaged a large number of firefighters from Parks Victoria, and from interstate and overseas to manage significant campaign fires.

In 2007-08, the former Department of Sustainability & Environment figures have been derived from 2006-07 figures, due to data quality issues.

From 2005-06, data includes Victoria's land management agency, the former Department of Sustainability & Environment.

Qld: Firefighting staff include Senior Executives, senior officers, station officers, firefighters and rural firefighting staff. Auxiliary firefighters (part-time) are included as 0.1 FTE each.

Volunteers data includes all recorded members of Rural Fire Brigades fulfilling both operational and support roles. The decrease in numbers of volunteer firefighters from 2004-05 to 2008-09 is a result of data cleansing efforts. State Emergency Service volunteer numbers have been reported in STES data.

Table 9A.24 Firefighter workforce per 100 000 people (a), (b)

•	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(c)	(c)	(c)				(c)	

WA: Volunteer firefighter data include volunteers from local government bush fire brigades, Volunteer Fire and Rescue brigades, Volunteer Fire Services and multi-skilled Volunteer Emergency Services. Data for the Department of Parks and Wildlife are not included.

NT: Numbers reflect NT Fire and Rescue Service and Bushfires NT uniformed, non-uniformed and volunteers. In 2012-13 Bushfires NT conducted an audit of volunteer personnel and identified a number of persons who act in voluntary support roles who were previously counted as volunteer firefighters. In 2013-14 NT Fire and Rescue Service did not distinguish between volunteer firefighters and volunteer fire support staff therefore all volunteers have been shown as firefighters.

Table 9A.25 Number of structure fires, by remoteness area (a)

1 4510 07 1.20	Number of Structure files, by remoteness area (a)										
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT			
		(b)	(b)	(b)	(b)	(b)					
Statewide											
2014-15	5 733	5 623	2 366	1 097	1 502	553	240	201			
2013-14	5 870	5 737	2 366	1 096	1 475	631	239	136			
2012-13	5 874	5 940	2 613	1 191	1 540	676	228	160			
2011-12	5 808	6 036	2 661	1 135	1 494	645	265	175			
2010-11	5 924	5 799	2 491	1 279	1 331	663	245	136			
2009-10	6 346	5 969	2 197	1 268	1 342	694	246	114			
2008-09	6 589	5 525	2 380	1 410	1 394	805	263	172			
2007-08	6 862	6 051	2 573	1 380	1 353	639	246	170			
2006-07	6 683	6 039	2 415	1 288	1 349	708	278	146			
2005-06	7 052	5 292	1 871	1 070	1 382	696	331	144			
Major cities											
2014-15	3 628	4 021	1 568	791	1 037		240				
2013-14	4 119	4 269	1 555	832	1 049		239				
2012-13	4 073	4 524	1 710	891	1 115		228				
2011-12	4 058	4 423	1 756	848	1 064		265				
2010-11	4 187	4 265	1 811	1 007	906		245				
2009-10	4 539	4 430	1 391	957	932		246				
2008-09	4 637	3 927	1 263	1 061	965		263				
2007-08	4 724	4 549	1 318	1 064	939		246				
2006-07	4 294	4 491	1 209	1 007	905		278				
2005-06	4 449	4 135	962	801	967		331				
Inner regional											
2014-15	1 044	1 117	385	153	154	356					
2013-14	1 200	1 155	405	137	152	401					
2012-13	1 205	1 143	440	159	168	440					
2011-12	1 229	1 306	434	150	145	418					

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Table 9A.25 Number of structure fires, by remoteness area (a)

Table 3A.23	Mullipel Of Str	ucture mes,	ny remotem	coo al ca (a)				
	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
		(b)	(b)	(b)	(b)	(b)		
2010-11	1 197	1 212	272	147	171	451		
2009-10	1 260	1 212	445	122	190	448		
2008-09	1 373	1 266	695	160	212	515		
2007-08	1 510	1 172	732	157	169	408		
2006-07	1 321	1 213	591	136	194	470		
2005-06	1 472	901	482	128	185	434		
Outer regional								
2014-15	902	275	348	94	244	187		24
2013-14	463	309	338	84	213	210		77
2012-13	492	273	387	84	209	227		84
2011-12	451	307	374	95	234	205		106
2010-11	469	322	388	82	196	187		91
2009-10	483	327	290	118	175	222		66
2008-09	500	332	430	113	161	269		107
2007-08	545	330	416	99	198	215		90
2006-07	849	335	415	95	201	218		96
2005-06	895	252	346	93	190	239		91
Remote								
2014-15	100	4	33	44	38	10		32
2013-14	65	4	39	38	40	20		42
2012-13	54	np	52	39	41	7		52
2011-12	70	np	55	27	36	22		44
2010-11	69	np	9	30	38	21		29
2009-10	61	np	54	55	32	24		33
2008-09	76	np	72	47	45	19		52
2007-08	78	np	85	42	37	16		55
2006-07	173	np	129	32	37	17		37

Table 9A.25 Number of structure fires, by remoteness area (a)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
		(b)	(b)	(b)	(b)	(b)		
2005-06	182	4	62	27	28	20		39
Very remote								
2014-15	59	••	30	15	29	na		22
2013-14	23	••	29	5	20	_		17
2012-13	50		24	18	7	2		24
2011-12	na		23	15	15	_		25
2010-11	2		_	13	20	4		16
2009-10	3		15	16	13	2		15
2008-09	3		21	29	11	3		13
2007-08	5		22	18	10	_		25
2006-07	46		71	18	12	3		13
2005-06	54		19	21	12	1		14

<sup>(</sup>a) Remoteness areas are classified according to the Australian Statistical Geography Standard (ASGS) (ABS cat. no. 1216.0). For Victoria, there are no very remote areas. For Tasmania, the are no major city areas (Hobart and Launceston are classified as inner regional areas). For the ACT, all areas are categorised as major city areas for this report. For the NT, there are no major city areas or inner regional areas (Darwin is classified as an outer regional area).

## (b) Jurisdiction notes:

Vic: Remote structure fires are rolled into the outer regional classification due to the low numbers of events. Excludes late notifications, calls with Event Create time stamp blank.

Qld: Structure fires within the Urban Service Administrative Areas are included. Only primary exposure incidents are included. Incidents that could not be identified by remoteness category have been included in the statewide calculations only.

WA: Data include both career and volunteer responses where response was provided under emergency conditions (lights and sirens).

SA: Excludes response times of 12 hours or more.

Tas: Due to industrial action 90 incident reports are incomplete in 2008-09. Due to industrial action 306 incident reports are incomplete in 2014-15.

**na** Not available. .. Not applicable. – Nil or rounded to zero.

Table 9A.26	Structure fire response times to structure fires, including call taking time, by remoteness area (a), (b), (c)
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		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
			(d)	(d)	(d)	(d)	(d)		(d)		(d)	(d)		(d)	(d)		(d)
Statewide																	
Structure fir	es																
2014-15	no.	5 733	5 623	2 366	1 097	1 502	553	240	201								
Response ti	imes			;	50th per	centile						g	00th perc	entile			
2014-15	min.	7.4	6.8	7.7	8.7	7.5	9.3	7.0	11.4	14.1	10.9	12.3	15.2	11.7	17.7	11.0	23.2
2013-14	min.	7.5	6.8	7.6	8.5	na	8.6	7.2	7.6	15.4	10.9	12.4	14.1	na	19.6	10.4	18.0
2012-13	min.	7.9	6.7	7.4	8.6	na	8.6	6.9	7.6	15.0	10.6	11.9	15.6	na	18.4	10.5	18.4
2011-12	min.	8.2	6.8	7.3	8.6	na	8.3	7.6	7.3	15.0	10.6	11.3	14.5	na	16.7	11.6	16.8
2010-11	min.	8.0	6.8	7.4	8.3	na	8.5	7.4	7.3	14.0	11.0	12.2	14.6	na	16.9	10.7	15.0
2009-10	min.	8.0	6.9	7.9	8.3	na	7.9	7.0	6.4	13.6	10.7	12.4	15.9	na	15.0	11.3	11.3
2008-09	min.	7.4	7.0	7.6	8.4	na	8.2	7.1	6.3	12.0	11.0	12.3	15.4	na	16.0	10.7	12.9
2007-08	min.	8.0	6.8	6.8	8.6	na	8.0	7.2	6.5	14.0	10.6	12.8	14.7	na	15.2	11.1	13.5
Major cities																	
Structure fir	es																
2014-15	no.	3 628	4 021	1 568	791	1 037		240									
Response ti	imes				50th per	centile						g	00th perc	centile			
2014-15	min.	6.5	6.4	7.4	8.1	7.2		7.0		10.6	9.1	11.5	11.5	9.9		11.0	
2013-14	min.	7.1	6.4	7.4	8.1	na		7.2		11.4	9.0	11.4	11.3	na		10.4	
2012-13	min.	7.2	6.4	7.3	7.9	na		6.9		11.6	9.1	10.9	11.5	na		10.5	
2011-12	min.	7.5	6.4	7.2	8.0	na		7.6		11.5	9.0	10.5	11.6	na		11.6	
2010-11	min.	7.4	6.4	7.3	7.9	na		7.4	••	11.5	9.0	12.1	11.3	na		10.7	
2009-10	min.	7.4	6.6	7.6	7.8	na		7.0	••	11.2	9.2	11.6	11.6	na		11.3	
2008-09	min.	7.1	6.6	7.2	8.0	na		7.1		10.6	9.3	11.3	11.6	na		10.7	
2007-08	min.	7.0	6.4	6.3	8.3	na		7.2		11.0	9.0	10.4	11.8	na		11.1	

Table 9A.26 Structure fire response times to structure fires, including call taking time, by remoteness area (a), (b), (c)

	_	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
			(d)	(d)	(d)	(d)	(d)		(d)		(d)	(d)		(d)	(d)		(d)
Inner region	al																
Structure fir	res																
2014-15	no.	1 044	1 117	385	153	154	356										
Response t	imes			5	0th perc	entile						g	00th per	centile			
2014-15	min.	9.6	8.5	7.8	12.0	11.3	8.3			21.0	14.2	12.6	21.8	16.3	14.4		
2013-14	min.	10.4	8.7	7.9	11.3	na	7.8			22.2	14.9	12.9	20.5	na	13.8		
2012-13	min.	10.4	8.2	7.3	13.3	na	7.8			21.2	14.8	13.0	24.1	na	14.2		
2011-12	min.	10.6	8.6	7.6	12.9	na	7.5			22.0	14.0	12.1	22.4	na	12.2		
2010-11	min.	10.2	8.6	7.1	12.6	na	7.8			19.0	15.2	11.9	24.3	na	13.0		
2009-10	min.	10.3	8.6	8.5	12.9	na	7.3			18.9	14.2	13.5	24.7	na	11.5		
2008-09	min.	9.3	8.3	7.6	12.8	na	7.5			14.4	14.5	12.3	23.7	na	11.6		
2007-08	min.	10.0	8.3	7.1	11.6	na	7.3		••	20.0	14.4	14.7	23.1	na	11.1		
Outer region	nal																
Structure fir	es																
2014-15	no.	902	275	348	94	244	187		24								
Response t	imes			5	0th perc	entile						g	00th per	centile			
2014-15	min.	9.5	10.3	9.0	11.9	11.3	11.7		11.1	15.5	19.3	15.1	28.9	16.8	23.0		20.2
2013-14	min.	10.5	9.3	8.8	10.1	na	11.7		7.4	25.6	19.6	14.2	21.5	na	24.6		13.8
2012-13	min.	11.0	9.5	8.2	9.8	na	10.9		7.2	27.0	21.3	13.6	28.5	na	21.7		12.7
2011-12	min.	11.0	9.4	8.2	9.9	na	10.6		7.2	25.7	18.9	12.6	23.9	na	20.7		14.4
2010-11	min.	10.4	9.5	7.3	9.4	na	10.3		6.7	22.0	20.7	12.3	22.4	na	22.7		10.3
2009-10	min.	10.1	9.0	8.6	11.3	na	9.9		6.4	21.0	18.3	14.2	27.2	na	22.2		10.4
2008-09	min.	9.4	8.8	9.4	10.3	na	11.0		6.7	15.3	17.9	22.0	21.5	na	22.8		13.8
2007-08	min.	10.0	8.8	8.1	9.9	na	11.1		6.8	27.0	18.0	19.0	22.7	na	21.2		13.7

Table 9A.26 Structure fire response times to structure fires, including call taking time, by remoteness area (a), (b), (c)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
			(d)	(d)	(d)	(d)	(d)		(d)		(d)	(d)		(d)	(d)		(d)
Remote																	
Structure fi	res																
2014-15	no.	100	4	33	44	38	10		32								
Response t	times			5	50th perc	entile						g	90th perc	entile			
2014-15	min.	10.2	17.4	9.7	15.8	11.9	11.7		12.2	18.5	29.9	18.7	27.8	15.9	33.2		21.5
2013-14	min.	10.0	np	10.4	13.8	na	9.3		7.5	21.2	np	23.4	26.3	na	26.3		13.3
2012-13	min.	10.1	np	7.3	16.1	na	12.3		7.7	15.0	np	17.7	29.7	na	22.2		14.5
2011-12	min.	11.0	np	7.6	14.3	na	10.9		6.5	27.5	np	15.7	76.0	na	21.9		12.3
2010-11	min.	8.6	np	8.5	15.7	na	12.8		7.3	21.2	np	11.9	23.4	na	22.7		16.8
2009-10	min.	9.6	np	8.0	14.3	na	11.4		7.1	20.3	np	17.5	27.2	na	22.8		11.3
2008-09	min.	8.1	np	7.8	14.7	na	15.5		5.6	11.4	np	28.5	33.7	na	38.7		11.9
2007-08	min.	9.0	np	7.1	14.9	na	9.7		6.7	16.5	np	17.2	28.2	na	21.6		14.3
Very remote	!																
Structure fi	res																
2014-15	no.	59		30	15	29	_		22								
Response t	times			5	0th perc	entile						g	90th perc	centile			
2014-15	min.	8.3		9.3	16.4	na	na		16.8	14.0		15.6	42.9	na	na		46.0
2013-14	min.	11.2		9.7	11.3	na	na		9.4	44.5		21.4	20.7	na	na		26.6
2012-13	min.	9.2		9.5	12.9	na	18.6		19.4	20.0		21.4	48.3	na	30.8		53.7
2011-12	min.	na		8.5	13.6	na	na		10.8	na		17.3	41.4	na	na		75.8
2010-11	min.	16.0		na	14.4	na	13.5		10.8	18.0		na	94.8	na	17.1		36.1
2009-10	min.	18.0	••	10.6	12.4	na	na		6.0	22.0	••	14.9	59.2	na	na		18.0
2008-09	min.	5.0	••	12.6	9.8	na	6.4		5.7	9.0	••	24.0	23.2	na	7.3		9.1
2007-08	min.	7.0		8.1	13.6	na	na		5.0	15.0		17.9	22.5	na	na		11.1

Table 9A.26 Structure fire response times to structure fires, including call taking time, by remoteness area (a), (b), (c)

N	ISW	Vic	Qld	WA	SA	Tas	ACT	NT	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
		(d)	(d)	(d)	(d)	(d)		(d)		(d)	(d)		(d)	(d)		(d)

- (a) Remoteness areas are classified according to the Australian Statistical Geography Standard (ASGS) (ABS cat. no. 1216.0). For Victoria, there are no very remote areas. For Tasmania, the are no major city areas (Hobart and Launceston are classified as inner regional areas). For the ACT, all areas are categorised as major city areas for this report. For the NT, there are no major city areas or inner regional areas (Darwin is classified as an outer regional area).
- (b) Jurisdictions provide data where response was provided under emergency conditions (lights and sirens). Data are for both urban and rural services (including land management agencies) and for both career and volunteer services, unless otherwise stated see footnote d for caveats. Data in this table are not directly comparable.
- (c) Response times for major cities, regional and remote areas are impacted a range of factors including geography and personnel mix (including the use of volunteers), which can significantly affect travel time to incidents, particularly in remote areas.
- (d) Jurisdiction notes:
- Vic: Remote structure fires are rolled into the outer regional classification due to the low numbers of events. Excludes late notifications, calls with Event Create time stamp blank.
- Qld: Structure fires within the Urban Service Administrative Areas are included. Excluded are calls where QFES experienced delays due to either extreme weather conditions or where the initial response was by another agency or brigade. Only primary exposure incidents are included. Incidents that could not be identified by remoteness category have been included in the statewide calculations only.
- WA: Data include both career and volunteer responses where response was provided under emergency conditions (lights and sirens). 117 incidents where response time information is incomplete are excluded from response time calculations. Response time for major cities, regional and remote areas are impacted by volunteer data that, particularly in remote areas of the state are affected by significant travel time to incidents. Data includes three outlier incidents with validated inconsistencies.
- SA: Data including call taking time prior to 2014–15 are not available.
- Tas: Due to industrial action 90 incident reports are incomplete in 2008-09. Due to industrial action 306 incident reports are incomplete in 2014-15.
- NT: Inconsistencies in data input in previous reporting periods for Northern Territory Fire and Rescue Service resulted in significant increases in the times reported for responses to structure fires by remoteness of area (90th percentile). Changes to the data reporting and inputting processes has seen this issue rectified.
  - na Not available. .. Not applicable. np Not published. Nil or rounded to zero.

Source: State and Territory governments (unpublished); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.27 Structure fire response times to structure fires, excluding call taking time, by remoteness area (a), (b), (c)

Table 9A.2		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
		(d)	(d)	(d)	(d)	(d)	(d)	ACT	(d)	(d)	(d)	(d)	(d)	(d)	(d)	AC1	
Statewide		(u)	(u)	(u)	(u)	(u)	(u)		(u)	(u)	(u)	(u)	(u)	(u)	(u)		(d)
Structure fir	ras																
2014-15	no.	5 733	5 623	2 366	1 097	1 502	553	240	201								
		0 700	0 020				000	240	201	••					••	••	••
Response t					50th per								0th per				
2014-15	min.	7.2	5.8	7.1	7.7	7.0	8.1	5.6	8.3	13.2	9.5	11.6	13.6	14.0	16.3	9.0	15.1
2013-14	min.	7.4	5.8	7.1	7.5	7.0	7.6	5.8	4.6	14.4	9.5	11.5	12.8	14.0	17.9	8.9	10.8
2012-13	min.	7.5	5.6	6.9	7.6	7.8	7.7	5.4	na	14.0	9.2	11.3	14.2	14.6	16.8	8.9	13.5
2011-12	min.	7.3	5.7	6.8	7.6	7.0	7.4	5.7	5.3	13.5	9.2	10.7	13.5	13.2	15.5	9.2	11.5
2010-11	min.	7.1	5.7	6.7	7.2	7.0	7.6	6.0	5.5	12.6	9.6	11.1	13.0	13.0	15.4	9.1	11.1
2009-10	min.	na	5.8	na	7.3	7.0	7.0	5.7	5.9	na	9.2	na	14.4	13.0	13.5	9.7	10.7
2008-09	min.	na	5.8	na	7.3	6.9	7.2	5.7	5.5	na	9.5	na	14.0	13.0	14.9	8.9	9.4
2007-08	min.	na	5.7	na	7.6	6.6	7.1	5.7	5.7	na	9.2	na	14.2	13.0	13.9	9.5	10.0
Major cities																	
Structure fir	res																
2014-15	no.	3 628	4 021	1 568	791	1 037	••	240									
Response t	times			;	50th per	centile						9	Oth perd	entile			
2014-15	min.	6.4	5.4	6.8	6.9	6.5		5.6		10.3	7.9	10.9	10.3	9.2		9.0	
2013-14	min.	6.6	5.4	6.7	7.1	6.4		5.8		11.1	7.8	10.8	10.2	9.3		8.9	
2012-13	min.	6.9	5.3	6.7	6.9	7.1		5.4		11.1	7.8	10.4	10.4	10.7		8.9	
2011-12	min.	6.7	5.4	6.7	7.0	6.3		5.7		10.4	7.7	10.0	10.5	10.2		9.2	
2010-11	min.	6.6	5.4	6.8	6.8	6.4		6.0		10.5	7.7	11.1	10.3	9.7		9.1	
2009-10	min.	na	5.5	na	6.7	6.3		5.7		na	7.9	na	10.4	9.5		9.7	
2008-09	min.	na	5.5	na	6.9	6.2		5.7		na	7.9	na	10.7	9.7		8.9	
2007-08	min.	na	5.4	na	7.2	6.0		5.7		na	7.8	na	11.1	9.0		9.5	

Table 9A.27 Structure fire response times to structure fires, excluding call taking time, by remoteness area (a), (b), (c)

_		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
		(d)	(d)	(d)	(d)	(d)	(d)		(d)	(d)	(d)	(d)	(d)	(d)	(d)		(d)
Inner region	al																
Structure fir	res																
2014-15	no.	1 044	1 117	385	153	154	356										
Response t	imes			5	0th perc	centile						g	0th perc	entile			
2014-15	min.	9.4	7.2	7.2	10.6	11.0	7.4			19.0	12.6	11.9	19.1	19.1	13.2		
2013-14	min.	10.0	7.3	7.4	10.4	12.0	6.6			20.5	13.3	12.4	17.7	21.0	12.1		
2012-13	min.	10.0	6.9	6.9	11.9	11.1	6.7			20.0	13.2	12.6	21.3	19.0	12.7		
2011-12	min.	9.6	7.3	6.9	11.5	11.0	6.5			20.0	12.6	11.7	22.1	21.0	10.7		
2010-11	min.	9.2	7.3	6.4	11.1	10.0	6.8			17.0	13.7	10.7	22.0	17.0	11.4		
2009-10	min.	na	7.2	na	11.0	10.0	6.2		••	na	12.7	na	23.0	16.0	10.0		
2008-09	min.	na	6.8	na	10.6	9.0	6.4			na	13.2	na	21.3	15.0	10.3		
2007-08	min.	na	6.9	na	11.2	9.0	6.2			na	12.6	na	20.9	15.0	9.6		
Outer region	nal																
Structure fir	res																
2014-15	no.	902	275	348	94	244	187		24								
Response t	imes			5	0th perc	centile						g	0th perc	entile			
2014-15	min.	9.2	8.9	8.4	10.7	11.3	10.6		5.8	15.0	17.9	14.2	26.1	19.0	21.8		20.2
2013-14	min.	10.2	8.2	8.2	8.9	11.1	10.6		4.9	24.5	18.5	13.6	18.7	20.8	22.8		9.5
2012-13	min.	10.0	8.2	7.6	8.7	12.1	9.8		4.6	25.0	19.8	12.7	23.3	19.9	20.2		9.7
2011-12	min.	10.1	8.0	7.6	9.2	10.0	9.8		5.6	24.0	16.5	12.0	22.7	19.5	18.9		11.3
2010-11	min.	9.1	8.0	6.4	8.2	10.0	9.3		5.5	20.0	19.7	11.5	22.1	19.0	22.2		9.5
2009-10	min.	na	7.5	na	10.2	10.0	8.9		6.1	na	16.2	na	26.2	18.4	21.0		9.0
2008-09	min.	na	7.4	na	8.8	10.0	9.7		5.6	na	16.7	na	20.3	17.0	20.8		9.4
2007-08	min.	na	7.4	na	9.4	10.0	9.9		5.6	na	16.3	na	21.7	17.0	19.7		9.6

Table 9A.27 Structure fire response times to structure fires, excluding call taking time, by remoteness area (a), (b), (c)

		NSW	Vic	Qld	WA	SA	Tas	ACT	NT	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
		(d)	(d)	(d)	(d)	(d)	(d)		(d)	(d)	(d)	(d)	(d)	(d)	(d)		(d)
Remote																	
Structure fi	res																
2014-15	no.	100	4	33	44	38	10		32								
Response t	imes			5	0th perd	entile						9	0th perc	entile			
2014-15	min.	10.0	16.2	9.4	14.8	11.3	10.9		8.4	17.3	27.7	17.3	27.0	25.0	31.0		17.4
2013-14	min.	9.0	np	9.1	12.7	13.0	8.5		3.2	20.5	np	21.9	24.2	37.2	25.4		7.3
2012-13	min.	9.6	np	6.5	13.8	13.8	11.4		4.0	15.0	np	14.6	25.5	36.0	21.1		8.9
2011-12	min.	10.0	np	6.9	13.4	11.5	9.9		4.3	24.0	np	14.9	76.9	17.1	19.2		9.0
2010-11	min.	7.7	np	7.2	14.8	10.0	10.9		4.8	20.3	np	11.4	23.2	17.5	21.6		12.2
2009-10	min.	na	np	na	13.1	11.0	10.0		5.6	na	np	na	23.3	15.7	20.8		11.0
2008-09	min.	na	np	na	12.8	12.0	14.8		5.5	na	np	na	28.9	18.0	40.4		9.1
2007-08	min.	na	np	na	14.6	12.0	8.6		5.9	na	np	na	27.8	23.4	20.5		9.1
Very remote																	
Structure fi	res																
2014-15	no.	59		30	15	29	_		22								
Response t	imes			5	0th perc	centile						9	0th perc	centile			
2014-15	min.	8.0		9.0	15.2	13.0	na		19.7	13.0		14.1	40.5	25.6	na		48.2
2013-14	min.	10.1		9.5	12.4	9.5	na		6.0	40.1		20.9	19.6	69.6	na		22.6
2012-13	min.	8.2		9.3	12.1	na	17.3		15.6	17.0		21.2	45.4	na	29.3		35.6
2011-12	min.	7.3		8.2	13.2	16.0	na		7.4	na		16.4	46.4	23.0	na		24.8
2010-11	min.	15.0		na	13.2	11.5	11.9		9.0	17.0		na	93.4	33.8	16.0		18.8
2009-10	min.	na		na	12.6	10.0	na		4.8	na		na	58.8	35.2	na		17.5
2008-09	min.	na		na	9.0	14.0	5.5		5.8	na		na	20.0	28.0	6.6		9.6
2007-08	min.	na		na	11.5	21.0	na		5.0	na		na	21.6	57.6	na		17.4

Table 9A.27 Structure fire response times to structure	fires, excluding call taking time, by remoteness area (a), (b),	(c)
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NSW	Vic	Qld	WA	SA	Tas	ACT	NT	NSW	Vic	Qld	WA	SA	Tas	ACT	NT
(d)	(d)	(d)	(d)	(d)	(d)		(d)		(d)						

- (a) Remoteness areas are classified according to the Australian Statistical Geography Standard (ASGS) (ABS cat. no. 1216.0). For Victoria, there are no very remote areas. For Tasmania, the are no major city areas (Hobart and Launceston are classified as inner regional areas). For the ACT, all areas are categorised as major city areas for this report. For the NT, there are no major city areas or inner regional areas (Darwin is classified as an outer regional area).
- (b) Jurisdictions provide data where response was provided under emergency conditions (lights and sirens). Data are for both urban and rural services (including land management agencies) and for both career and volunteer services, unless otherwise stated see footnote d for caveats. Data in this table are not directly comparable.
- (c) Response times for major cities, regional and remote areas are impacted a range of factors including geography and personnel mix (including the use of volunteers), which can significant affect travel time to incidents, particularly in remote areas.
- (d) Jurisdiction notes:
- NSW: Data excluding call taking time are not available prior to 2010-11.
- Vic: There are no very remote areas in Victoria. Remote structure fires are rolled into the outer regional classification due to the low numbers of events. Excludes late notifications, calls with Event Create time stamp blank.
- Qld: Structure fires within the Urban Service Administrative Areas are included. Excluded are calls where QFES experienced delays due to either extreme weather conditions or where the initial response was by another agency or brigade. Only primary exposure incidents are included. Incidents that could not be identified by remoteness category have been included in the statewide calculations only.
  - Data excluding call taking time are not available prior to 2010-11.
- WA: Data include both career and volunteer responses where response was provided under emergency conditions (lights and sirens). Incidents where response time information is incomplete are excluded from response time calculations. Response time for major cities, regional and remote areas are impacted by volunteer data that, particularly in remote areas of the state are affected by significant travel time to incidents. Data includes three outlier incidents with validated inconsistencies.
- SA: Incomplete data are excluded from percentile calculations. Excludes response times of 12 hours or more. In 2012-13 data for Very Remote are not available due to insufficient data.

  CFS industrial action 1/12/2013 and 30/06/2014 will effect all data apart from Incident Types.
- Tas: Due to industrial action 90 incident reports are incomplete in 2008-09. Due to industrial action 306 incident reports are incomplete in 2014-15.
- NT: Inconsistencies in data input in previous reporting periods for Northern Territory Fire and Rescue Service resulted in significant increases in the times reported for responses to structure fires by remoteness of area (90th percentile). Changes to the data reporting and inputting processes has seen this issue rectified.
  - na Not available. .. Not applicable. np Not published. nil or rounded to zero.

Table 9A.28 Fire service organisations' costs (\$'000) (2014-15 dollars) (a), (b), (c)

	NSW (g)	Vic (g)	Qld (g)	WA (g)	SA	Tas	ACT (g)	NT	Total
2014-15									
Labour costs - Salaries and payments in the nature of salaries	601 769	567 949	326 020	184 634	125 818	45 353	51 692	31 086	1 934 321
Capital costs (d)									
Depreciation	48 685	75 283	4 763	15 554	17 091	6 538	5 136	3 248	176 298
User cost of capital - Other	39 361	185 214	1 640	18 953	24 086	6 811	5 828	5 359	287 251
Other costs (e)	306 032	433 054	284 942	156 724	61 110	22 311	19 386	14 076	1 297 635
Total costs (f)	995 847	1 261 500	617 364	375 865	228 105	81 013	82 042	53 769	3 695 505
Other expenses									
Labour costs - Payroll tax	28 525	26 146		_	5 826	2 587	_	1 555	64 639
User cost of capital - Land	12 <i>4</i> 22	120 395	23	7 822	4 791	1 401	1 134	500	148 488
Interest on borrowings	_	_	_	2 897	_	190	_	_	3 087
2013-14									
Labour costs - Salaries and payments in the nature of salaries	596 548	557 895	313 162	178 727	122 055	44 850	48 221	30 918	1 892 377
Capital costs (d)									
Depreciation	49 097	69 849	16 340	16 526	17 713	6 315	5 581	3 068	184 490
User cost of capital - Other	37 967	185 472	1 492	17 579	18 926	6 935	5 030	3 691	277 092
Other costs (e)	_	478 682	243 258	154 969	65 008	22 556	18 523	4 270	987 266
Total costs (f)	683 612	1 291 898	574 252	367 802	223 702	80 657	77 354	41 946	3 341 225
Other expenses									
Labour costs - Payroll tax	29 368	25 <b>4</b> 29	13 814	_	5 681	2 697	_	1 554	78 544
User cost of capital - Land	11 782	121 466	21	7 636	4 845	1 389	1 128	508	148 776
Interest on borrowings	_	_	_	3 064	_	246	_	_	3 310

Table 9A.28 Fire service organisations' costs (\$'000) (2014-15 dollars) (a), (b), (c)

	U	٠.	, ,	, ,	,, , ,, , ,				
	NSW (g)	Vic (g)	Qld (g)	WA (g)	SA	Tas	ACT (g)	NT	Total
2012-13									
Labour costs - Salaries and payments in the nature of salaries	591 224	559 834	304 885	163 249	118 077	44 427	47 156	29 410	1 858 263
Capital costs (d)									
Depreciation	50 168	67 582	32 617	12 819	17 903	5 671	7 568	3 065	197 393
User cost of capital - Other	42 122	180 602	30 513	17 539	19 823	6 709	4 794	3 863	305 965
Other costs (e)	378 542	469 945	146 727	281 633	60 741	31 976	17 728	12 112	1 399 405
Total costs (f)	1 062 056	1 277 964	514 742	475 240	216 545	88 783	77 245	48 450	3 761 026
Other expenses									
Labour costs - Payroll tax	29 668	25 536	13 430	_	5 336	2 500	_	1 467	77 938
User cost of capital - Land	11 692	29 064	11 815	7 034	4 357	1 383	1 144	515	67 004
Interest on borrowings	_	_	241	3 570	_	259	_	na	na
2011-12									
Labour costs - Salaries and payments in the nature of salaries	624 392	527 962	319 939	165 507	113 177	41 344	46 728	28 260	1 867 309
Capital costs (d)									
Depreciation	46 471	59 606	33 578	11 963	18 034	5 344	5 361	1 928	182 285
User cost of capital - Other	34 970	174 276	29 516	15 743	19 915	6 510	4 272	2 144	287 346
Other costs (e)	256 308	435 805	157 238	280 234	58 952	17 997	21 981	11 462	1 239 977
Total costs (f)	962 141	1 197 649	540 271	473 447	210 078	71 194	78 342	43 794	3 576 917
Other expenses									
Labour costs - Payroll tax	30 617	24 541	14 016	_	<i>5 4</i> 68	2 444	_	1 354	78 440
User cost of capital - Land	11 906	29 149	12 793	6 <b>428</b>	4 364	1 278	1 025	522	67 466
Interest on borrowings	_	153	214	2 653	_	296	_	na	na

Table 9A.28 Fire service organisations' costs (\$'000) (2014-15 dollars) (a), (b), (c)

	_	•		, ,					
	NSW (g)	Vic (g)	Qld (g)	WA (g)	SA	Tas	ACT (g)	NT	Total
2010-11									
Labour costs - Salaries and payments in the nature of salaries	602 833	504 473	302 362	147 088	103 729	39 469	42 176	28 444	1 770 576
Capital costs (d)									
Depreciation	43 253	66 386	32 769	11 556	19 075	5 301	5 898	1 845	186 084
User cost of capital - Other	35 002	174 695	30 325	16 032	30 386	6 620	2 196	2 620	297 877
Other costs (e)	287 514	396 007	153 417	170 736	40 469	17 931	22 178	9 921	1 098 174
Total costs (f)	968 601	1 141 562	518 874	345 412	193 660	69 322	72 449	42 831	3 352 711
Other expenses									
Labour costs - Payroll tax	29 521	23 002	13 415	_	5 151	2 406	_	1 377	74 871
User cost of capital - Land	11 346	28 659	12 495	6 739	2 416	1 299	1 305	531	64 790
Interest on borrowings	_	183	237	242	_	334	_	_	996
2009-10									
Labour costs - Salaries and payments in the nature of salaries	592 695	464 939	288 707	146 828	104 826	41 055	44 935	28 512	1 712 497
Capital costs (d)									
Depreciation	42 887	64 151	37 096	10 702	21 443	5 233	3 975	1 831	187 319
User cost of capital - Other	34 836	135 881	31 961	15 843	30 356	6 705	2 253	2 308	260 145
Other costs (e)	334 853	381 970	151 269	130 657	47 701	22 429	22 416	10 252	1 101 547
Total costs (f)	1 005 271	1 046 941	509 032	304 031	204 326	75 422	73 580	42 904	3 261 507
Other expenses									
Labour costs - Payroll tax	28 561	21 645	12 916	_	5 061	2 <b>4</b> 35	_	1 436	72 056
User cost of capital - Land	11 868	21 190	13 403	6 333	2 536	1 230	1 372	418	58 349
Interest on borrowings	45	176	268	132	_	375	_	_	996

Table 9A.28 Fire service organisations' costs (\$'000) (2014-15 dollars) (a), (b), (c)

	U	٠.	, ,	, ,	,, , ,, , ,				
	NSW (g)	Vic (g)	Qld (g)	WA (g)	SA	Tas	ACT (g)	NT	Total
2008-09									
Labour costs - Salaries and payments in the nature of salaries	574 078	469 724	281 616	137 282	102 436	39 583	47 391	26 986	1 679 096
Capital costs (d)									
Depreciation	39 318	61 092	36 026	10 118	19 593	5 265	4 884	1 948	178 244
User cost of capital - Other	30 916	134 061	32 796	15 524	28 658	6 658	2 444	2 241	253 298
Other costs (e)	279 649	698 853	120 383	106 528	49 622	18 654	16 010	11 280	1 300 978
Total costs (f)	923 961	1 363 730	470 821	269 452	200 308	70 159	70 729	42 455	3 411 615
Other expenses									
Labour costs - Payroll tax	29 045	21 649	12 688	_	4 811	2 372	_	1 408	71 972
User cost of capital - Land	10 <b>4</b> 59	21 301	13 687	6 424	2 588	1 224	1 158	391	57 231
Interest on borrowings	289	49	294	3 417	_	386	_	_	4 436
2007-08									
Labour costs - Salaries and payments in the nature of salaries	563 367	327 651	259 477	127 125	96 184	38 515	39 113	22 007	1 473 439
Capital costs (d)									
Depreciation	39 170	53 111	32 371	11 356	17 560	5 725	1 602	1 982	162 877
User cost of capital - Other	31 833	75 457	33 656	15 458	25 410	6 632	2 681	2 188	193 316
Other costs (e)	266 913	516 391	127 478	119 103	49 274	16 694	18 721	10 903	1 125 477
Total costs (f)	901 284	972 610	452 982	273 042	188 428	67 565	62 117	37 081	2 955 108
Other expenses									
Labour costs - Payroll tax	29 3 <b>4</b> 8	13 756	11 551	_	4 722	2 324	_	_	61 701
User cost of capital - Land	10 912	22 094	12 910	6 408	2 690	1 117	1 156	406	57 694
Interest on borrowings	285	_	323	2 696	_	472	_	_	3 776

Table 9A.28 Fire service organisations' costs (\$'000) (2014-15 dollars) (a), (b), (c)

	_	-							
	NSW (g)	Vic (g)	Qld (g)	WA (g)	SA	Tas	ACT (g)	NT	Total
2006-07									
Labour costs - Salaries and payments in the nature of salaries	543 625	449 809	251 985	128 693	94 477	39 156	41 050	25 633	1 574 428
Capital costs (d)									
Depreciation	40 979	49 059	33 955	10 879	19 945	5 740	1 245	1 877	163 680
User cost of capital - Other	31 831	72 936	32 167	13 868	25 945	6 770	3 476	1 733	188 725
Other costs (e)	319 130	478 960	122 818	118 338	50 984	20 631	30 511	9 347	1 150 719
Total costs (f)	935 565	1 050 765	440 925	271 777	191 351	72 297	76 281	38 590	3 077 552
Other expenses									
Labour costs - Payroll tax	28 577	22 814	11 053	_	4 949	2 126	_	1 403	70 923
User cost of capital - Land	11 351	19 346	11 488	4 463	2 762	814	810	422	51 457
Interest on borrowings	323	_	1 110	5 237	_	491	_	_	7 161
2005-06									
Labour costs - Salaries and payments in the nature of salaries	544 954	350 053	243 494	92 910	86 620	36 496	39 019	24 134	1 417 679
Capital costs (d)									
Depreciation	41 139	48 006	29 996	9 441	22 060	5 622	1 526	2 072	159 862
User cost of capital - Other	31 969	66 764	31 543	12 607	24 266	6 864	3 876	1 859	179 748
Other costs (e)	238 860	185 982	118 170	53 927	45 243	15 123	22 976	8 770	689 050
Total costs (f)	856 921	650 805	423 202	168 885	178 189	64 105	67 397	36 834	2 446 339
Other expenses									
Labour costs - Payroll tax	27 859	17 936	10 799	_	4 717	2 180	_	1 329	64 820
User cost of capital - Land	12 092	17 011	7 685	2 803	3 929	822	840	393	45 574
Interest on borrowings	859	_	1 130	3 123	_	427	_	_	5 539

<sup>(</sup>a) Time series financial data are adjusted to 2014-15 dollars using the General Government Final Consumption Expenditure (GGFCE) chain price deflator (2014-15 = 100) (table 2A.48). See chapter 2 (sections 2.5-6) for details.

<sup>(</sup>b) Figures vary from year to year as a result of abnormal expenditure related to response to specific major emergencies.

Table 9A.28 Fire service organisations' costs (\$'000) (2014-15 dollars) (a), (b), (c)

NSW (g) Vic (g) Qld (g) WA (g) SA Tas ACT (g) NT Total

- (c) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.
- (d) The user cost of capital is partly dependent on depreciation and asset revaluation methods employed. Details of the treatment of assets by emergency management agencies across jurisdictions are outlined in table 9A.51.
- (e) Includes the running, training, maintenance, communications, provisions for losses and other recurrent costs.
- (f) Total costs exclude payroll tax, the user cost of capital associated with land, and interest on borrowings.
- (g) Jurisdiction notes:
- NSW: NSW Rural Fire Service costs in 2012-13 exceed the 2011-12 costs primarily as a result of a high fire activity season (Hazard Reduction and Natural Disaster expenditure).
- Vic: In 2010-11 capital cost increase largely due to revaluation of the former Department of Environment and Primary Industries (DEPI) roads.
  - In 2008-09 capital cost increase largely due to the reclassification of fire tracks. 2008-09 data include a significant increase in costs due to emergency funding arising from the Black Saturday Bushfires.
  - From 2006-07 data include funding and expenditure for the Department of Environment Land Water & Planning or its predecessors.
  - In 2005-06, MFB user cost of capital increase is related to June 2005 revaluations of \$34 million and the 8 per cent cost of capital calculation. Increase in other revenue is due to recharges to CFA (approximately \$2.5 million) for fibre optic communications/ICS support (SAP etc).
- Qld: The Operating Costs represents costs for the Queensland Fire and Emergency Services (excluding State Emergency Services costs) following the transfer of some functions and assets to the Public Safety Business Agency on 1 November 2013. The 2014-15 results reflect the first full year following the transfers. In addition, from 1 July 2014 the Office of the Inspector General Emergency Management is no longer part of the Queensland Fire and Emergence Services and is now reported as a seperate entity. The 2014-15 results are therefore not comparable to prior years.
  - Payroll tax for all Queensland State Government entities was abolished from 1 July 2014.
- WA: DFES provides a wide range of emergency services under an integrated management structure. From 2006-07, data cannot be segregated by service and include costs related to the State Emergency Service and volunteer marine rescue as well as fire. Expenses also include costs related to Wildfire Suppression and Western Australia Natural Disaster Relief and Recovery Arrangements.
  - Data for the Department of Parks and Wildlife are not included.
- ACT: Other Operating cost for 2011-12 includes a Provision for losses of \$3.5m, which has that effect of showing as increased cost of service in 2011-12.

  Depreciation increase in 2010-11 relates to the completion of New Headquarters and Training Facilities.
  - Nil or rounded to zero.na not available... Not applicable.

Source: State and Territory governments (unpublished). ABS 2015, Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0 (table 2A.48).

Table 9A.29 Fire service organisations' expenditure per person, 2014–15 (a), (b), (c), (d)

	Unit	NSW	Vic (e)	Q <i>ld</i> (e)	<i>WA</i> (e)	SA	Tas	ACT	NT	Aust
2014-15										
Total	\$m	995.8	1 261.5	617.4	375.9	228.1	81.0	82.0	53.8	3 695.5
Population	m	7.6	5.9	4.8	2.6	1.7	0.5	0.4	0.2	23.6
Per person	\$	131.63	214.31	129.96	145.61	134.85	157.24	211.64	220.13	156.42
2013-14										
Total	\$m	1 096.1	1 291.9	574.3	367.8	223.7	80.7	77.4	41.9	3 753.7
Population	m	7.5	5.8	4.7	2.6	1.7	0.5	0.4	0.2	23.3
Per person	\$	146.82	223.09	122.42	144.19	133.37	156.93	201.37	172.92	160.97
2012-13										
Total	\$m	1 062.1	1 278.0	514.7	475.2	216.5	88.8	77.2	48.5	3 761.0
Population	m	7.6	5.9	4.8	2.6	1.7	0.5	0.4	0.2	23.6
Per person	\$	140.38	217.10	108.36	184.11	128.02	172.32	199.27	198.35	159.19
2011-12										
Total	\$m	962.1	1 197.6	540.3	473.4	210.1	71.2	78.3	43.8	3 576.9
Population	m	7.2	5.6	4.5	2.4	1.6	0.5	0.4	0.2	22.5
Per person	\$	132.75	214.85	119.71	198.32	127.70	139.13	211.32	188.47	159.08
2010-11										
Total	\$m	968.6	1 141.6	518.9	345.4	193.7	69.3	72.4	42.8	3 352.7
Population	m	7.6	5.9	4.8	2.6	1.7	0.5	0.4	0.2	23.6
Per person	\$	128.03	193.93	109.22	133.82	114.49	134.54	186.90	175.34	141.91
2009-10										
Total	\$m	1 005.3	1 046.9	509.0	304.0	204.3	75.4	73.6	42.9	3 261.5
Population	m	7.6	5.9	4.8	2.6	1.7	0.5	0.4	0.2	23.6
Per person	\$	132.88	177.86	107.15	117.78	120.80	146.38	189.82	175.65	138.05
2008-09										
Total	\$m	924.0	1 363.7	470.8	269.5	200.3	70.2	70.7	42.5	3 411.6
Population	m	7.6	5.9	4.8	2.6	1.7	0.5	0.4	0.2	23.6
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Table 9A.29 Fire service organisations' expenditure per person, 2014–15 (a), (b), (c), (d)

	Unit	NSW	Vic (e)	Q <i>ld</i> (e)	WA (e)	SA	Tas	ACT	NT	Aust
Per person	\$	122.13	231.67	99.11	104.39	118.42	136.17	182.46	173.81	144.40
2007-08										
Total	\$m	901.3	972.6	453.0	273.0	188.4	67.6	62.1	37.1	2 955.1
Population	m	7.6	5.9	4.8	2.6	1.7	0.5	0.4	0.2	23.6
Per person	\$	119.13	165.23	95.35	105.78	111.40	131.13	160.24	151.81	125.08
2006-07										
Total	\$m	935.6	1 050.8	440.9	271.8	191.4	72.3	76.3	38.6	3 077.6
Population	m	7.6	5.9	4.8	2.6	1.7	0.5	0.4	0.2	23.6
Per person	\$	123.66	178.51	92.82	105.29	113.12	140.32	196.78	157.99	130.26
2005-06										
Total	\$m	856.9	650.8	423.2	168.9	178.2	64.1	67.4	36.8	2 446.3
Population	m	7.6	5.9	4.8	2.6	1.7	0.5	0.4	0.2	23.6
Per person	\$	113.27	110.56	89.09	65.43	105.34	124.42	173.86	150.80	103.55

- (a) Time series financial data are adjusted to 2014-15 dollars using the General Government Final Consumption Expenditure (GGFCE) chain price deflator (2014-15 = 100) (table 2A.48). See chapter 2 (sections 2.5-6) for details.
- (b) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.
- (c) Figures vary from year to year as a result of abnormal expenditure related to response to specific major emergencies.
- (d) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.
- (e) Jurisdiction notes:
- Vic: 2008-09 data include a significant increase in expenditure due to emergency funding arising from the Black Saturday Bushfires.

  From 2006-07 data include funding and expenditure for the Department of Environment and Primary Industries (DEPI) (now DELWP).
- Qld: The Operating Costs represents costs for the Queensland Fire and Emergency Services (excluding State Emergency Services costs) following the transfer of some functions and assets to the Public Safety Business Agency on 1 November 2013. The 2014-15 results reflect the first full year following the transfers. In addition, from 1 July 2014 the Office of the Inspector General Emergency Management is no longer part of the Queensland Fire and Emergence Services and is now reported as a seperate entity. The 2014-15 results are therefore not comparable to prior years.

Table 9A.29 Fire service organisations' expenditure per person, 2014–15 (a), (b), (c), (d)

Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
		(e)	(e)	(e)					

WA: DFES provides a wide range of emergency services under an integrated management structure. From 2006-07, data cannot be segregated by service and include costs related to the State Emergency Service and volunteer marine rescue as well as fire. Expenses also include costs related to Wildfire Suppression and Western Australia Natural Disaster Relief and Recovery Arrangements.

Data for the Department of Parks and Wildlife are not included.

Source: State and Territory governments; ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2); ABS 2015, Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0 (table 2A.48).

Table 9A.30 Fire service organisations' funding per person (2014-15 dollars) (a), (b), (c), (d)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
	(e)	(e)	(e)	(e)			(e)		
2014-15									
Total government grants	36.50	77.81	16.99	24.09	2.98	12.23	163.44	158.54	41.92
Total levies	86.35	100.23	91.67	112.22	117.13	104.52	_	_	93.98
User charges	5.37	11.45	11.30	3.65	3.33	21.46	_	_	7.95
Miscellaneous revenue	6.48	3.04	10.98	1.52	1.93	5.20	12.45	_	5.66
Indirect government funding	_	0.89	_	_	_	_	_	_	0.22
Total	134.68	193.43	130.95	141.48	125.37	143.41	175.88	158.54	149.74
2013-14									
Total government grants	49.90	85.88	22.78	22.88	6.41	12.76	156.85	136.65	49.14
Total levies	89.04	111.76	84.71	108.91	114.28	104.08	_	_	95.73
User charges	4.89	8.36	10.87	3.09	3.73	25.25	_	_	6.99
Miscellaneous revenue	6.30	3.00	16.56	1.17	1.64	4.65	9.44	_	6.60
Indirect government funding	_	1.19	_	_	_	_	_	_	0.29
Total	150.14	210.19	134.91	136.05	126.06	146.74	166.29	136.65	158.74
2012-13									
Total government grants	45.69	92.62	22.68	41.58	2.00	36.16	154.29	201.36	52.27
Total levies	88.45	103.78	77.76	104.59	104.03	102.16	_	_	90.89
User charges	3.69	5.86	10.95	2.97	3.09	20.24	_	11.30	5.95
Miscellaneous revenue	4.54	5.47	1.40	2.19	1.58	9.32	11.96	0.02	3.85
Indirect government funding	_	0.62	_	_	_	_	_	_	0.15
Total	142.36	208.34	112.79	151.32	110.71	167.88	166.25	212.68	153.11
2011-12									
Total government grants	34.34	78.06	26.34	70.46	2.12	12.47	143.93	151.31	47.56
Total levies	94.85	125.07	77.01	101.92	106.87	101.78	_	_	97.99
User charges	3.86	6.71	12.42	2.69	3.26	20.15	29.18	11.49	6.98
Miscellaneous revenue	4.61	7.89	0.83	4.37	1.46	5.16	8.65	0.39	4.44
Indirect government funding	_	0.97	_	_	_	_	_	_	0.24

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Table 9A.30 Fire service organisations' funding per person (2014-15 dollars) (a), (b), (c), (d)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
	(e)	(e)	(e)	(e)			(e)		
Total	137.66	218.69	116.60	179.43	113.70	139.56	181.77	163.19	157.22
2010-11									
Total government grants	41.67	73.94	28.76	74.69	2.05	12.63	110.68	123.27	48.93
Total levies	93.00	105.11	75.04	100.16	101.63	99.18	_	_	91.42
User charges	2.17	6.01	12.26	2.28	2.71	20.14	28.53	12.24	6.14
Miscellaneous revenue	4.85	7.68	1.13	4.10	1.81	3.09	4.64	0.30	4.41
Indirect government funding	_	0.79	_	_	_	_	_	_	0.19
Total	141.69	193.52	117.19	181.24	108.19	135.05	143.84	135.82	151.10
2009-10									
Total government grants	44.82	68.44	26.16	28.61	2.40	15.88	121.57	114.93	43.44
Total levies	91.01	110.81	77.07	88.81	111.55	103.29	_	_	92.26
User charges	2.20	8.72	9.69	1.93	2.59	25.39	28.66	11.11	6.38
Miscellaneous revenue	5.95	6.32	1.31	3.16	1.77	6.45	12.92	0.36	4.58
Indirect government funding	_	1.08	_	_	_	_	_	_	0.27
Total	143.98	195.37	114.23	122.51	118.31	151.01	163.14	126.40	146.93
2008-09									
Total government grants	36.23	150.20	21.11	26.21	2.67	12.33	131.81	112.21	59.68
Total levies	100.76	96.12	75.85	87.67	115.85	100.58	_	_	91.72
User charges	2.33	7.50	8.72	1.94	3.33	19.63	27.30	11.35	5.82
Miscellaneous revenue	6.64	3.45	1.78	4.48	3.35	5.20	2.95	0.08	4.25
Indirect government funding	_	2.39	_	_	_	_	3.09	_	0.64
Total	145.96	259.65	107.47	120.31	125.20	137.74	165.15	123.64	162.11
2007-08									
Total government grants	28.77	66.06	20.01	32.26	3.72	16.48	134.86	92.99	36.84
Total levies	94.72	94.25	74.87	89.85	114.96	100.65	_	_	89.30
User charges	2.27	7.18	7.59	2.42	3.93	16.27	29.17	10.85	5.54
Miscellaneous revenue	7.06	6.57	1.20	5.16	2.60	3.56	4.01	1.78	5.06

FIRE AND AMBULANCE SERVICES PAGE 2 of TABLE 9A.30

Table 9A.30 Fire service organisations' funding per person (2014-15 dollars) (a), (b), (c), (d)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
	(e)	(e)	(e)	(e)			(e)		
Indirect government funding	_	_	_	_	_	_	_	_	_
Total	132.83	174.06	103.67	129.68	125.20	136.97	168.04	105.62	136.74
2006-07									
Total government grants	41.80	102.62	19.08	39.12	0.73	18.74	130.81	113.06	50.64
Total levies	91.49	91.59	76.97	87.17	110.37	94.69	_	_	87.28
User charges	2.35	5.26	7.25	2.33	2.70	16.69	31.58	11.67	4.98
Miscellaneous revenue	5.80	16.57	1.77	7.32	2.55	4.53	21.57	4.70	7.79
Indirect government funding	_	_	_	_	_	_	0.74	_	0.01
Total	141.44	216.05	105.06	135.94	116.34	134.65	184.70	129.44	150.70
2005-06									
Total government grants	29.22	29.02	17.76	16.54	1.21	10.20	158.29	112.47	26.04
Total levies	90.47	90.23	77.40	66.48	110.78	95.77	_	_	84.71
User charges	2.39	4.71	5.85	1.46	1.79	16.10	31.98	11.75	4.41
Miscellaneous revenue	5.27	8.50	1.99	1.31	3.29	2.89	0.19	4.88	4.74
Indirect government funding	_	_	_	_	_	_	8.36	_	0.14
Total	127.34	132.46	103.00	85.79	117.07	124.97	198.82	129.10	120.04

<sup>(</sup>a) Time series financial data are adjusted to 2014-15 dollars using the General Government Final Consumption Expenditure (GGFCE) chain price deflator (2014-15 = 100) (table 2A.48). See chapter 2 (sections 2.5-6) for details.

NSW: From 2009-10 data include funding for the Department of Environment, Climate Change and Water.

Vic: From 2006-07 data include funding and expenditure for the Department of Environment and Primary Industries (DEPI) (now DELWP). 2008-09 data include a significant increase in government grants due to emergency funding arising from the Black Saturday Bushfires.

<sup>(</sup>b) Figures vary from year to year as a result of abnormal expenditure related to response to specific major emergencies.

<sup>(</sup>c) Financial and activity data are affected by the reporting scope of each jurisdiction's 'fire service organisation'. See table 9A.3 for details for the scope of agencies' reporting.

<sup>(</sup>d) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

<sup>(</sup>e) Jurisdiction notes:

Table 9A.30 Fire service organisations' funding per person (2014-15 dollars) (a), (b), (c), (d)

NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
(e)	(e)	(e)	(e)			(e)		

Qld: Revenue represents funding for the former Emergency Management Queensland (EMQ) (excluding State Emergency Service costs) and Queensland Fire and Rescue Service (QFRS) for the period 1 July 2013 to 31 October 2013, and QFES for the period 1 November 2013 to 30 June 2014. QFES incorporates functions of the former QFRS, former EMQ and Office of the Inspector-General Emergency Management. In addition, some functions and assets previously held by the former EMQ and QFRS were transferred to the Public Safety Business Agency (PSBA) on 1 November 2013. The 2013-14 results are therefore not comparable to prior years.

WA: DFES provides a wide range of emergency services under an integrated management structure. Data for 2006-07 and subsequent years cannot be segregated by service and include SES and volunteer marine services as well as fire. Data for the Department of Parks and Wildlife are not included.

ACT: In 2006-07 funding was included under 'miscellaneous revenue' for the placement of an Ericson sky crane in the ACT as part of the National Aerial Firefighting Strategy.

- Nil or rounded to zero.

Source: State and Territory governments (table 9A.4); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).; ABS 2015, Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0 (table 2A.48).

## All jurisdictions — ambulance events

## Table 9A.31 Delivery and scope of activity of ambulance service organisations

		Ambulance service organisations
	Umbrella department(s)	Ambulance service provider(s)
NSW	· NSW Health	<ul> <li>NSW Ambulance — a division of the Ministry of Health reporting to the Minister for Health.</li> </ul>
Vic	<ul> <li>Victorian Department of Health and Human Services</li> </ul>	<ul> <li>Ambulance Victoria — a separate statutory body reporting to the Minister for Health.</li> </ul>
Qld	· Queensland Department of Health	Queensland Ambulance Service — a division of the Department of Health.
WA	• WA Department of Health	St John Ambulance — an incorporated not for profit organisation under contract to the WA Government.
SA	• SA Health	<ul> <li>SA Ambulance Service — an incorporated entity under the SA Health Care Act.</li> </ul>
Tas	Tasmania Department of Health and Human Services.	<ul> <li>Ambulance Tasmania — a statutory service of the Department of Health and Human Services.</li> </ul>
ACT	<ul> <li>ACT Emergency Services Agency within the Justice and Community Safety Directorate</li> </ul>	<ul> <li>ACT Ambulance Service — one of four operational services that comprise the ACT Emergency Services Agency, Justice and Community Safety Directorate (the other operational services are the ACT Fire and Rescue, ACT Rural Fire Service and ACT State Emergency Service). The Department reports to the ACT Minister for Police and Emergency Services.</li> </ul>
NT	NT Department of Health	<ul> <li>St John Ambulance — an incorporated not-for-profit organisation under contract to the NT Government.</li> </ul>

Table 9A.32 Major sources of ambulance service organisations revenue (2014-15 dollars) (a), (b), (c)

	Unit	NSW (e)	Vic	Qld	WA	SA	Tas (e)	ACT (e)	NT	Aust
2014-15										
Revenue sources (dollars)										
Government grants/contributions	\$m	590.7	475.9	471.5	120.8	127.2	48.0	36.8	23.3	1 894.2
Transport fees	\$m	223.1	170.8	114.2	100.4	86.0	9.3	5.5	2.8	712.2
Subscriptions and other income	\$m	24.3	78.5	10.0	30.3	30.9	_	0.8	1.2	175.9
Total	\$m	838.1	725.1	595.7	251.5	244.1	57.3	43.2	27.3	2 782.3
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	70.5	65.6	79.1	48.0	52.1	82.3	85.3	85.3	68.0
Other government contributions (d)	%	_	_	_	_	_	1.5	_	_	_
Transport fees										
Fees from Interhospital transfers	%	12.2	5.3	11.7	3.6	8.8	_	_	_	8.7
Fees from (uninsured) citizens	%	6.3	9.9	1.0	32.4	21.4	4.6	_	6.4	9.7
Charges to motor accident insurers	%	4.1	4.0	2.5	1.8	2.2	4.1	_	1.5	3.3
Charges to other organisations	%	4.0	4.4	4.0	2.1	2.9	7.5	12.8	2.4	4.0
Other revenue										
Subscription fees	%	_	9.3	_	1.0	9.7	_	_	2.0	3.4
Other fees, donations, miscellaneous	%	2.9	1.5	1.7	11.1	2.9	_	1.9	2.3	2.9
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
2013-14										
Revenue sources (dollars)										
Government grants/contributions	\$m	572.1	431.3	465.1	114.7	128.0	50.7	34.1	21.9	1 817.9
Transport fees	\$m	231.1	167.7	116.7	92.3	79.3	7.1	6.2	2.8	703.4
Subscriptions and other income	\$m	8.6	72.0	10.5	38.2	32.7	2.7	0.6	1.1	166.4
Total	\$m	811.9	671.0	592.4	245.1	239.9	60.6	40.9	25.9	2 687.6
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	70.5	64.3	78.5	46.8	53.3	82.8	83.5	84.7	67.6
Other government contributions (d)	%	_	_		_	_	1.0	_	_	_

FIRE AND AMBULANCE SERVICES PAGE 1 of TABLE 9A.32

Table 9A.32 Major sources of ambulance service organisations revenue (2014-15 dollars) (a), (b), (c)

	Unit	NSW (e)	Vic	Qld	WA	SA	Tas (e)	ACT (e)	NT	Aust
Transport fees										
Fees from Interhospital transfers	%	11.6	5.1	11.9	2.9	8.1	1.9	_	_	8.4
Fees from (uninsured) citizens	%	8.8	10.1	1.1	30.8	19.8	2.4	_	5.0	10.1
Charges to motor accident insurers	%	4.2	4.6	2.5	1.8	2.2	3.2	_	1.6	3.4
Charges to other organisations	%	3.9	5.2	4.1	2.2	2.9	4.2	15.2	4.3	4.2
Other revenue										
Subscription fees	%	_	9.5	_	0.9	10.0	_	_	2.3	3.4
Other fees, donations, miscellaneous	%	1.1	1.3	1.8	14.7	3.6	4.5	1.4	2.0	2.8
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
2012-13										
Revenue sources (dollars)										
Government grants/contributions	\$m	562.6	503.6	460.1	104.6	137.8	54.5	32.3	23.2	1 878.6
Transport fees	\$m	211.5	125.5	113.1	88.3	75.6	6.7	5.1	2.7	628.6
Subscriptions and other income	\$m	20.3	73.5	16.2	40.8	35.0	3.0	0.4	0.5	189.8
Total	\$m	794.5	702.6	589.4	233.7	248.4	64.1	37.8	26.4	2 696.9
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	70.8	68.7	78.0	44.7	55.0	84.2	85.5	85.0	68.8
Other government contributions (d)	%	_	3.0	_	_	0.5	0.7	_	2.9	0.9
Transport fees										
Fees from Interhospital transfers	%	12.2	5.4	12.2	3.2	8.2	1.5	_	_	8.7
Fees from (uninsured) citizens	%	6.7	8.2	1.0	30.5	17.2	1.7	_	5.8	8.7
Charges to motor accident insurers	%	4.1	3.3	2.4	1.8	2.2	3.2	_	1.7	3.0
Charges to other organisations	%	3.7	1.0	3.6	2.3	2.8	4.0	13.4	2.6	2.9
Other revenue										
Subscription fees	%	_	8.7	_	1.0	9.5	_	_	_	3.2
Other fees, donations, miscellaneous	%	2.6	1.8	2.7	16.5	4.6	4.7	1.2	2.0	3.8
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
2011-12										

2011-12

REPORT ON GOVERNMENT SERVICES 2016 FIRE AND AMBULANCE SERVICES PAGE **2** of TABLE 9A.32

Table 9A.32 Major sources of ambulance service organisations revenue (2014-15 dollars) (a), (b), (c)

	Unit	NSW (e)	Vic	Qld	WA	SA	Tas (e)	ACT (e)	NT	Aus
Revenue sources (dollars)										
Government grants/contributions	\$m	529.5	417.8	468.6	93.0	115.3	52.1	32.4	20.8	1 729.
Transport fees	\$m	205.8	119.1	112.3	84.4	68.1	6.4	4.9	2.8	603.
Subscriptions and other income	\$m	12.1	100.1	16.9	41.3	33.3	2.7	0.2	1.1	207.6
Total	\$m	747.4	637.0	597.8	218.7	216.6	61.3	37.4	24.6	2 540.8
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	70.8	63.8	78.4	42.5	53.2	85.1	86.5	84.4	67.6
Other government contributions (d)	%	_	1.8	_	_	_	_	_	_	0.5
Transport fees										
Fees from Interhospital transfers	%	13.2	5.3	11.8	3.1	8.3	_	_	_	9.0
Fees from (uninsured) citizens	%	6.6	8.4	1.1	31.2	18.4	3.5	_	6.6	8.7
Charges to motor accident insurers	%	4.2	3.8	2.4	1.9	2.2	2.6	_	1.8	3.2
Charges to other organisations	%	3.6	1.1	3.5	2.5	2.6	4.4	13.1	2.9	2.9
Other revenue										
Subscription fees	%	_	13.5	_	1.0	10.4	_	_	2.0	4.4
Other fees, donations, miscellaneous	%	1.6	2.2	2.8	17.9	4.9	4.4	0.4	2.3	3.8
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
2010-11										
Revenue sources (dollars)										
Government grants/contributions	\$m	508.7	376.2	449.7	68.9	107.2	52.0	24.1	20.0	1 606.7
Transport fees	\$m	199.7	115.6	106.0	77.1	72.5	4.8	5.5	2.3	583.6
Subscriptions and other income	\$m	8.8	120.5	20.7	38.1	29.9	0.7	0.1	1.1	219.8
Total	\$m	717.2	612.3	576.3	184.0	209.6	57.6	29.8	23.4	2 410.1
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	70.9	59.8	78.0	37.4	51.1	90.4	80.9	85.4	66.2
Other government contributions (d)	%	_	1.6	_	_	_	_	_	_	0.4
Transport fees										

FIRE AND AMBULANCE SERVICES PAGE **3** of TABLE 9A.32

Table 9A.32 Major sources of ambulance service organisations revenue (2014-15 dollars) (a), (b), (c)

	Unit	NSW (e)	Vic	Qld	WA	SA	Tas (e)	ACT (e)	NT	Aust
Fees from Interhospital transfers	%	13.1	5.3	11.2	3.3	8.7	_	_	_	8.9
Fees from (uninsured) citizens	%	6.4	8.7	1.2	33.3	18.2	1.6	_	6.1	8.6
Charges to motor accident insurers	%	5.0	3.8	2.4	2.4	2.5	2.2	_	1.9	3.5
Charges to other organisations	%	3.4	1.1	3.6	2.8	5.2	4.6	18.6	2.0	3.2
Other revenue										
Subscription fees	%	_	18.2	_	1.3	10.8	_	_	2.1	5.7
Other fees, donations, miscellaneous	%	1.2	1.5	3.6	19.4	3.5	1.2	0.5	2.4	3.5
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
2009-10										
Revenue sources (dollars)										
Government grants/contributions	\$m	514.5	379.1	421.3	47.4	108.3	51.0	20.6	17.4	1 559.6
Transport fees	\$m	203.6	116.0	110.2	66.1	65.0	4.9	4.8	2.6	573.1
Subscriptions and other income	\$m	10.5	108.8	16.5	37.9	27.9	1.0	0.5	1.1	204.1
Total	\$m	728.5	603.8	548.1	151.4	201.2	56.8	25.9	21.0	2 336.8
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	70.4	61.6	76.9	31.3	53.8	89.7	79.4	82.6	66.4
Other government contributions (d)	%	0.2	1.2	_	_	_	_	_	_	0.4
Transport fees										
Fees from Interhospital transfers	%	12.8	5.2	12.5	3.0	8.0	_	_	_	9.2
Fees from (uninsured) citizens	%	6.5	8.9	1.2	34.3	18.6	0.6	_	6.9	8.5
Charges to motor accident insurers	%	4.7	4.0	2.4	3.0	2.9	2.9	_	2.3	3.6
Charges to other organisations	%	3.9	1.1	4.0	3.4	2.8	5.1	18.6	3.1	3.2
Other revenue										
Subscription fees	%	_	16.7	_	1.6	11.3	_	_	2.5	5.4
Other fees, donations, miscellaneous	%	1.4	1.3	3.0	23.4	2.5	1.7	2.0	2.7	3.3
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

## 2008-09

Revenue sources (dollars)

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Table 9A.32 Major sources of ambulance service organisations revenue (2014-15 dollars) (a), (b), (c)

	Unit	NSW (e)	Vic	Qld	WA	SA	Tas (e)	ACT (e)	NT	Aust
Government grants/contributions	\$m	505.1	367.8	423.1	45.6	120.0	43.6	21.4	16.3	1 542.8
Transport fees	\$m	192.9	104.0	84.3	56.2	57.4	5.4	5.0	2.2	507.4
Subscriptions and other income	\$m	9.2	114.2	21.0	36.7	26.9	0.7	0.2	6.8	215.6
Total	\$m	707.2	586.1	528.4	138.5	204.3	49.6	26.5	25.3	2 265.8
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	71.4	61.8	80.1	32.9	58.7	86.4	80.7	64.5	67.8
Other government contributions (d)	%	_	0.9	_	_	_	1.3	_	_	0.3
Transport fees										
Fees from Interhospital transfers	%	14.1	4.6	7.6	2.8	7.4	_	_	_	8.2
Fees from (uninsured) citizens	%	6.7	7.6	1.3	31.4	15.1	0.8	_	5.1	7.7
Charges to motor accident insurers	%	3.0	4.0	2.5	3.0	3.0	4.1	_	1.7	3.1
Charges to other organisations	%	3.5	1.6	4.6	3.5	2.6	5.9	18.7	2.0	3.4
Other revenue										
Subscription fees	%	_	16.7	_	1.7	10.6	_	_	2.0	5.4
Other fees, donations, miscellaneous	%	1.3	2.8	4.0	24.8	2.6	1.4	0.6	24.8	4.1
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
007-08										
Revenue sources (dollars)										
Government grants/contributions	\$m	457.6	328.7	384.5	42.8	79.0	33.6	20.1	15.1	1 361.4
Transport fees	\$m	178.3	107.0	83.7	61.6	58.0	5.3	5.2	2.2	501.2
Subscriptions and other income	\$m	11.7	122.2	20.3	37.3	27.2	0.8	0.2	6.3	226.0
Total	\$m	647.6	557.9	488.5	141.7	164.2	39.6	25.4	23.6	2 088.6
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	70.7	56.5	78.7	30.2	47.9	83.9	79.0	64.1	64.5
Other government contributions (d)	%	_	2.5	_	_	0.2	0.9	_	_	0.7
Transport fees										
Fees from Interhospital transfers	%	13.6	4.5	8.2	3.8	8.7	_	_	_	8.3

FIRE AND AMBULANCE SERVICES PAGE **5** of TABLE 9A.32

Table 9A.32 Major sources of ambulance service organisations revenue (2014-15 dollars) (a), (b), (c)

	Unit	NSW (e)	Vic	Qld	WA	SA	Tas (e)	ACT (e)	NT	Aust
Fees from (uninsured) citizens	%	6.9	9.0	1.5	33.0	19.8	1.0	_	5.5	8.8
Charges to motor accident insurers	%	3.6	4.0	2.7	2.9	3.8	4.9	_	1.7	3.4
Charges to other organisations	%	3.4	1.7	4.7	3.8	3.0	7.4	20.3	2.1	3.5
Other revenue										
Subscription fees	%	_	18.1	_	1.5	12.9	_	_	1.9	6.0
Other fees, donations, miscellaneous	%	1.8	3.8	4.2	24.9	3.6	2.0	0.6	24.8	4.8
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
006-07										
Revenue sources (dollars)										
Government grants/contributions	\$m	418.4	306.5	359.3	43.0	67.8	33.0	18.3	14.3	1 260.4
Transport fees	\$m	145.9	103.7	77.7	57.3	53.8	4.1	4.9	2.1	449.4
Subscriptions and other income	\$m	13.2	119.6	20.8	32.6	26.9	0.4	0.2	5.5	219.2
Total	\$m	577.4	529.9	457.8	132.9	148.4	37.4	23.4	21.9	1 929.1
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	72.5	55.8	78.5	32.4	45.4	87.2	78.2	65.5	64.7
Other government contributions (d)	%	_	2.1	_	_	0.2	0.9	_	_	0.6
Transport fees										
Fees from Interhospital transfers	%	12.5	4.3	7.9	4.1	9.0	_	_	_	7.8
Fees from (uninsured) citizens	%	6.7	9.1	1.4	31.5	19.5	1.0	_	6.0	8.6
Charges to motor accident insurers	%	3.3	4.1	2.5	3.5	4.4	5.1	_	2.2	3.4
Charges to other organisations	%	2.8	1.9	5.2	3.9	3.4	4.8	20.8	1.3	3.5
Other revenue										
Subscription fees	%	_	18.8	_	1.7	14.1	_	_	2.1	6.4
Other fees, donations, miscellaneous	%	2.3	3.8	4.5	22.9	4.0	1.0	1.0	22.9	5.0
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
005-06										
Revenue sources (dollars)										
Government grants/contributions	\$m	410.9	325.9	329.1	43.6	66.5	30.3	23.7	13.0	1 243.0

FIRE AND AMBULANCE SERVICES PAGE 6 of TABLE 9A.32

Table 9A.32 Major sources of ambulance service organisations revenue (2014-15 dollars) (a), (b), (c)

-			•		•	, , ,				
	Unit	NSW (e)	Vic	Qld	WA	SA	Tas (e)	ACT (e)	NT	Aust
Transport fees	\$m	116.5	99.2	74.6	51.6	50.4	3.7	1.3	2.1	399.2
Subscriptions and other income	\$m	19.6	110.6	18.1	31.6	26.7	0.6	0.1	5.4	212.9
Total	\$m	547.0	535.7	421.8	126.8	143.6	34.6	25.2	20.4	1 855.1
Proportion of total										
Government grants and indirect revenue										
State/Territory Government grants	%	75.1	58.0	78.0	34.4	46.1	87.5	94.3	63.5	66.2
Other government contributions (d)	%	_	2.8	_	_	0.2	0.2	_	_	0.8
Transport fees										
Fees from Interhospital transfers	%	12.0	4.2	7.8	4.2	8.4	_	1.8	_	7.4
Fees from (uninsured) citizens	%	5.3	8.3	1.9	29.3	18.9	1.3	_	6.7	8.0
Charges to motor accident insurers	%	3.6	4.3	2.6	3.4	4.7	4.8	_	2.2	3.6
Charges to other organisations	%	0.5	1.7	5.4	3.8	3.1	4.5	3.4	1.3	2.5
Other revenue										
Subscription fees	%	_	17.5	_	1.9	14.4	_	_	2.4	6.3
Other fees, donations, miscellaneous	%	3.6	3.2	4.3	23.0	4.2	1.7	0.5	23.9	5.2
Total	%	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

<sup>(</sup>a) Time series financial data are adjusted to 2014-15 dollars using the General Government Final Consumption Expenditure (GGFCE) chain price deflator (2014-15 = 100) (table 2A.48). See chapter 2 (sections 2.5-6) for details.

NSW: NSW has a subscription scheme but funds are deposited to the consolidated revenue of the NSW Treasury.

Tas: 2011-12 revenue data have been updated from that published in the ROGS 2013.

ACT: Revenue reported reflects direct revenue to the ACT Ambulance Service. No attributions have been made for the umbrella department or supporting services.

- Nil or rounded to zero.

Source: State and Territory governments (unpublished); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).; ABS 2015, Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0 (table 2A.48).

<sup>(</sup>b) Due to differences in definitions and counting rules, data reported may differ from data in agency annual reports and other sources.

<sup>(</sup>c) Totals may not add due to rounding.

<sup>(</sup>d) Other government contributions includes Australian Government grants, Local government grants, and indirect government funding

<sup>(</sup>e) Jurisdiction notes:

Table 9A.33 Reported ambulance incidents, responses, patients and transport (a), (b)

	Unit	NSW (c)	Vic (c)	Qld (c)	WA	SA	Tas (c)	ACT	NT (c)	Aust (c)
2014-15										
Incidents										
Emergency incidents	no.	474 417	331 153	325 877	93 292	125 557	39 453	16 331	14 351	1 420 431
Urgent incidents	no.	268 670	191 359	369 106	57 898	86 405	22 378	19 147	17 227	1 032 190
Non-emergency incid	ents no.	150 974	310 841	250 867	111 539	62 141	12 249	11 485	6 547	916 643
Casualty room attend	ances no.	_	_	520	_	_	_	_	_	520
Total incidents	no.	894 061	833 353	946 370	262 729	274 103	74 080	46 963	38 125	3 369 784
Incidents pe	r 1 000 people	118.2	141.6	199.2	101.8	162.0	143.8	121.2	156.1	144.1
Responses										
Emergency response	s no.	614 792	494 018	429 263	109 791	177 134	47 799	17 387	14 351	1 904 535
Urgent responses	no.	335 882	248 430	409 828	71 100	118 575	26 090	19 142	17 227	1 246 274
Non-emergency resp	onses no.	176 871	364 867	258 054	132 546	82 197	13 202	9 913	6 380	1 044 030
Total responses	no.	1 127 545	1 107 315	1 097 145	313 437	377 906	87 091	46 442	37 958	4 194 839
Responses pe	r 1 000 people	149.0	188.1	231.0	121.4	223.4	169.0	119.8	155.4	177.6
Patients										
Transported	no.	697 717	666 142	811 764	231 687	222 970	60 779	33 031	37 066	2 761 156
Treated not transport	ed no.	157 981	98 629	90 896	32 356	28 712	14 034	7 325	9 828	439 761
Total patients	no.	855 698	764 771	902 660	264 043	251 682	74 813	40 356	46 894	3 200 917
Patients pe	r 1 000 people	113.1	129.9	190.0	102.3	148.8	145.2	104.1	192.0	136.9
Transport										
Total fleet road	m km	45.1	35.3	37.1	7.5	11.7	3.4	1.2	na	141.3
Flying hours fixed wir	ig '000 hrs	8.5	5.0	na	na	8.5	1.4	na	na	23.4
Flying hours rotary wi	ng '000 hrs	6.7	2.8	na	na	1.1	0.1	0.7	na	11.5
2013-14										
Incidents										
Emergency incidents	no.	479 544	321 839	318 215	92 824	115 786	39 117	15 055	na	1 382 380
Urgent incidents	no.	247 863	176 573	340 826	54 922	89 550	21 804	20 147	na	951 685
Non-emergency incid	ents no.	_	345 815	236 923	104 671	60 596	12 452	8 243	_	768 700
Casualty room attend	ances no.	_	_	562	_	_	_	_	_	562
Total incidents	no.	727 407	844 227	896 526	252 417	265 932	73 373	43 445	na	3 103 327
Incidents pe	r 1 000 people	97.4	145.8	191.1	99.0	158.6	142.8	113.1	na	134.5

FIRE AND AMBULANCE SERVICES PAGE 1 of TABLE 9A.33

Table 9A.33 Reported ambulance incidents, responses, patients and transport (a), (b)

		Unit	NSW (c)	Vic (c)	Qld (c)	WA	SA	Tas (c)	ACT	NT (c)	Aust (c)
Responses											
Emergency resp	oonses	no.	617 405	485 388	426 766	108 703	164 534	48 594	16 066	17 351	1 884 807
Urgent respons	es	no.	309 964	232 672	377 639	66 169	122 336	25 651	18 746	18 408	1 171 585
Non-emergency	responses	no.	307 474	390 237	243 318	119 184	78 662	13 460	8 386	9 027	1 169 748
Total response	es	no.	1 234 843	1 108 297	1 047 723	294 056	365 532	87 705	43 198	44 786	4 226 140
Responses	per 1 000	people	165.4	191.4	223.4	115.3	217.9	170.6	112.5	184.6	181.2
Patients											
Transported		no.	813 056	682 997	777 263	220 493	211 241	59 855	30 314	na	2 795 219
Treated not tran	nsported	no.	146 660	92 428	85 114	28 219	30 459	13 806	7 139	na	403 825
<b>Total patients</b>		no.	959 716	775 425	862 377	248 712	241 700	73 661	37 453	na	3 199 044
Patients	per 1 000	people	128.6	133.9	183.8	97.5	144.1	143.3	97.5	na	137.2
Transport											
Total fleet road		m km	40.2	35.8	35.2	7.1	11.3	3.2	1.1	na	133.8
Flying hours fixe	ed wing	'000 hrs	8.4	5.2	_	_	_	1.5	_	-	15.1
Flying hours rot	ary wing	'000 hrs	6.0	3.1	_	_	_	0.1	8.0	-	10.0
2012-13											
Incidents											
Emergency inci	dents	no.	547 691	312 021	310 013	91 749	129 142	37 865	14 464	na	1 442 945
Urgent incidents	S	no.	159 381	164 547	323 903	50 746	73 725	20 487	18 869	na	811 658
Non-emergency	/ incidents	no.	286 541	339 351	233 827	103 592	59 687	12 164	8 013	na	1 043 175
Casualty room a	attendances	no.	_	_	2 470	_	_	_	_	_	2 470
Total incidents	<b>;</b>	no.	993 613	815 919	870 213	246 087	262 554	70 516	41 346	na	3 300 248
Incidents	per 1 000	people	135.2	143.7	188.7	99.5	158.0	137.6	108.9	na	145.6
Responses											
Emergency resp	oonses	no.	699 360	469 756	409 031	106 379	179 051	47 301	15 455	14 535	1 940 868
Urgent respons	es	no.	198 772	217 678	358 495	61 611	100 357	24 203	17 926	22 379	1 001 421
Non-emergency	responses	no.	321 130	391 346	229 106	117 899	73 406	13 206	8 179	10 657	1 164 929
Total response	es	no.	1 219 262	1 078 780	996 632	285 889	352 814	84 710	41 560	47 571	4 107 218
Responses	per 1 000	people	165.9	189.9	216.1	115.6	212.3	165.3	109.5	200.8	179.3
Patients											
Transported		no.	816 262	659 564	736 100	218 747	201 667	58 114	29 864	36 966	2 757 284

FIRE AND AMBULANCE SERVICES PAGE 2 of TABLE 9A.33

Table 9A.33 Reported ambulance incidents, responses, patients and transport (a), (b)

	Unit	NSW (c)	Vic (c)	Qld (c)	WA	SA	Tas (c)	ACT	NT (c)	Aust (c)
Treated not transported	no.	141 310	79 061	87 971	23 777	32 057	12 620	7 001	10 485	394 282
Total patients	no.	957 572	738 625	824 071	242 524	233 724	70 734	36 865	47 451	3 151 566
Patients per 1 000	people	130.3	130.0	178.7	98.1	140.6	138.0	97.1	200.3	137.6
Transport										
Total fleet road	m km	36.3	34.1	34.1	7.0	11.5	2.9	1.3	na	127.2
Flying hours fixed wing	'000 hrs	9.0	4.9	_	_	_	1.4	_	_	15.3
Flying hours rotary wing	'000 hrs	6.3	3.5	_	_	_	0.1	8.0	_	10.7
2011-12										
Incidents										
Emergency incidents	no.	547 520	293 480	288 541	88 904	140 930	34 188	14 825	na	1 408 388
Urgent incidents	no.	138 607	158 257	307 103	44 415	57 091	21 785	16 442	na	743 700
Non-emergency incidents	no.	287 262	343 035	232 762	95 528	57 542	12 458	7 845	na	1 036 432
Casualty room attendances	no.	_	_	4 837	_	_	_	_	_	4 837
Total incidents	no.	973 389	794 772	833 243	228 847	255 563	68 431	39 112	na	3 193 357
Incidents per 1 000	people	134.3	142.6	184.6	95.9	155.4	133.7	105.5	na	143.5
Responses										
Emergency responses	no.	694 660	428 220	368 193	100 544	191 234	42 003	15 642	13 437	1 853 933
Urgent responses	no.	171 065	202 825	335 817	53 832	74 488	24 797	15 945	20 817	899 586
Non-emergency responses	no.	318 070	385 746	227 323	111 195	62 531	13 339	8 321	10 187	1 136 712
Total responses	no.	1 183 795	1 016 791	931 333	265 571	328 253	80 139	39 908	44 441	3 890 231
Responses per 1 000	people	163.3	182.4	206.4	111.2	199.5	156.6	107.6	191.3	173.0
Patients										
Transported	no.	801 256	649 918	701 385	210 944	196 625	55 272	26 934	35 900	2 678 234
Treated not transported	no.	129 851	68 109	80 777	19 224	46 421	11 865	6 159	8 541	370 947
Total patients	no.	931 107	718 027	782 162	230 168	243 046	67 137	33 093	44 441	3 049 181
Patients per 1 000	people	128.5	128.8	173.3	96.4	147.7	131.2	89.3	191.3	135.6
Transport										
Total fleet road	m km	35.9	29.5	33.9	7.2	10.5	2.8	1.1	1.0	121.9
Flying hours fixed wing	'000 hrs	9.1	4.9	_	_	_	1.4	_	_	15.4
Flying hours rotary wing	'000 hrs	6.2	3.2	_	_	_	0.4	0.7	_	10.5
2010-11										

FIRE AND AMBULANCE SERVICES PAGE 3 of TABLE 9A.33

Table 9A.33 Reported ambulance incidents, responses, patients and transport (a), (b)

	Unit	NSW (c)	Vic (c)	Qld (c)	WA	SA	Tas (c)	ACT	NT (c)	Aust (c
Incidents										
Emergency incidents	no.	514 232	278 401	256 590	65 297	133 447	36 352	13 734	na	1 298 053
Urgent incidents	no.	147 869	165 564	302 871	50 819	57 577	21 333	15 771	na	761 804
Non-emergency incidents	no.	281 846	337 324	236 240	89 711	87 492	17 608	6 606	na	1 056 827
Casualty room attendance	s no.	_	_	5 607	_	_	_	_	_	5 607
Total incidents	no.	943 947	781 289	801 308	205 827	278 516	75 293	36 111	na	3 122 291
Incidents per 1 00	00 people	131.5	142.2	180.6	88.8	170.6	147.6	99.0	na	142.3
Responses										
Emergency responses	no.	655 400	404 046	331 033	71 429	167 451	41 098	13 657	11 278	1 695 392
Urgent responses	no.	181 670	207 053	331 537	59 451	67 140	22 770	15 113	20 262	904 996
Non-emergency response	s no.	312 750	376 928	231 396	104 038	88 501	16 345	7 098	9 083	1 146 139
Total responses	no.	1 149 820	988 027	893 966	234 918	323 092	80 213	35 868	40 623	3 746 527
Responses per 1 00	00 people	160.1	179.8	201.5	101.3	197.9	157.2	98.3	176.4	169.0
Patients										
Transported	no.	777 548	639 747	674 915	190 469	192 027	54 765	24 275	32 836	2 586 582
Treated not transported	no.	126 394	67 641	60 550	17 475	42 652	8 760	6 696	3 537	333 705
Total patients	no.	903 942	707 388	735 465	207 944	234 679	63 525	30 971	36 373	2 920 287
Patients per 1 00	00 people	125.9	128.7	165.8	89.7	143.8	124.5	84.9	157.9	131.7
Transport										
Total fleet road	m km	35.1	29.0	31.2	6.8	10.5	2.7	0.9	0.9	117.1
Flying hours fixed wing	'000 hrs	8.3	4.7	_	_	_	1.4	_	_	14.3
Flying hours rotary wing	'000 hrs	6.2	3.0	_	0.5	_	0.7	0.7	_	11.0
009-10										
Incidents										
Emergency incidents	'000	503 534	261 031	232 142	57 646	122 916	35 076	13 668	na	1 226 013
Urgent incidents	'000	155 192	158 969	284 165	49 724	58 324	22 577	15 911	na	744 862
Non-emergency incidents	'000	277 720	322 144	228 316	87 184	86 476	11 959	6 329	na	1 020 128
Casualty room attendance	s '000	_	_	5 819	_	_	_	_	_	5 819
Total incidents	no.	936 446	742 144	750 442	194 554	267 716	69 612	35 908	na	2 996 822
Incidents per 1 00	00 people	131.9	136.9	171.8	85.9	165.4	137.4	100.3	na	138.5

FIRE AND AMBULANCE SERVICES PAGE 4 of TABLE 9A.33

Table 9A.33 Reported ambulance incidents, responses, patients and transport (a), (b)

	Unit	NSW (c)	Vic (c)	Qld (c)	WA	SA	Tas (c)	ACT	NT (c)	Aust (c)
Emergency response	s no.	638 230	356 212	304 952	62 454	153 163	38 306	13 422	10 304	1 577 043
Urgent responses	no.	188 579	188 119	308 773	57 415	67 013	23 602	15 372	18 316	867 189
Non-emergency resp	onses no.	306 202	355 802	223 831	100 038	86 932	10 760	6 822	9 193	1 099 580
Total responses	no.	1 133 011	900 133	837 556	219 907	307 108	72 668	35 616	37 813	3 543 812
Responses pe	r 1 000 people	159.5	166.1	191.8	97.1	189.7	143.5	99.5	166.0	162.1
Patients										
Transported	no.	768 535	617 216	628 255	183 896	190 219	51 837	23 563	30 639	2 494 160
Treated not transport	ed no.	123 527	65 409	54 288	17 067	38 425	8 755	6 957	3 198	317 626
Total patients	no.	892 062	682 625	682 543	200 963	228 644	60 592	30 520	33 837	2 811 786
Patients pe	r 1 000 people	125.6	126.0	156.3	88.8	141.3	119.6	85.3	148.5	128.6
Transport										
Total fleet road	m km	33.4	29.6	30.3	6.4	10.4	2.7	0.9	0.8	114.5
Flying hours fixed wir	ng '000 hrs	8.1	4.7	_	_	_	1.4	_	_	14.2
Flying hours rotary wi	ng '000 hrs	6.5	2.8	_	0.4	_	0.5	0.7	_	10.8
2008-09										
Incidents										
Emergency incidents	'000	491 432	239 871	217 027	51 001	108 391	30 207	12 104	na	1 150 033
Urgent incidents	'000	181 031	152 903	285 266	46 167	62 057	23 156	13 656	na	764 236
Non-emergency incid	ents '000	266 320	321 588	241 711	87 175	75 837	10 014	6 789	na	1 009 434
Casualty room attend	lances '000	_	_	6 734	_	_	_	_	_	6 734
<b>Total incidents</b>	no.	938 783	714 362	750 738	184 343	246 285	63 377	32 549	na	2 930 437
Incidents pe	r 1 000 people	134.1	134.4	175.6	83.5	154.1	126.3	92.7	na	137.9
Responses										
Emergency response	s no.	610 547	330 908	285 273	55 477	128 182	32 632	13 041	10 151	1 466 211
Urgent responses	no.	214 738	177 587	308 542	53 095	68 398	23 645	14 219	17 580	877 804
Non-emergency resp	onses no.	294 705	355 681	234 751	99 389	75 883	8 782	7 140	9 697	1 086 028
Total responses	no.	1 119 990	864 176	828 566	207 961	272 463	65 059	34 400	37 428	3 430 043
Responses pe	r 1 000 people	160.0	162.6	193.8	94.1	170.5	129.7	98.0	168.2	159.7
Patients										
Transported	no.	764 410	593 398	607 049	173 352	184 487	37 740	21 554	30 068	2 412 058
Treated not transport	ed no.	119 306	62 108	50 841	18 456	35 246	12 359	6 806	3 423	308 545

FIRE AND AMBULANCE SERVICES PAGE **5** of TABLE 9A.33

Table 9A.33 Reported ambulance incidents, responses, patients and transport (a), (b)

		Unit	NSW (c)	Vic (c)	Qld (c)	WA	SA	Tas (c)	ACT	NT (c)	Aust (c)
Total patients		no.	883 716	655 506	657 890	191 808	219 733	50 099	28 360	33 491	2 720 603
Patients	per 1 000	people	126.2	123.4	153.9	86.8	137.5	99.8	80.8	150.5	126.7
Transport											
Total fleet road		m km	30.4	30.8	29.6	6.0	10.4	2.4	0.9	0.8	111.4
Flying hours fixe	ed wing	'000 hrs	8.2	4.8	_	_	_	1.3	_	_	14.3
Flying hours rota	ary wing	'000 hrs	7.0	2.2	_	0.5	_	0.5	0.6	_	10.8
2007-08											
Incidents											
Emergency incid	dents	'000	479 511	227 632	220 160	48 387	107 941	29 327	11 941	na	1 124 899
Urgent incidents	3	'000	196 316	161 772	283 749	40 544	58 961	21 937	12 783	na	776 062
Non-emergency	incidents	'000	256 118	312 831	220 133	85 139	69 241	9 592	7 757	na	960 811
Casualty room a	attendances	'000	_	_	8 511	_	_	_	_	_	8 511
Total incidents		no.	931 945	702 235	732 553	174 070	236 143	60 856	32 481	na	2 870 283
Incidents	per 1 000	people	135.4	135.1	176.1	81.5	149.6	122.7	94.4	na	138.0
Responses											
Emergency resp	onses	no.	604 731	329 986	310 985	51 012	119 799	31 516	12 753	8 097	1 468 879
Urgent response	es	no.	233 451	175 737	328 512	41 370	62 908	22 778	13 382	17 863	896 001
Non-emergency	responses	no.	280 433	324 805	218 014	87 949	69 154	8 550	7 895	9 031	1 005 831
Total response	s	no.	1 118 615	830 528	857 511	180 331	251 861	62 844	34 030	34 991	3 370 711
Responses	per 1 000	people	162.5	159.7	206.1	84.5	159.6	126.7	98.9	161.5	160.4
Patients											
Transported		no.	754 563	586 603	604 193	163 428	182 908	37 035	20 100	28 147	2 376 977
Treated not trans	sported	no.	105 671	60 913	47 106	18 601	32 648	12 584	7 175	1 817	286 515
Total patients		no.	860 234	647 516	651 299	182 029	215 556	49 619	27 275	29 964	2 663 492
Patients	per 1 000	people	125.0	124.5	156.6	85.3	136.6	100.1	79.2	138.3	126.7
Transport											
Total fleet road		m km	30.1	25.6	28.0	5.9	10.5	2.3	0.8	0.8	104.1
Flying hours fixe	ed wing	'000 hrs	8.0	4.9	_	_	_	1.3	_	_	14.2
Flying hours rota	ary wing	'000 hrs	6.9	2.0	_	0.6	_	0.5	0.7	_	10.8
2006-07											

Incidents

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Table 9A.33 Reported ambulance incidents, responses, patients and transport (a), (b)

		Unit	NSW (c)	Vic (c)	Qld (c)	WA	SA	Tas (c)	ACT	NT (c)	Aust (c)
Emergency incident	S	'000	453 179	232 446	189 941	45 024	97 172	28 840	10 801	na	1 057 403
Urgent incidents		'000	181 313	156 189	270 034	40 510	63 876	20 441	11 689	na	744 052
Non-emergency inc	idents	'000	245 723	285 756	212 609	80 393	59 199	11 493	6 597	na	901 770
Casualty room atter	dances	'000	_	_	9 590	_	_	_	_	-	9 590
Total incidents		no.	880 215	674 391	682 174	165 927	220 247	60 774	29 087	na	2 712 815
Incidents p	er 1 000 pe	eople	129.7	132.1	168.2	79.9	141.1	123.6	86.0	na	132.9
Responses											
Emergency respons	es	no.	572 489	333 467	274 031	46 205	106 048	31 032	12 237	8 063	1 383 572
Urgent responses		no.	212 564	176 956	311 269	42 087	67 526	21 519	12 932	16 108	860 961
Non-emergency res	ponses	no.	267 893	294 674	212 002	83 088	58 869	10 205	7 107	9 878	943 716
Total responses		no.	1 052 946	805 097	797 302	171 380	232 443	62 756	32 276	34 049	3 188 249
Responses p	er 1 000 pe	eople	155.2	157.7	196.6	82.5	148.9	127.7	95.4	161.3	154.6
Patients											
Transported		no.	709 218	564 917	568 903	155 099	174 200	37 225	19 298	26 866	2 255 726
Treated not transpo	rted	no.	180 238	58 256	52 223	18 480	27 488	12 198	7 518	2 237	358 638
Total patients		no.	889 456	623 173	621 126	173 579	201 688	49 423	26 816	29 103	2 614 364
Patients p	er 1 000 pe	eople	131.1	122.1	153.1	83.6	129.2	100.6	79.2	137.9	126.7
Transport											
Total fleet road	1	m km	na	23.6	25.4	5.8	9.4	2.3	0.8	0.7	na
Flying hours fixed w	ing	'000 hrs	7.7	4.8	_	_	_	1.2	_	_	13.7
Flying hours rotary	wing	'000 hrs	5.8	2.0	_	0.4	_	0.4	0.6	_	9.2
2005-06											
Incidents											
Emergency incident	S	'000	413 810	218 684	164 948	43 207	87 263	29 009	11 165	na	968 086
Urgent incidents		'000	176 098	139 307	255 830	41 274	67 476	18 187	10 575	na	708 747
Non-emergency inc	idents	'000	244 547	272 853	207 185	71 145	51 496	12 034	5 251	na	864 511
Casualty room atter	dances	'000	_	_	7 884	_	_	_	_	_	7 884
Total incidents		no.	834 455	630 844	635 847	155 626	206 235	59 230	26 991	na	2 549 228
Incidents p	er 1 000 pe	eople	124.2	125.6	160.4	76.7	133.5	121.3	80.9	na	126.8
Responses											
Emergency respons		no.	528 273	314 781	236 451	43 715	93 640	31 487	12 487	8 464	1 269 298

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Table 9A.33 Reported ambulance incidents, responses, patients and transport (a), (b)

		Unit	NSW (c)	Vic (c)	Qld (c)	WA	SA	Tas (c)	ACT	NT (c)	Aust (c)
Urgent responses		no.	205 056	155 998	288 767	42 323	70 407	19 370	11 644	14 195	807 760
Non-emergency re	esponses	no.	265 698	281 101	206 986	73 115	51 030	10 917	5 663	8 768	903 278
Total responses		no.	999 027	751 880	732 204	159 153	215 077	61 774	29 794	31 427	2 980 336
Responses	per 1 000	people	148.7	149.7	184.7	78.4	139.2	126.6	89.3	151.5	146.7
Patients											
Transported		no.	654 782	533 507	555 678	147 066	161 245	36 532	18 891	24 847	2 132 548
Treated not transp	orted	no.	146 100	50 046	45 002	14 392	27 167	9 511	5 913	2 200	300 331
Total patients		no.	800 882	583 553	600 680	161 458	188 412	46 043	24 804	27 047	2 432 879
Patients	per 1 000	people	119.2	116.2	151.5	79.5	122.0	94.3	74.4	130.4	119.8
Transport											
Total fleet road		m km	na	21.2	21.8	5.3	8.9	2.2	0.8	0.7	na
Flying hours fixed	wing	'000 hrs	7.7	5.0	_	_	_	1.3	_	_	14.0
Flying hours rotary	y wing	'000 hrs	5.8	1.9	_	0.4	_	0.2	0.6	_	8.9

<sup>(</sup>a) An incident is an event that results in a demand for ambulance resources to respond. An ambulance response is a vehicle or vehicles sent to an incident. There may be multiple responses/vehicles sent to a single incident. A patient is someone assessed, treated or transported by the ambulance service.

NSW: Non-emergency responses declined from May 2014 with the transfer of responsibility for these transports in the greater metro area to another agency.

The implementation of a new response grid in March 2013 is reflected in the decline of emergency responses and increase in urgent responses from 2012-13.

Comparisons of NSW case types in 2008-09 with previous years is affected by changes in the Medical Priority Dispatch System classification which were implemented in that year.

Vic: Victorian incidents and responses are for road ambulances only (excludes air ambulance).

Qld: Queensland responses are for road ambulances only, and do not include counts of responding units that are cancelled prior to arrival on scene.

Queensland incident and response counts include Code 2C cases where arrival is desirable within 60 minutes.

Tas: From 2011-12 flying hours data are recorded as actual engines on/off time. Prior to 2011-12 total case time was the only available information.

NT: Incident data are unavailable as data are not recorded on the JESC system and all cases are considered an incident. A response is counted as an incident, therefore, data for incidents are not included in the rates for Australia.

In 2013-14, patients data are not available due to protected Industrial Action.

Aust: Australian incidents data exclude NT.

Australian patients data exclude NT in 2013-14.

**na** Not available. – Nil or rounded to zero.

<sup>(</sup>b) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

<sup>(</sup>c) Jurisdiction notes:

Table 9A.33 Reported ambulance incidents, responses, patients and transport (a), (b)

Unit	NSW (c)	Vic (c)	Qld (c)	WA	SA	Tas (c)	ACT	NT (c)	Aust (c)
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Source: State and Territory governments (unpublished); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2014-15										
Emergency department patients	who arrived by ambu	ılance, air a	mbulance,	or helicopter						
1 - Resuscitation	'000	13.9	6.4	9.3	4.9	5.0	0.7	0.5	0.6	41.2
2 - Emergency	'000	129.3	75.7	94.8	34.5	31.9	6.9	4.9	6.2	384.1
3 - Urgent	'000	268.2	192.3	233.3	67.4	66.4	20.5	13.2	10.8	872.1
4 - Semi urgent	'000	171.5	108.1	93.7	35.1	31.8	11.7	7.1	8.8	467.8
5 - Non urgent	'000	14.6	4.3	4.0	1.4	2.3	0.7	0.7	0.9	28.8
Total	'000	597.7	386.8	435.0	143.4	137.4	40.5	26.3	27.3	1 794.4
Total number of emergency pres	entations									
1 - Resuscitation	'000	16.5	7.8	10.8	5.8	5.9	0.8	0.5	0.9	49.0
2 - Emergency	'000	295.2	166.6	180.5	97.1	62.9	12.3	12.1	16.7	843.4
3 - Urgent	'000	834.1	570.2	592.0	272.6	174.2	50.7	43.9	40.7	2 578.4
4 - Semi urgent	'000	1 131.9	718.5	524.9	370.3	190.6	69.5	54.3	70.4	3 130.4
5 - Non urgent	'000	399.6	146.2	70.7	57.8	35.7	16.4	19.1	13.6	759.2
Total	'000	2 681.5	1 610.6	1 378.9	803.8	469.4	150.1	130.0	142.2	7 366.4
Per cent of emergency departme	nt patients who arriv	ed by ambu	ılance, air a	mbulance or	helicopter					
1 - Resuscitation	%	84.1	82.6	85.4	83.6	85.0	88.4	92.9	67.6	84.1
2 - Emergency	%	43.8	45.4	52.5	35.5	50.6	56.5	40.1	36.9	45.5
3 - Urgent	%	32.2	33.7	39.4	24.7	38.1	40.4	30.1	26.5	33.8
4 - Semi urgent	%	15.2	15.0	17.8	9.5	16.7	16.9	13.0	12.6	14.9
5 - Non urgent	%	3.6	2.9	5.6	2.5	6.6	4.0	3.4	6.4	3.8
Total	%	22.3	24.0	31.5	17.8	29.3	27.0	20.2	19.2	24.4

Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2013-14										
Emergency department patients	who arrived by ambu	ılance, air a	mbulance,	or helicopter						
1 - Resuscitation	'000	13.6	6.1	8.5	4.4	4.8	0.7	0.4	0.6	39.3
2 - Emergency	'000	124.5	71.9	87.4	31.3	29.8	6.9	4.6	5.4	361.7
3 - Urgent	'000	264.8	179.5	222.5	60.2	62.5	19.9	12.8	11.3	833.5
4 - Semi urgent	'000	181.7	105.0	93.4	30.2	28.9	11.3	6.9	9.5	466.9
5 - Non urgent	'000	15.9	4.4	4.4	1.2	1.9	0.7	0.5	0.7	29.7
Total	'000	600.8	366.9	416.3	127.4	127.8	39.4	25.2	27.6	1 731.4
Total number of emergency pres	sentations									
1 - Resuscitation	'000	16.1	7.5	10.0	5.3	5.7	0.7	0.5	0.9	46.7
2 - Emergency	'000	274.4	159.7	164.6	88.4	59.5	12.2	12.2	14.8	785.8
3 - Urgent	'000	802.3	540.3	567.0	250.2	170.3	49.9	43.1	41.3	2 464.3
4 - Semi urgent	'000	1 123.5	711.9	535.9	340.0	192.3	69.6	53.5	73.8	3 100.6
5 - Non urgent	'000	425.6	151.6	74.1	58.7	35.5	15.4	16.6	14.3	791.8
Total	'000	2 646.4	1 572.8	1 351.6	742.6	463.2	148.3	125.9	145.2	7 195.9
Per cent of emergency departme	ent patients who arriv	ed by ambu	ılance, air a	mbulance or	helicopter					
1 - Resuscitation	%	84.6	81.4	85.4	84.2	84.3	89.7	88.6	67.9	84.0
2 - Emergency	%	45.4	45.0	53.1	35.4	50.1	56.3	37.7	36.3	46.0
3 - Urgent	%	33.0	33.2	39.2	24.1	36.7	39.9	29.7	27.4	33.8
4 - Semi urgent	%	16.2	14.7	17.4	8.9	15.0	16.3	12.8	12.9	15.1
5 - Non urgent	%	3.7	2.9	6.0	2.0	5.3	4.3	2.8	5.2	3.7
Total	%	22.7	23.3	30.8	17.2	27.6	26.6	20.0	19.0	24.1

Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2012-13										
Emergency department patients v	who arrived by ambu	ılance, air a	mbulance, d	or helicopter						
1 - Resuscitation	'000	12.3	6.0	8.5	5.0	4.9	8.0	0.4	0.5	38.4
2 - Emergency	'000	110.5	66.2	80.0	30.9	27.7	6.5	5.0	4.9	331.8
3 - Urgent	'000	246.2	170.5	209.3	59.3	58.7	19.4	11.7	11.7	787.0
4 - Semi urgent	'000	177.4	104.3	84.7	32.5	27.3	10.7	6.8	10.7	454.3
5 - Non urgent	'000	15.4	4.3	3.9	1.5	1.8	0.6	0.4	0.8	28.7
Total	'000	562.0	351.4	386.5	129.2	120.3	38.0	24.4	28.7	1 640.4
Total number of emergency prese	entations									
1 - Resuscitation	'000	14.5	7.2	9.8	5.8	5.8	0.8	0.5	0.8	45.3
2 - Emergency	'000	236.8	147.0	149.7	87.0	56.6	11.5	12.9	12.2	713.8
3 - Urgent	'000	720.3	511.5	537.1	246.5	164.6	49.3	40.3	39.6	2 309.3
4 - Semi urgent	'000	997.2	710.8	512.6	355.0	193.1	69.7	53.6	77.4	2 969.5
5 - Non urgent	'000	306.3	150.1	74.9	59.8	35.1	15.3	11.6	15.5	668.5
Total	'000	2 278.6	1 528.6	1 284.2	754.1	455.2	147.1	118.9	145.5	6 712.2
Per cent of emergency departmen	nt patients who arriv	ed by ambu	lance, air a	mbulance or	helicopter					
1 - Resuscitation	%	84.5	83.2	86.8	85.1	84.0	91.5	89.2	69.7	84.7
2 - Emergency	%	46.7	45.0	53.4	35.5	48.9	56.5	39.1	40.3	46.5
3 - Urgent	%	34.2	33.3	39.0	24.1	35.6	39.4	29.1	29.7	34.1
4 - Semi urgent	%	17.8	14.7	16.5	9.2	14.1	15.3	12.7	13.8	15.3
5 - Non urgent	%	5.0	2.9	5.2	2.5	5.0	4.2	3.1	5.4	4.3
Total	%	24.7	23.0	30.1	17.1	26.4	25.8	20.5	19.7	24.4

Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2011-12										
Emergency department patients v	vho arrived by ambu	ılance, air a	mbulance,	or helicopte	•					
1 - Resuscitation	'000	10.9	5.9	8.8	4.6	4.3	0.6	0.4	0.5	36.1
2 - Emergency	'000	97.7	60.7	73.8	29.5	25.2	6.1	5.1	4.3	302.3
3 - Urgent	'000	237.5	163.9	194.5	57.1	55.1	18.1	12.0	11.7	749.9
4 - Semi urgent	'000	181.6	103.2	79.1	32.2	25.6	11.0	6.2	9.8	448.8
5 - Non urgent	'000	18.0	4.8	3.6	1.4	1.6	0.6	0.3	0.6	30.9
Total	'000	546.9	338.6	359.9	124.7	111.8	36.4	24.0	26.9	1 569.3
Total number of emergency prese	entations									
1 - Resuscitation	'000	12.9	7.1	10.3	5.4	5.2	0.7	0.5	0.7	42.6
2 - Emergency	'000	206.9	134.9	139.5	81.1	51.5	10.5	12.9	10.4	647.8
3 - Urgent	'000	689.7	484.7	513.0	232.6	152.3	46.3	39.6	40.7	2 198.8
4 - Semi urgent	'000	977.0	712.7	496.9	348.7	185.7	67.5	52.6	78.1	2 919.2
5 - Non urgent	'000	342.5	167.4	78.9	58.1	32.4	16.3	12.8	14.9	723.3
Total	'000	2 235.5	1 509.1	1 238.5	725.8	427.0	141.7	118.4	144.8	6 540.8
Per cent of emergency departmen	nt patients who arriv	ed by ambu	ılance, air a	mbulance o	helicopter					
1 - Resuscitation	%	84.6	83.4	85.7	85.1	84.1	91.6	88.6	71.7	84.6
2 - Emergency	%	47.2	45.0	52.9	36.3	48.9	57.9	39.6	41.1	46.7
3 - Urgent	%	34.4	33.8	37.9	24.6	36.2	39.1	30.2	28.7	34.1
4 - Semi urgent	%	18.6	14.5	15.9	9.2	13.8	16.3	11.9	12.6	15.4
5 - Non urgent	%	5.2	2.9	4.6	2.4	4.9	3.8	2.2	4.2	4.3
Total	%	24.5	22.4	29.1	17.2	26.2	25.7	20.3	18.6	24.0

Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2010-11										
Emergency department patients	who arrived by ambu	ılance, air a	mbulance,	or helicopter	•					
1 - Resuscitation	'000	10.3	6.5	9.5	4.3	3.8	0.6	0.4	0.6	36.0
2 - Emergency	'000	83.2	59.5	67.5	26.9	23.4	5.8	4.4	3.6	274.3
3 - Urgent	'000	213.8	158.9	179.6	51.2	51.0	18.0	10.2	10.0	692.7
4 - Semi urgent	'000	178.0	98.2	77.7	28.5	24.0	10.6	6.4	9.5	432.8
5 - Non urgent	'000	19.7	4.2	3.8	1.0	1.8	0.5	0.5	0.7	32.1
Total	'000	505.1	327.2	338.1	111.9	104.0	35.9	21.8	24.3	1 468.3
Total number of emergency pres	entations									
1 - Resuscitation	'000	12.2	7.9	10.9	5.1	4.5	0.6	0.5	8.0	42.4
2 - Emergency	'000	173.0	132.7	126.6	72.0	47.3	10.2	11.1	8.6	581.6
3 - Urgent	'000	620.6	467.5	482.6	206.0	138.9	48.3	34.4	36.4	2 034.8
4 - Semi urgent	'000	925.3	694.2	488.7	320.0	164.0	69.6	51.4	79.0	2 792.2
5 - Non urgent	'000	341.9	178.6	86.5	46.0	29.4	14.7	14.8	16.6	728.5
Total	'000	2 074.1	1 483.2	1 195.3	649.2	384.0	143.8	112.2	141.4	6 183.3
Per cent of emergency departme	nt patients who arriv	ed by ambu	ılance, air a	mbulance or	helicopter					
1 - Resuscitation	%	84.8	82.2	87.1	84.5	85.0	90.0	85.5	72.4	84.8
2 - Emergency	%	48.1	44.8	53.4	37.3	49.5	56.5	39.3	41.6	47.2
3 - Urgent	%	34.5	34.0	37.2	24.8	36.8	37.3	29.5	27.5	34.0
4 - Semi urgent	%	19.2	14.1	15.9	8.9	14.6	15.3	12.4	12.1	15.5
5 - Non urgent	%	5.8	2.3	4.4	2.3	6.0	3.2	3.1	4.1	4.4
Total	%	24.4	22.1	28.3	17.2	27.1	24.9	19.4	17.2	23.7

Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2009-10										
Emergency department patients	who arrived by ambi	ılance, air a	mbulance,	or helicopte						
1 - Resuscitation	'000	10.2	7.8	8.0	4.2	3.7	0.7	0.4	0.6	35.7
2 - Emergency	'000	80.1	55.7	59.8	26.0	21.5	5.9	4.0	3.9	256.8
3 - Urgent	'000	209.1	149.0	163.3	47.6	48.6	17.4	10.2	9.6	654.8
4 - Semi urgent	'000	173.2	96.4	73.9	27.8	23.6	9.2	6.0	7.8	417.8
5 - Non urgent	'000	19.6	4.8	3.6	0.9	1.8	0.4	0.4	0.5	32.0
Total	'000	492.7	313.7	308.5	106.6	99.2	34.0	21.0	22.4	1 398.1
Total number of emergency pres	entations									
1 - Resuscitation	'000	12.2	9.3	9.1	5.0	4.3	0.8	0.5	0.8	42.0
2 - Emergency	'000	166.7	121.1	113.5	65.9	43.0	10.7	9.9	9.2	540.1
3 - Urgent	'000	605.3	430.5	450.5	185.6	134.1	48.7	33.4	36.5	1 924.6
4 - Semi urgent	'000	903.8	668.5	470.7	299.9	163.2	65.8	48.8	70.4	2 691.2
5 - Non urgent	'000	344.3	201.0	90.1	44.1	29.1	15.2	14.3	15.6	753.8
Total	'000	2 035.8	1 432.7	1 134.1	600.6	373.7	141.6	106.8	132.6	5 958.0
Per cent of emergency departme	nt patients who arriv	ed by ambu	ılance, air a	mbulance o	helicopter					
1 - Resuscitation	%	83.7	83.7	87.6	85.6	86.1	90.1	86.7	74.9	85.0
2 - Emergency	%	48.1	46.0	52.6	39.4	49.9	55.0	40.8	42.1	47.6
3 - Urgent	%	34.6	34.6	36.2	25.6	36.3	35.8	30.5	26.4	34.0
4 - Semi urgent	%	19.2	14.4	15.7	9.3	14.5	13.9	12.3	11.0	15.5
5 - Non urgent	%	5.7	2.4	4.0	2.1	6.1	2.5	2.7	3.5	4.2
Total	%	24.2	21.9	27.2	17.7	26.5	24.0	19.7	16.9	23.5

Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2008-09										
Emergency department patients	who arrived by ambu	ulance, air a	mbulance,	or helicopte	•					
1 - Resuscitation	no.	10.5	7.5	7.4	4.1	3.9	0.6	0.4	0.6	35.0
2 - Emergency	no.	76.5	53.0	54.4	23.8	20.9	4.9	3.7	3.5	240.6
3 - Urgent	no.	206.8	135.3	152.6	43.7	45.7	15.7	9.3	9.2	618.2
4 - Semi urgent	no.	170.8	90.2	74.7	28.1	22.6	9.2	5.6	7.3	408.5
5 - Non urgent	no.	20.3	5.0	4.0	1.2	1.4	0.4	0.4	0.6	33.2
Total	no.	485.3	291.1	293.0	100.8	94.5	30.7	19.5	21.1	1 335.9
Total number of emergency pres	entations									
1 - Resuscitation	no.	12.6	9.1	8.4	4.8	4.5	0.7	0.5	0.8	41.5
2 - Emergency	no.	158.7	113.4	101.6	59.0	41.7	8.8	9.4	8.5	501.2
3 - Urgent	no.	602.7	398.9	413.9	169.2	124.9	42.6	31.1	36.6	1 819.9
4 - Semi urgent	no.	881.4	635.7	465.2	286.4	157.1	64.8	44.9	67.9	2 603.5
5 - Non urgent	no.	349.5	198.3	101.9	47.0	29.2	12.7	15.9	15.4	769.9
Total	no.	2 007.9	1 358.2	1 091.1	566.4	357.4	130.1	101.9	129.2	5 742.1
Per cent of emergency departme	nt patients who arriv	ed by ambu	ılance, air a	mbulance o	helicopter					
1 - Resuscitation	%	82.8	82.9	87.1	85.8	85.6	90.1	84.4	72.3	84.3
2 - Emergency	%	48.2	46.7	53.5	40.3	50.2	55.0	39.3	41.3	48.0
3 - Urgent	%	34.3	33.9	36.9	25.8	36.6	36.7	29.8	25.1	34.0
4 - Semi urgent	%	19.4	14.2	16.1	9.8	14.4	14.1	12.5	10.7	15.7
5 - Non urgent	%	5.8	2.5	3.9	2.5	4.7	2.8	2.7	3.8	4.3
Total	%	24.2	21.4	26.9	17.8	26.4	23.6	19.1	16.3	23.3

Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2007-08										
Emergency department patients	who arrived by ambu	ılance, air a	mbulance, o	r helicopter	•					
1 - Resuscitation	no.	10.1	7.1	6.3	3.8	3.8	0.7	0.4	0.6	32.8
2 - Emergency	no.	74.3	50.2	47.4	22.3	20.1	5.0	2.9	2.9	225.2
3 - Urgent	no.	204.2	132.1	136.4	40.2	44.9	14.7	8.8	8.5	589.9
4 - Semi urgent	no.	165.2	89.8	74.0	27.5	24.3	8.8	4.6	7.0	401.1
5 - Non urgent	no.	18.7	5.4	4.1	1.3	1.5	0.3	0.3	8.0	32.5
Total	no.	472.9	284.7	268.2	95.1	94.7	29.5	17.1	19.8	1 282.0
Total number of emergency pres	sentations									
1 - Resuscitation	no.	12.4	8.6	7.1	4.5	4.5	0.8	0.5	0.8	39.1
2 - Emergency	no.	155.5	107.0	86.5	55.5	40.8	9.4	7.7	7.4	469.7
3 - Urgent	no.	603.8	389.0	350.0	160.1	125.4	41.7	31.8	36.1	1 737.7
4 - Semi urgent	no.	864.0	632.8	415.8	292.9	169.2	62.3	44.6	65.2	2 546.8
5 - Non urgent	no.	324.6	212.7	89.6	47.8	24.7	10.3	13.9	15.6	739.1
Total	no.	1 962.5	1 352.1	948.9	560.7	364.5	124.9	98.4	125.1	5 537.2
Per cent of emergency departme	ent patients who arriv	ed by ambu	ılance, air an	nbulance or	helicopter					
1 - Resuscitation	%	81.9	83.3	88.5	83.7	85.2	88.8	81.1	75.6	84.0
2 - Emergency	%	47.8	46.9	54.8	40.3	49.3	53.8	38.1	38.6	47.9
3 - Urgent	%	33.8	34.0	39.0	25.1	35.8	35.3	27.7	23.6	33.9
4 - Semi urgent	%	19.1	14.2	17.8	9.4	14.4	14.1	10.4	10.7	15.8
5 - Non urgent	%	5.8	2.5	4.6	2.7	6.3	2.7	2.5	5.2	4.4
Total	%	24.1	21.1	28.3	17.0	26.0	23.6	17.4	15.8	23.2

Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2006-07										
Emergency department patients who	o arrived by ambu	ılance, air a	mbulance, o	r helicopter						
1 - Resuscitation	no.	9.8	6.8	5.4	3.5	4.1	0.9	0.5	0.7	31.8
2 - Emergency	no.	70.2	46.4	41.2	20.9	19.7	5.0	2.4	2.8	208.6
3 - Urgent	no.	193.9	123.4	123.7	38.8	43.2	14.2	8.6	9.3	555.1
4 - Semi urgent	no.	153.2	87.1	71.7	27.0	21.1	8.4	4.6	7.0	380.1
5 - Non urgent	no.	16.9	5.5	3.5	1.4	1.0	0.2	0.2	0.9	29.6
Total	no.	444.2	269.2	245.5	91.6	89.1	28.8	16.4	20.7	1 205.4
Total number of emergency present	ations									
1 - Resuscitation	no.	12.0	8.0	6.1	4.3	4.7	1.0	0.6	0.8	37.6
2 - Emergency	no.	149.2	98.3	74.5	52.2	41.5	9.0	6.6	6.5	437.8
3 - Urgent	no.	585.7	368.2	320.1	151.5	125.1	38.7	31.4	34.2	1 655.0
4 - Semi urgent	no.	827.1	612.2	404.0	267.9	166.8	59.6	46.2	62.5	2 446.3
5 - Non urgent	no.	302.0	216.0	82.7	48.1	17.1	10.7	11.5	18.5	706.6
Total	no.	1 876.6	1 305.1	888.1	524.0	355.3	119.5	96.3	122.6	5 287.5
Per cent of emergency department p	oatients who arriv	ed by ambu	lance, air an	nbulance or	helicopter					
1 - Resuscitation	%	81.5	85.3	88.2	82.9	86.7	90.4	84.8	82.3	84.5
2 - Emergency	%	47.0	47.1	55.4	40.0	47.5	55.7	36.4	43.3	47.6
3 - Urgent	%	33.1	33.5	38.6	25.6	34.6	36.7	27.2	27.3	33.5
4 - Semi urgent	%	18.5	14.2	17.7	10.1	12.7	14.1	10.1	11.2	15.5
5 - Non urgent	%	5.6	2.5	4.2	2.9	5.6	2.2	2.0	4.8	4.2
Total	%	23.7	20.6	27.6	17.5	25.1	24.1	17.0	16.9	22.8
2005-06										
Emergency department patients who	o arrived by ambu	ılance, air a	mbulance, o	r helicopter						
1 - Resuscitation	no.	na	na	na	na	na	na	na	na	29.5
2 - Emergency	no.	na	na	na	na	na	na	na	na	188.6
3 - Urgent	no.	na	na	na	na	na	na	na	na	506.8

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Table 9A.34 Emergency department patients who arrived by ambulance, air ambulance, or helicopter, by triage category (a)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
4 - Semi urgent	no.	na	na	na	na	na	na	na	na	338.2
5 - Non urgent	no.	na	na	na	na	na	na	na	na	25.3
Total	no.	393.2	250.5	224.0	77.8	80.2	27.4	16.5	19.0	1 088.7
Total number of emergency pres	sentations									
1 - Resuscitation	no.	na	na	na	na	na	na	na	na	35.1
2 - Emergency	no.	na	na	na	na	na	na	na	na	391.9
3 - Urgent	no.	na	na	na	na	na	na	na	na	1 535.0
4 - Semi urgent	no.	na	na	na	na	na	na	na	na	2 259.7
5 - Non urgent	no.	na	na	na	na	na	na	na	na	689.9
Total	no.	1 725.5	1 249.1	843.8	426.8	335.5	114.8	99.6	119.7	4 914.9
Per cent of emergency departme	ent patients who arriv	ed by ambu	ılance, air ar	nbulance or	helicopter					
1 - Resuscitation	%	na	na	na	na	na	na	na	na	84.2
2 - Emergency	%	na	na	na	na	na	na	na	na	48.1
3 - Urgent	%	na	na	na	na	na	na	na	na	33.0
4 - Semi urgent	%	na	na	na	na	na	na	na	na	15.0
5 - Non urgent	%	na	na	na	na	na	na	na	na	3.7
Total	%	22.8	20.1	26.5	18.2	23.9	23.9	16.6	15.9	22.2

<sup>(</sup>a) Data represent the 78 per cent of emergency department presentations for which patient level data were available. Data include all presentations.

Source: AIHW 2015, Emergency department care 2014–15: Australian hospital statistics. Health services series no. 65. Cat. no. HSE 168. Canberra.

Table 9A.35 Ambulance service organisations' human resources (a), (b), (c)

	Unit	NSW (d)	Vic (d)	Qld	WA (d)	SA (d)	Tas	ACT (d)	NT	Aust
2014-15										
Salaried personnel										
Ambulance operatives	%	85.0	76.7	87.9	67.0	76.0	79.4	74.5	75.2	81.0
Ambulance operatives	FTE	3 809	3 092	3 540	932	970	292	179	121	12 935
Patient transport officers	FTE	218	61	175	102	53	19	14	8	650
Students and base level ambulance officers	FTE	395	378	21	123	35	17	_	25	994
Qualified ambulance officers	FTE	2 794	2 566	2 902	621	727	229	140	67	10 045
Clinical other	FTE	62	15	_	1	55	1	_	_	134
Communications operatives	FTE	340	71	442	86	101	26	25	21	1 112
Operational support personnel	FTE	411	513	223	180	153	52	34	19	1 586
Corporate support personnel	FTE	261	425	266	279	152	23	27	21	1 455
Total salaried personnel	FTE	4 481	4 030	4 029	1 392	1 276	367	240	161	15 976
Per 100 000 people										
Students and base level ambulance officers	FTE	5.2	6.4	0.4	4.8	2.1	3.3	_	10.2	4.2
Qualified ambulance officers	FTE	36.9	43.6	61.1	24.1	43.0	44.4	36.0	27.4	42.5
Total	FTE	42.1	50.0	61.5	28.8	45.0	47.7	36.0	37.7	46.7
Volunteers										
Ambulance operatives	no.	122	905	176	2 968	1 251	568	_	_	5 990
Operational / corporate support	no.	28	_	1	na	192	na	na	na	221
Total volunteers	no.	150	905	177	2 968	1 443	568	_	_	6 211
Community first responders	no.	256	404	171	200	44	47	na	na	1 122
2013-14										
Salaried personnel										
Ambulance operatives	%	85.7	79.1	88.0	67.1	75.8	79.3	76.8	74.8	81.8
Ambulance operatives	FTE	3 754	3 064	3 415	889	954	302	189	119	12 686
Patient transport officers	FTE	209	60	172	74	46	19	9	8	598
Students and base level ambulance officers	FTE	472	398	105	181	54	34	10	23	1 277
Qualified ambulance officers	FTE	2 714	2 527	2 690	552	715	221	146	66	9 631

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Table 9A.35 Ambulance service organisations' human resources (a), (b), (c)

	Unit	NSW (d)	Vic (d)	Qld	WA (d)	SA (d)	Tas	ACT (d)	NT	Aust
Clinical other	FTE	53	12	_	1	44	2	_	_	112
Communications operatives	FTE	307	66	448	81	95	26	23	22	1 068
Operational support personnel	FTE	382	412	214	165	159	43	36	19	1 429
Corporate support personnel	FTE	245	396	253	271	146	36	22	21	1 389
Total salaried personnel	FTE	4 382	3 872	3 882	1 324	1 259	381	246	159	15 503
Per 100 000 people										
Students and base level ambulance officers	FTE	6.3	6.9	2.2	7.1	3.2	6.6	2.6	9.5	5.5
Qualified ambulance officers	FTE	36.3	43.6	57.3	21.7	42.6	43.0	38.1	27.2	41.3
Total	FTE	42.7	50.5	59.6	28.7	45.8	49.6	40.7	36.7	46.8
Volunteers										
Ambulance operatives	no.	109	674	122	3 050	1 283	511	_	_	5 749
Operational / corporate support	no.	35	_	_	_	188	_	_	_	223
Total volunteers	no.	144	674	122	3 050	1 471	511	_	_	5 972
Community first responders	no.	241	422	201	1 502	45	45	_	_	2 456
2012-13										
Salaried personnel										
Ambulance operatives	%	85.6	80.2	86.3	68.8	75.3	77.5	77.9	76.2	81.8
Ambulance operatives	FTE	3 715	2 940	3 346	877	960	285	190	131	12 444
Patient transport officers	FTE	226	59	179	83	57	19	11	7	642
Students and base level ambulance officers	FTE	518	345	234	220	53	31	28	46	1 475
Qualified ambulance officers	FTE	2 599	2 453	2 504	481	724	207	129	56	9 152
Clinical other	FTE	53	16	1	1	35	2	_	_	107
Communications operatives	FTE	318	67	428	92	92	27	22	22	1 068
Operational support personnel	FTE	383	340	229	182	163	49	32	20	1 399
Corporate support personnel	FTE	244	387	303	216	152	34	22	21	1 378
Total salaried personnel	FTE	4 342	3 667	3 878	1 275	1 274	368	244	172	15 220
Per 100 000 people										
Students and base level ambulance officers	FTE	7.0	6.1	5.1	8.9	3.2	6.0	7.4	19.4	6.4

FIRE AND AMBULANCE SERVICES PAGE 2 of TABLE 9A.35

Table 9A.35 Ambulance service organisations' human resources (a), (b), (c)

	Unit	NSW (d)	Vic (d)	Qld	<i>WA</i> (d)	SA (d)	Tas	ACT (d)	NT	Aust
Qualified ambulance officers	FTE	35.4	43.2	54.3	19.4	43.5	40.3	33.9	23.6	40.0
Total	FTE	42.4	49.3	59.4	28.3	46.7	46.3	41.3	43.1	46.4
Volunteers										
Ambulance operatives	no.	100	603	115	2 881	1 282	557	_	_	5 538
Operational / corporate support	no.	26	_	_	364	192	_	_	_	582
Total volunteers	no.	126	603	115	3 245	1 474	557	_	_	6 120
Community first responders	no.	208	411	242	1 368	46	48	_	_	2 323
2011-12										
Salaried personnel										
Ambulance operatives	%	84.9	82.1	84.3	69.8	75.1	78.1	75.7	81.4	81.8
Ambulance operatives	FTE	3 702	2 831	3 284	786	909	279	170	136	12 095
Patient transport officers	FTE	219	63	182	67	52	19	13	8	622
Students and base level ambulance officers	FTE	510	283	352	193	74	33	26	55	1 527
Qualified ambulance officers	FTE	2 601	2 421	2 326	441	655	197	109	51	8 801
Clinical other	FTE	53	12	_	_	39	3	_	_	107
Communications operatives	FTE	319	52	424	84	89	27	21	22	1 039
Operational support personnel	FTE	389	262	301	156	164	47	30	12	1 362
Corporate support personnel	FTE	269	356	310	184	137	31	24	19	1 331
Total salaried personnel	FTE	4 360	3 449	3 895	1 126	1 210	357	224	167	14 788
Per 100 000 people										
Students and base level ambulance officers	FTE	7.0	5.1	7.8	8.1	4.5	6.4	7.0	23.7	6.8
Qualified ambulance officers	FTE	35.9	43.4	51.5	18.5	39.8	38.5	29.4	21.9	39.1
Total	FTE	42.9	48.5	59.3	26.6	44.3	45.0	36.4	45.6	45.9
Volunteers										
Ambulance operatives	no.	285	505	118	2 704	1 255	488	_	_	5 355
Operational / corporate support	no.	23	_	_	452	182	_	_	_	657
Total volunteers	no.	308	505	118	3 156	1 437	488	_	_	6 012
Community first responders	no.	198	411	236	750	37	38	_	_	1 670

FIRE AND AMBULANCE SERVICES PAGE **3** of TABLE 9A.35

Table 9A.35 Ambulance service organisations' human resources (a), (b), (c)

	Unit	NSW (d)	Vic (d)	Qld	WA (d)	SA (d)	Tas	ACT (d)	NT	Aust
2010-11										
Salaried personnel										
Ambulance operatives	%	86.3	80.4	82.9	70.8	74.1	77.9	80.0	78.1	81.5
Ambulance operatives	FTE	3 693	2 654	3 196	706	930	272	151	121	11 723
Patient transport officers	FTE	226	61	176	73	81	19	11	7	653
Students and base level ambulance officers	FTE	611	265	419	149	66	57	24	44	1 635
Qualified ambulance officers	FTE	2 491	2 201	2 177	410	648	168	99	51	8 244
Clinical other	FTE	58	17	1	2	45	1	_	_	124
Communications operatives	FTE	307	110	423	72	91	27	17	19	1 067
Operational support personnel	FTE	303	284	309	139	171	46	17	15	1 284
Corporate support personnel	FTE	286	363	348	152	155	31	21	19	1 374
Total salaried personnel	FTE	4 281	3 301	3 853	997	1 256	349	189	155	14 381
Per 100 000 people										
Students and base level ambulance officers	FTE	8.5	4.8	9.4	6.4	4.0	11.2	6.6	19.1	7.4
Qualified ambulance officers	FTE	34.7	40.0	49.1	17.7	39.7	32.9	27.2	22.1	37.2
Total	FTE	43.2	44.9	58.5	24.1	43.7	44.1	33.7	41.3	44.6
Volunteers										
Ambulance operatives	no.	303	460	132	2 882	1 127	457	_	_	5 361
Operational / corporate support	no.	23	_	_	287	182	_	_	_	492
Total volunteers	no.	326	460	132	3 169	1 309	457	-	-	5 853
Community first responders	no.	212	483	224	576	43	67	-	-	1 605
2009-10										
Salaried personnel										
Ambulance operatives	%	86.4	81.3	82.9	70.0	77.1	80.3	80.4	79.7	82.2
Ambulance operatives	FTE	3 563	2 588	3 118	599	900	255	134	126	11 284
Patient transport officers	FTE	190	60	179	35	110	6	8	2	591
Students and base level ambulance officers	FTE	601	322	567	115	84	62	15	48	1 814
Qualified ambulance officers	FTE	2 422	2 102	1 979	399	617	162	98	58	7 837

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Table 9A.35 Ambulance service organisations' human resources (a), (b), (c)

	Unit	NSW (d)	Vic (d)	Qld	<i>WA</i> (d)	SA (d)	Tas	ACT (d)	NT	Aust
Clinical other	FTE	54	11	1	2	9	1	-	_	77
Communications operatives	FTE	298	93	392	48	80	24	13	18	965
Operational support personnel	FTE	285	262	301	119	102	39	18	15	1 141
Corporate support personnel	FTE	276	333	340	138	165	24	15	17	1 307
Total salaried personnel	FTE	4 125	3 182	3 759	856	1 167	318	167	158	13 732
Per 100 000 people										
Students and base level ambulance officers	FTE	8.5	5.9	13.0	5.1	5.2	12.2	4.2	21.1	8.3
Qualified ambulance officers	FTE	34.1	38.8	45.3	17.6	38.1	32.1	27.5	25.5	35.8
Total	FTE	42.6	44.7	58.3	22.7	43.3	44.3	31.7	46.5	44.1
Volunteers										
Ambulance operatives	no.	226	489	136	2 577	1 219	508	_	20	5 175
Operational / corporate support	no.	_	_	_	241	166	_	_	6	413
Total volunteers	no.	226	489	136	2 818	1 385	508	-	26	5 588
Community first responders	no.	140	474	192	559	38	62	-	_	1 465
008-09										
Salaried personnel										
Ambulance operatives	%	86.3	82.0	82.8	69.7	76.3	82.4	81.1	73.8	82.1
Ambulance operatives	FTE	3 464	2 506	2 988	590	869	229	128	135	10 909
Patient transport officers	FTE	160	64	175	40	89	6	9	2	545
Students and base level ambulance officers	FTE	625	452	613	132	100	53	25	46	2 045
Qualified ambulance officers	FTE	2 340	1 877	1 819	378	592	151	81	69	7 306
Clinical other	FTE	48	10	1	4	11	_	_	_	74
Communications operatives	FTE	291	104	380	37	76	19	14	18	939
Operational support personnel	FTE	295	199	304	110	104	30	18	30	1 091
Corporate support personnel	FTE	254	352	317	147	166	19	12	18	1 283
Total salaried personnel	FTE	4 013	3 057	3 608	848	1 138	278	158	183	13 283
Per 100 000 people										
Students and base level ambulance officers	FTE	8.9	8.5	14.3	6.0	6.2	10.6	7.1	20.7	9.5

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Table 9A.35 Ambulance service organisations' human resources (a), (b), (c)

	Unit	NSW (d)	Vic (d)	Qld	WA (d)	SA (d)	Tas	ACT (d)	NT	Aust
Qualified ambulance officers	FTE	33.4	35.3	42.5	17.1	37.1	30.0	23.0	31.0	34.0
Total	FTE	42.3	43.8	56.9	23.1	43.3	40.6	30.1	51.7	43.5
Volunteers										
Ambulance operatives	no.	205	494	188	2 310	1 268	574	_	12	5 051
Operational / corporate support	no.	_	_	_	256	234	_	_	1	491
Total volunteers	no.	205	494	188	2 566	1 502	574	-	13	5 542
Community first responders	no.	85	490	231	471	34	34	-	_	1 345
2007-08										
Salaried personnel										
Ambulance operatives	%	86.3	82.5	81.0	71.9	75.0	81.9	83.5	81.5	81.9
Ambulance operatives	FTE	3 262	2 264	2 738	561	799	226	129	132	10 110
Patient transport officers	FTE	142	55	186	43	81	2	13	1	525
Students and base level ambulance officers	FTE	595	321	565	130	86	73	17	50	1 837
Qualified ambulance officers	FTE	2 189	1 769	1 651	349	554	132	92	64	6 799
Clinical other	FTE	47	5	1	_	9	_	_	_	62
Communications operatives	FTE	289	113	336	39	69	19	7	17	888
Operational support personnel	FTE	284	164	332	116	92	32	16	11	1 047
Corporate support personnel	FTE	232	317	312	103	175	18	9	19	1 186
Total salaried personnel	FTE	3 778	2 745	3 382	780	1 065	276	154	162	12 344
Per 100 000 people										
Students and base level ambulance officers	FTE	8.6	6.2	13.6	6.1	5.4	14.7	4.9	23.1	8.7
Qualified ambulance officers	FTE	31.8	34.0	39.7	16.3	35.1	26.6	26.7	29.5	32.3
Total	FTE	40.4	40.2	53.3	22.4	40.5	41.3	31.7	52.6	41.1
Volunteers										
Ambulance operatives	no.	163	437	225	1 889	1 285	507	_	9	4 515
Operational / corporate support	no.	_	_	_	1 071	249	_	_	1	1 321
Total volunteers	no.	163	437	225	2 960	1 534	507	-	10	5 836
Community first responders	no.	39	516	188	_	2	34	_	_	779

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Table 9A.35 Ambulance service organisations' human resources (a), (b), (c)

	Unit	NSW (d)	Vic (d)	Qld	WA (d)	SA (d)	Tas	ACT (d)	NT	Aust
2006-07										
Salaried personnel										
Ambulance operatives	%	86.3	83.0	77.6	71.1	73.8	81.7	79.1	74.9	80.9
Ambulance operatives	FTE	3 194	2 147	2 481	524	725	215	105	100	9 491
Patient transport officers	FTE	148	53	163	43	87	2	10	1	506
Students and base level ambulance officers	FTE	530	354	500	45	80	55	8	20	1 592
Qualified ambulance officers	FTE	2 212	1 641	1 511	400	504	139	78	63	6 548
Clinical other	FTE	33	_	1	_	_	_	_	_	34
Communications operatives	FTE	271	100	306	36	54	19	9	16	811
Operational support personnel	FTE	278	169	227	72	82	32	10	16	887
Corporate support personnel	FTE	229	272	489	141	176	16	18	18	1 358
Total salaried personnel	FTE	3 701	2 589	3 197	737	983	263	133	134	11 736
Per 100 000 people										
Students and base level ambulance officers	FTE	7.8	6.9	12.3	2.2	5.1	11.2	2.4	9.5	7.7
Qualified ambulance officers	FTE	32.6	32.2	37.3	19.3	32.3	28.2	23.1	29.9	31.7
Total	FTE	40.4	39.1	49.6	21.4	37.4	39.4	25.4	39.3	39.5
Volunteers										
Ambulance operatives	no.	121	897	416	1 938	1 377	507	_	9	5 265
Operational / corporate support	no.	_	_	_	901	242	_	_	1	1 144
Total volunteers	no.	121	897	416	2 839	1 619	507	_	10	6 409
Community first responders	no.	na	na	na	na	na	na	na	na	na
2005-06										
Salaried personnel										
Ambulance operatives	%	86.6	83.1	79.2	72.5	76.9	81.1	75.0	72.9	81.7
Ambulance operatives	FTE	3 066	2 040	2 402	504	725	188	107	84	9 116
Patient transport officers	FTE	140	44	153	39	40	2	5	1	425
Students and base level ambulance officers	FTE	547	329	461	108	31	40	12	17	1 545
Qualified ambulance officers	FTE	2 083	1 562	1 505	321	580	129	78	55	6 313

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Table 9A.35 Ambulance service organisations' human resources (a), (b), (c)

	Unit	NSW (d)	Vic (d)	Qld	WA (d)	SA (d)	Tas	ACT (d)	NT	Aust
Clinical other	FTE	23	_	1	_	_	_	_	_	24
Communications operatives	FTE	273	106	282	35	74	17	12	12	810
Operational support personnel	FTE	257	152	178	72	81	28	14	15	797
Corporate support personnel	FTE	218	263	453	118	136	16	22	16	1 243
Total salaried personnel	FTE	3 541	2 455	3 033	695	942	232	143	116	11 157
Per 100 000 people										
Students and base level ambulance officers	FTE	8.1	6.5	11.6	5.3	2.0	8.2	3.6	8.2	7.6
Qualified ambulance officers	FTE	31.0	31.1	38.0	15.8	37.5	26.4	23.4	26.4	31.1
Total	FTE	39.2	37.6	49.6	21.1	39.6	34.6	27.0	34.6	38.7
Volunteers										
Ambulance operatives	no.	84	915	427	1 951	1 221	503	_	13	5 114
Operational / corporate support	no.	_	_	_	900	258	_	_	1	1 159
Total volunteers	no.	84	915	427	2 851	1 479	503	_	14	6 273
Community first responders	no.	na	na	na	na	na	na	na	na	na

**FTE** Full time equivalent.

- (a) Data prior to 2007-08 may not be comparable with later years. Data prior to 2007-08 volunteer data were categorised into volunteers with transport capability and first responders with no transport capability. Community first responders are reported separately from 2007-08.
- (b) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.
- (c) From 2007-08 operational support staff include community service operatives previously reported under corporate support staff.
- (d) Jurisdiction notes:

NSW: A volunteer ambulance service audit was undertaken in 2008-09 which lead to improved reporting of community first responder numbers.

- Vic: Data on volunteers includes some remunerated volunteers. These volunteers were remunerated for some time (usually response), but not for other time (usually on-call time).
- WA: Operational and corporate support volunteers are the total of volunteers who perform a support role and do not undertake ambulance rosters. The reduction in this number in 2008-09 compared with earlier years has resulted from an improvement in the volunteer records system. Prior to 2008-09, the comparatively high number of volunteers in the operational and corporate support category arises from including staff involved in the provision of the public First Aid services division which accounts for 45.7 FTE of corporate personnel.

ACT: 2012-13 human resources include direct staffing within the ACT Ambulance Service. Indirect staffing from the umbrella department and supporting services including Shared Services has been reported based on an attribution model.

Table 9A.35 Ambulance service organisations' human resources (a), (b), (c)

	NSW (d)	Vic (d)	Qld	WA (d)	SA (d)	Tas	ACT (d)	NT	Aust
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**na** Not available. — Nil or rounded to zero.

Source: State and Territory governments (unpublished); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.36 Ambulance service organisations' human resources, operational workforce, by age group and attrition

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2014-15										
Operational workforce, by age group										
Under 30 years of age	no.	589	1 033	922	216	229	62	30	20	3 101
30–39 years of age	no.	1 078	895	892	389	321	92	53	46	3 766
40–49 years of age	no.	1 174	837	1 091	383	320	85	76	42	4 008
50–59 years of age	no.	777	667	578	206	237	70	34	15	2 584
60 or over years of age	no.	138	145	146	44	45	12	5	4	539
Total operational workforce	no.	3 756	3 577	3 629	1 238	1 152	321	198	127	13 998
Operational workforce under 50 years	%	75.6	77.3	80.0	79.8	75.5	74.5	80.3	85.0	75.2
Total operational workforce	FTE	3 868	3 425	3 222	944	990	307	180	113	13 048
Operational workforce, attrition	FTE	154	147	83	32	26	19	5	na	465
Operational workforce, attrition	%	4.0	4.3	2.6	3.3	2.6	6.2	2.8	na	3.6
2013-14										
Operational workforce, by age group										
Under 30 years of age	no.	621	984	790	186	246	65	35	26	2 953
30–39 years of age	no.	1 129	852	875	316	328	84	47	41	3 672
40–49 years of age	no.	1 156	856	1 040	307	336	85	70	46	3 896
50–59 years of age	no.	727	629	576	111	225	79	34	19	2 399
60 or over years of age	no.	120	125	136	24	44	18	4	2	473
Total operational workforce	no.	3 752	3 446	3 417	944	1 179	331	190	134	13 393
Operational workforce under 50 years	%	77.5	78.1	79.2	85.7	77.2	70.7	80.0	84.3	78.6
Total operational workforce	FTE	3 798	3 312	3 082	900	978	314	190	110	12 422
Operational workforce, attrition	FTE	150	139	119	20	17	8	3	_	531
Operational workforce, attrition	%	3.9	4.2	3.9	2.2	1.7	2.5	1.6	_	4.3
2012-13										
Operational workforce, by age group										
Under 30 years of age	no.	646	841	762	193	280	82	40	34	2 878

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Table 9A.36 Ambulance service organisations' human resources, operational workforce, by age group and attrition

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
30–39 years of age	no.	1 134	800	936	323	319	92	41	40	3 685
40-49 years of age	no.	1 205	839	1 065	285	326	80	79	33	3 912
50-59 years of age	no.	712	638	554	101	223	63	27	12	2 330
60 or over years of age	no.	117	127	128	25	37	8	2	2	446
Total operational workforce	no.	3 814	3 245	3 445	927	1 185	325	190	121	13 252
Operational workforce under 50 years	%	78.3	76.4	80.2	86.4	78.1	78.2	84.7	88.4	78.8
Total operational workforce	FTE	3 778	3 127	3 029	880	993	304	190	121	12 422
Operational workforce, attrition	FTE	207	136	114	42	14	7	5	6	557
Operational workforce, attrition	%	5.5	4.3	3.8	4.8	1.4	2.3	2.6	5.0	4.5
2011-12										
Operational workforce, by age group										
Under 30 years of age	no.	549	769	689	178	290	69	29	35	2 608
30-39 years of age	no.	1 138	751	972	299	362	98	46	39	3 705
40-49 years of age	no.	1 275	817	1 093	263	375	88	68	41	4 020
50-59 years of age	no.	757	607	511	96	243	71	25	10	2 320
60 or over years of age	no.	142	120	126	20	46	8	2	2	466
Total operational workforce	no.	3 861	3 064	3 391	856	1 316	334	170	127	13 119
Operational workforce under 50 years	%	76.7	76.3	81.2	86.4	78.0	76.3	83.9	90.6	79.2
Total operational workforce	FTE	3 868	3 030	2 995	824	873	321	170	127	na
Operational workforce, attrition	FTE	246	133	80	54	23	15	7	_	na
Operational workforce, attrition	%	6.4	4.4	2.7	6.5	2.6	4.7	4.1		na
2010-11										
Operational workforce, by age group										
Under 30 years of age	no.	630	728	539	134	221	67	26	32	2 230
30-39 years of age	no.	1 204	709	1 005	301	350	90	43	33	3 699
40-49 years of age	no.	1 182	791	1 019	251	392	76	67	34	3 560
50-59 years of age	no.	652	568	487	100	270	65	22	5	1 933

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Table 9A.36 Ambulance service organisations' human resources, operational workforce, by age group and attrition

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
60 or over years of age	no.	121	96	122	20	60	12	2	3	346
Total operational workforce	no.	3 789	2 892	3 172	806	1 293	310	160	107	12 529
Operational workforce under 50 years	%	79.6	77.0	80.8	85.1	74.5	75.2	85.0	92.5	80.6
Total operational workforce	FTE	3 778	2 861	2 906	748	891	314	153	na	11 650
Operational workforce, attrition	FTE	190	149	85	45	24	7	7	na	451
Operational workforce, attrition	%	5.0	5.2	2.9	6.0	2.6	2.2	4.6	na	3.9
2009-10										
Operational workforce, by age group										
Under 30 years of age	no.	590	670	542	99	222	61	15	31	2 230
30–39 years of age	no.	1 181	756	1 059	267	277	79	35	45	3 699
40–49 years of age	no.	1 174	766	961	220	275	74	60	30	3 560
50–59 years of age	no.	607	544	460	86	154	54	17	11	1 933
60 or over years of age	no.	112	75	99	19	32	5	2	2	346
Total operational workforce	no.	3 664	2 811	3 121	691	960	273	129	119	11 768
Operational workforce under 50 years	%	80.4	78.0	82.1	84.8	80.6	78.4	85.3	89.1	81.0
Total operational workforce	FTE	3 564	2 701	2 841	619	887	270	138	119	11 139
Operational workforce, attrition	FTE	141	114	105	38	11	11	10	22	429
Operational workforce, attrition	%	4.0	4.2	3.7	6.1	1.2	4.1	7.2	18.5	3.9
2008-09										
Operational workforce, by age group										
Under 30 years of age	no.	549	585	489	100	218	49	18	27	2 035
30–39 years of age	no.	1 178	755	1 040	266	284	81	47	63	3 714
40–49 years of age	no.	1 110	786	918	199	272	69	52	44	3 450
50–59 years of age	no.	609	510	421	77	132	47	18	14	1 828
60 or over years of age	no.	96	69	101	19	28	6	1	4	324
Total operational workforce	no.	3 542	2 705	2 969	661	934	252	136	152	11 351
Operational workforce under 50 years	%	80.1	78.6	82.4	85.5	82.9	79.0	86.0	88.2	81.0

Table 9A.36 Ambulance service organisations' human resources, operational workforce, by age group and attrition

	_			-				-		
	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Total operational workforce	FTE	3 460	2 561	2 729	614	857	238	130	122	10 711
Operational workforce, attrition	FTE	153	74	114	44	10	14	13	7	501
Operational workforce, attrition	%	4.4	2.9	4.2	7.2	1.1	5.9	10.0	5.7	4.7
2007-08										
Operational workforce, by age group										
Under 30 years of age	no.	528	421	411	87	192	50	12	44	1 745
30-39 years of age	no.	1 197	716	1 001	255	271	82	52	52	3 626
40-49 years of age	no.	1 075	748	839	194	262	71	55	46	3 290
50-59 years of age	no.	605	474	407	81	98	51	13	16	1 745
60 or over years of age	no.	87	59	84	18	21	10	2	4	285
Total operational workforce	no.	3 492	2 418	2 742	635	844	264	134	162	10 691
Operational workforce under 50 years	%	80.2	78.0	82.1	84.4	85.9	76.9	88.8	87.7	81.0
Total operational workforce	FTE	3 409	2 314	2 549	604	786	237	130	121	10 149
Operational workforce, attrition	FTE	178	107	107	46	25	17	14	6	501
Operational workforce, attrition	%	5.2	4.6	4.2	7.6	3.2	7.2	10.8	5.0	4.9

FTE Full time equivalent.

**na** Not available. — Nil or rounded to zero. .. Not applicable.

Source: State and Territory governments (unpublished).

Table 9A.37 Enrolments in accredited paramedic training courses (a), (b), (c)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT (d)	Aust
Enrolments									
Total student enro	Iments			1	Number				
2014	804	2 229	1 979	761	349	90	160	••	6 372
2013	736	2 043	1 796	671	417	100	108	••	5 871
Students enrolled	in final year			1	Number				
2014	134	413	302	269	99	_	36		1 253
2013	210	144	362	75	149	44	_		984
Enrolments per pers	son in the populati	ion							
Total student enro	Iments		,	per million ped	pple in the pop	ulation			
2014	106.9	381.6	419.1	295.7	207.0	174.8	414.5	••	271.3
2013	99.4	356.1	385.5	266.6	249.6	194.9	281.7		253.8
Students enrolled	in final year		F	per million ped	pple in the pop	ulation			
2014	17.8	70.7	63.9	104.5	58.7	_	93.3		53.3
2013	28.3	25.1	77.7	29.8	89.2	85.8	_		42.5

<sup>(</sup>a) Student enrolments are compiled by the Council of Ambulance Authorities, as administrative data from tertiary institutions participating in the Paramedic Education Programs Accreditation Scheme. The scheme is a voluntary program and as such might not represent all students enrolled in paramedic courses around Australia.

NT: There are no higher education providers based in the NT that offer courses accredited by the Paramedic Education Programs Accreditation Scheme. Student paramedics employed by St John Ambulance NT study at Edith Cowan University, WA.

.. Not applicable. – Nil or rounded to zero.

Source: State and Territory governments (unpublished); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.1).

<sup>(</sup>b) Data are counted as the number of students enrolled as at 31 December for the competed course year.

<sup>(</sup>c) Population data used to derive rates are as at 30 June. Estimated Resident Population (ERP) data are preliminary. See chapter 2 (table 2A.2) for details. See chapter 2 (table 2A.2) for details.

<sup>(</sup>d) Jurisdiction notes:

Table 9A.38 Ambulance response locations, by staff type (a), (b)

	Unit	NSW	Vic (c)	Qld (c)	WA	SA	Tas	ACT (c)	NT	Total
2014-15										
Ambulance response loca	tions									
With paid staff only	no.	225	167	238	30	40	13	8	4	725
With mixed paid and volunteer staff	no.	5	71	_	15	3	16	_	3	113
With volunteer staff only	no.	13	27	28	151	68	21	_	2	310
Total	no.	243	265	266	196	111	50	8	9	1 148
Per 100 000 people										
With paid staff only	no.	3.0	2.8	5.0	1.2	2.4	2.5	2.1	1.6	3.1
With mixed paid and volunteer staff	no.	0.1	1.2	-	0.6	0.2	3.1	_	1.2	0.5
With volunteer staff only	no.	0.2	0.5	0.6	5.8	4.0	4.1	_	0.8	1.3
Total	no.	3.2	4.5	5.6	7.6	6.6	9.7	2.1	3.7	4.9
2013-14										
Ambulance response loca	tions									
With paid staff only	no.	223	168	237	30	40	12	8	4	727
With mixed paid and volunteer staff	no.	7	64	_	14	3	16	_	3	102
With volunteer staff only	no.	15	28	28	146	68	21	_	2	332
Total	no.	245	260	265	190	111	49	8	9	1 137
Per 100 000 people										
With paid staff only	no.	3.0	2.9	5.1	1.2	2.4	2.3	2.1	1.6	3.1
With mixed paid and volunteer staff	no.	0.1	1.1	-	0.5	0.2	3.1	_	1.2	0.4
With volunteer staff only	no.	0.2	0.5	0.6	5.7	4.1	4.1	_	0.8	1.4
Total	no.	3.3	4.5	5.6	7.4	6.6	9.5	2.1	3.7	4.9
2012-13										

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Table 9A.38 Ambulance response locations, by staff type (a), (b)

	Unit	NSW	Vic (c)	Qld (c)	WA	SA	Tas	ACT (c)	NT	Total
Ambulance response loca	tions									
With paid staff only	no.	224	166	242	30	42	12	7	4	715
With mixed paid and volunteer staff	no.	6	62	_	12	3	16	_	3	84
With volunteer staff only	no.	38	29	27	147	68	21	_	2	332
Total	no.	268	257	269	189	113	49	7	9	1 161
Per 100 000 people										
With paid staff only	no.	3.0	2.9	5.2	1.2	2.5	2.3	1.8	1.7	3.1
With mixed paid and volunteer staff	no.	0.1	1.1	_	0.5	0.2	3.1	_	1.3	0.4
With volunteer staff only	no.	0.5	0.5	0.6	5.9	4.1	4.1	_	0.8	1.4
Total	no.	3.6	4.5	5.8	7.6	6.8	9.6	1.8	3.8	5.1
2011-12										
Ambulance response loca	tions									
With paid staff only	no.	223	159	239	30	42	11	7	4	714
With mixed paid and volunteer staff	no.	6	43	_	12	3	17	_	3	84
With volunteer staff only	no.	38	28	27	147	69	21	_	2	334
Total	no.	267	230	266	189	114	49	7	9	1 131
Per 100 000 people										
With paid staff only	no.	3.1	2.9	5.3	1.3	2.6	2.1	1.9	1.7	3.2
With mixed paid and volunteer staff	no.	0.1	0.8	_	0.5	0.2	3.3	-	1.3	0.4
With volunteer staff only	no.	0.5	0.5	0.6	6.2	4.2	4.1	_	0.9	1.5
Total	no.	3.7	4.1	5.9	7.9	6.9	9.6	1.9	3.9	5.0
2010-11										

2010-11

**Ambulance response locations** 

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Table 9A.38 Ambulance response locations, by staff type (a), (b)

	Unit	NSW	Vic (c)	Q <i>ld</i> (c)	WA	SA	Tas	ACT (c)	NT	Total
Mith poid staff only		222			30	41	10	7	4	74.4
With paid staff only	no.	222	162	238	30	41	10	/	4	714
With mixed paid and volunteer staff	no.	6	42	_	12	3	18	_	3	84
With volunteer staff only	no.	38	28	27	150	68	21	_	2	334
Total	no.	266	232	265	192	112	49	7	9	1 132
Per 100 000 people										
With paid staff only	no.	3.1	2.9	5.4	1.3	2.5	2.0	1.9	1.7	3.2
With mixed paid and volunteer staff	no.	0.1	0.8	_	0.5	0.2	3.5	_	1.3	0.4
With volunteer staff only	no.	0.5	0.5	0.6	6.5	4.2	4.1	_	0.9	1.5
Total	no.	3.7	4.2	6.0	8.3	6.9	9.6	1.9	3.9	5.1
009-10										
Ambulance response loca	tions									
With paid staff only	no.	222	162	237	27	44	11	7	4	696
With mixed paid and volunteer staff	no.	6	43	_	12	3	17	-	3	86
With volunteer staff only	no.	39	27	27	150	68	21	_	2	324
Total	no.	267	232	264	189	115	49	7	9	1 132
Per 100 000 people										
With paid staff only	no.	3.1	3.0	5.4	1.2	2.7	2.2	2.0	1.8	3.2
With mixed paid and volunteer staff	no.	0.1	0.8	-	0.5	0.2	3.4	_	1.3	0.4
With volunteer staff only	no.	0.5	0.5	0.6	6.6	4.2	4.1	_	0.9	1.5
Total	no.	3.8	4.3	6.0	8.3	7.1	9.7	2.0	4.0	5.2
008-09										
Ambulance response loca	tions									
With paid staff only	no.	221	151	231	27	44	11	7	4	682

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Table 9A.38 Ambulance response locations, by staff type (a), (b)

	Unit	NSW	Vic (c)	QId (c)	WA	SA	Tas	ACT (c)	NT	Total
With mixed paid and volunteer staff	no.	6	49	-	12	2	14	_	3	86
With volunteer staff only	no.	36	24	28	145	66	23	_	2	316
Total	no.	263	224	259	184	112	48	7	9	1 106
Per 100 000 people										
With paid staff only	no.	3.2	2.8	5.4	1.2	2.8	2.2	2.0	1.8	3.2
With mixed paid and volunteer staff	no.	0.1	0.9	-	0.5	0.1	2.8	_	1.3	0.4
With volunteer staff only	no.	0.5	0.5	0.7	6.6	4.1	4.6	_	0.9	1.5
Total	no.	3.8	4.2	6.1	8.3	7.0	9.6	2.0	4.0	5.2
2007-08										
Ambulance response loca	tions									
With paid staff only	no.	217	148	231	25	42	10	7	2	675
With mixed paid and volunteer staff	no.	9	44	_	13	1	14	_	5	81
With volunteer staff only	no.	24	26	28	146	68	23	_	1	333
Total	no.	250	218	259	184	111	47	7	8	1 084
Per 100 000 people										
With paid staff only	no.	3.2	2.8	5.6	1.2	2.7	2.0	2.0	0.9	3.2
With mixed paid and volunteer staff	no.	0.1	0.8	_	0.6	0.1	2.8	_	2.3	0.4
With volunteer staff only	no.	0.3	0.5	0.7	6.8	4.3	4.6	_	0.5	1.6
Total	no.	3.6	4.2	6.2	8.6	7.0	9.5	2.0	3.7	5.2
2006-07										
Ambulance response loca	tions									
With paid staff only	no.	221	143	228	25	39	10	7	2	670
With mixed paid and volunteer staff	no.	5	44	-	12	1	14	-	5	79

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Table 9A.38 Ambulance response locations, by staff type (a), (b)

	Unit	NSW	Vic (c)	Qld (c)	WA	SA	Tas	ACT (c)	NT	Total
With volunteer staff only	no.	18	27	49	147	68	23	_	1	329
Total	no.	244	214	277	184	108	47	7	8	1 089
Per 100 000 people										
With paid staff only	no.	3.3	2.8	5.6	1.2	2.5	2.0	2.1	0.9	3.2
With mixed paid and volunteer staff	no.	0.1	0.9	_	0.6	0.1	2.8	_	2.4	0.4
With volunteer staff only	no.	0.3	0.5	1.2	7.1	4.4	4.7	_	0.5	1.6
Total	no.	3.6	4.2	6.8	8.9	6.9	9.6	2.1	3.8	5.3
2005-06										
Ambulance response loca	tions									
With paid staff only	no.	218	143	227	25	38	10	7	2	668
With mixed paid and volunteer staff	no.	5	43	_	12	1	13	_	5	69
With volunteer staff only	no.	15	27	48	147	68	23	_	1	338
Total	no.	238	213	275	184	107	46	7	8	1 078
Per 100 000 people										
With paid staff only	no.	3.2	2.8	5.7	1.2	2.5	2.0	2.1	1.0	3.3
With mixed paid and volunteer staff	no.	0.1	0.9	_	0.6	0.1	2.7	_	2.4	0.3
With volunteer staff only	no.	0.2	0.5	1.2	7.2	4.4	4.7	_	0.5	1.7
Total	no.	3.5	4.2	6.9	9.1	6.9	9.4	2.1	3.9	5.3

<sup>(</sup>a) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

Vic: As of 2012-13, volunteer response locations that do not have a physical building present have also been included.

Qld: There are no mixed response locations in Queensland.

<sup>(</sup>b) Response locations data for 2007-08 reflect changes in the new data definition, which do not include first responder locations.

<sup>(</sup>c) Jurisdiction notes:

Table 9A.38 Ambulance response locations, by staff type (a), (b)

Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
		(c)	(c)				(c)		

ACT: There are no mixed or volunteer only response locations in the ACT.

- Nil or rounded to zero.

Source: State and Territory governments (unpublished); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).

Table 9A.39 Ambulance assets (number) (a), (b)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
	(c)	(c)		(c)			(c)		
2014-15									
Ambulance stations and location	s								
Response locations	243	265	266	196	111	50	8	_	1 139
Communication centres	5	na	7	1	1	1	1	na	16
Other locations	61	32	51	183	21	6	4	_	358
Total	309	297	324	380	133	57	13	_	1 513
First responder locations									
Ambulance	8	57	24	970	10	5	na	na	855
Third party	26	73	_	na	13	4	na	na	113
Ambulances and other vehicles									
Ambulance general purpose	931	557	880	486	217	108	27	32	3 238
Patient transport vehicles	116	65	106	43	28	13	4	3	378
Operational support vehicles	394	310	220	43	145	28	11	3	1 154
Special operations vehicles	91	20	18	3	39	3	_	1	175
Administrative vehicles	59	135	39	73	19	3	1	6	335
Other vehicles	64	42	46	24	17	5	4	5	207
Total	1 655	1 129	1 309	672	465	160	47	50	5 487
2013-14									
Ambulance stations and location	S								
Response locations	245	260	265	190	111	49	8	9	1 137
Communication centres	5	_	7	1	1	1	1	1	17
Other locations	61	32	51	176	21	6	4	2	353
Total	311	292	323	367	133	56	13	12	1 507
First responder locations									
Ambulance	7	58	26	751	8	5	_	_	855
Third party	22	73	_	_	14	4	_	_	113
Ambulances and other vehicles									

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Table 9A.39 Ambulance assets (number) (a), (b)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
	(c)	(c)		(c)			(c)		
Ambulance general purpose	924	547	860	480	236	110	27	32	3 137
Patient transport vehicles	117	58	105	35	21	13	4	3	350
Operational support vehicles	298	313	203	35	93	28	11	12	1 005
Special operations vehicles	93	18	17	3	44	3	_	1	179
Administrative vehicles	69	144	34	73	22	4	1	6	356
Other vehicles	67	40	46	23	14	6	4	5	192
Total	1 568	1 120	1 265	649	430	164	47	59	5 219
2012-13									
Ambulance stations and locations	s								
Response locations	268	257	269	189	113	49	7	9	1 161
Communication centres	5	_	7	1	1	1	1	1	17
Other locations	60	28	51	175	21	6	4	2	347
Total	333	285	327	365	135	56	12	12	1 525
First responder locations									
Ambulance	16	58	29	456	8	5	_	_	572
Third party	6	74	_	_	12	4	_	_	96
Ambulances and other vehicles									
Ambulance general purpose	930	534	815	466	225	108	27	32	3 137
Patient transport vehicles	116	57	106	31	20	13	4	3	350
Operational support vehicles	306	316	210	32	87	31	11	12	1 005
Special operations vehicles	94	18	18	1	44	3	_	1	179
Administrative vehicles	70	146	40	66	22	5	1	6	356
Other vehicles	66	32	48	17	14	6	4	5	192
Total	1 582	1 103	1 237	613	412	166	47	59	5 219
2011-12									
Ambulance stations and locations	s								
Response locations	267	230	266	189	114	49	7	9	1 131

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Table 9A.39 Ambulance assets (number) (a), (b)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
	(c)	(c)		(c)			(c)		
Communication centres	5	7	7	1	1	1	1	1	24
Other locations	60	34	25	177	23	6	4	1	330
Total	332	271	298	367	138	56	12	11	1 485
First responder locations									
Ambulance	16	31	30	254	8	4	_	_	343
Third party	6	68	_	_	7	5	_	_	86
Ambulances and other vehicles									
Ambulance general purpose	914	527	816	448	226	108	25	31	3 095
Patient transport vehicles	122	57	105	29	15	14	4	3	349
Operational support vehicles	309	310	210	24	104	30	12	12	1 011
Special operations vehicles	94	16	18	11	15	3	_	1	158
Administrative vehicles	68	150	47	53	27	3	1	6	355
Other vehicles	67	32	48	22	12	6	4	5	196
Total	1 574	1 092	1 244	587	399	164	46	58	5 164
2010-11									
Ambulance stations and locations	s								
Response locations	266	232	265	192	112	49	7	9	1 132
Communication centres	5	9	7	1	1	1	1	1	26
Other locations	47	32	25	113	19	6	3	1	246
Total	318	273	297	306	132	56	11	11	1 404
First responder locations									
Ambulance	16	30	30	114	8	4	_	_	166
Third party	6	68	_	_	7	5	_	_	84
Ambulances and other vehicles									
Ambulance general purpose	909	523	804	442	214	108	20	31	3 051
Patient transport vehicles	116	53	110	26	18	13	3	3	342
Operational support vehicles	318	302	221	23	102	25	5	12	1 008

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Table 9A.39 Ambulance assets (number) (a), (b)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
	(c)	(c)		(c)			(c)		
Special operations vehicles	91	15	16	11	15	3	_	1	152
Administrative vehicles	69	155	53	46	28	3	4	6	364
Other vehicles	66	33	57	20	12	6	4	5	203
Total	1 569	1 081	1 261	568	389	158	36	58	5 120
2009-10									
Ambulance stations and location	s								
Response locations	267	232	264	189	115	49	7	9	1 132
Communication centres	5	10	7	1	1	1	1	1	27
Other locations	47	33	25	113	16	6	3	1	244
Total	319	275	296	303	132	56	11	11	1 403
First responder locations									
Ambulance	13	30	27	87	5	4	_	_	166
Third party	5	68	_	_	8	3	_	_	84
Ambulances and other vehicles									
Ambulance general purpose	887	528	788	448	207	108	20	31	3 017
Patient transport vehicles	95	50	110	16	19	4	3	2	299
Operational support vehicles	371	298	216	12	95	23	4	9	1 028
Special operations vehicles	57	15	13	8	15	_	_	_	108
Administrative vehicles	48	146	54	44	36	2	2	9	341
Other vehicles	74	30	56	19	13	5	4	5	206
Total	1 532	1 067	1 237	547	385	142	33	56	4 999
2008-09									
Ambulance stations and location	s								
Response locations	263	224	259	184	112	48	7	9	1 106
Communication centres	4	6	7	1	1	1	1	1	22
Other locations	46	31	25	113	16	2	3	1	237
Total	313	261	291	298	129	51	11	11	1 365

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Table 9A.39 Ambulance assets (number) (a), (b)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
	(c)	(c)		(c)			(c)		
First responder locations									
Ambulance	8	28	28	88	5	4	_	_	na
Third party	13	68	_	_	6	3	_	_	74
Ambulances and other vehicles									
Ambulance general purpose	888	519	770	441	207	99	21	31	2 897
Patient transport vehicles	93	47	114	16	19	3	3	2	294
Operational support vehicles	357	260	204	13	91	22	9	9	905
Special operations vehicles	20	19	1	8	11	2	1	_	40
Administrative vehicles	46	140	46	45	36	2	2	9	326
Other vehicles	72	28	53	19	10	5	4	5	194
Total	1 476	1 013	1 188	542	374	133	40	56	4 656
2007-08									
Ambulance stations and locations	S								
Response locations	250	218	259	184	111	47	7	8	1 089
Communication centres	4	6	7	2	1	1	1	1	23
Other locations	52	32	25	113	16	2	3	_	265
Total	306	256	291	299	128	50	11	9	1 377
First responder locations									
Ambulance	5	29	28	na	5	3	_	_	na
Third party	_	68	_	_	6	_	_	_	na
Ambulances and other vehicles									
Ambulance general purpose	895	513	730	415	202	98	16	28	2 858
Patient transport vehicles	95	46	112	16	19	2	2	2	287
Operational support vehicles	340	237	200	10	78	22	9	9	815
Special operations vehicles	21	11	1	_	4	2	1	_	46
Administrative vehicles	48	142	46	43	35	2	2	8	312
Other vehicles	72	31	50	21	9	5	2	4	182

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Table 9A.39 Ambulance assets (number) (a), (b)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
	(c)	(c)		(c)			(c)		
Total	1 471	980	1 139	505	347	131	32	51	4 500
2006-07									
Ambulance stations and location	s								
Response locations	244	214	277	184	108	47	7	8	1 078
Communication centres	4	6	7	2	1	1	1	1	22
Other locations	44	52	34	113	17	2	3	_	265
Total	292	272	318	299	126	50	11	9	1 365
First responder locations									
Ambulance	na	na	na	na	na	na	na	na	na
Third party	na	na	na	na	na	na	na	na	na
Ambulances and other vehicles									
Ambulance general purpose	876	497	729	410	201	98	16	31	2 792
Patient transport vehicles	94	40	112	16	19	2	2	2	270
Operational support vehicles	300	226	169	8	69	22	11	10	779
Special operations vehicles	22	17	_	_	4	2	1	_	44
Administrative vehicles	51	127	46	44	37	2	_	5	311
Other vehicles	67	28	47	20	9	5	2	4	167
Total	1 410	935	1 103	498	339	131	32	52	4 363
2005-06									
Ambulance stations and locations	s								
Response locations	238	213	275	184	107	46	7	8	1 075
Communication centres	4	5	7	2	1	1	1	1	27
Other locations	44	51	36	113	17	2	2	_	262
Total	286	269	318	299	125	49	10	9	1 364
First responder locations									
Ambulance	na	na	na	na	na	na	na	na	na
Third party	na	na	na	na	na	na	na	na	na

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Table 9A.39 Ambulance assets (number) (a), (b)

	NSW (c)	Vic (c)	Qld	WA (c)	SA	Tas	ACT (c)	NT	Total
Ambulances and other vehicles	(0)	(0)		(0)			(0)		
Ambulance general purpose	869	488	691	405	199	94	16	30	2 684
Patient transport vehicles	84	41	104	16	19	2	2	2	283
Operational support vehicles	297	208	154	11	66	22	11	10	715
Special operations vehicles	19	18	_	_	_	6	1	_	8
Administrative vehicles	46	114	65	44	35	2	_	5	331
Other vehicles	58	27	46	18	8	5	1	4	165
Total	1 373	896	1 060	494	327	131	31	51	4 186

- (a) Differences in geography, topography and operational structures require different resourcing models across jurisdictions.
- (b) Response locations data for 2007-08 and subsequent years reflect changes in the new data definition, which include first responder locations reported separately.
- (c) Jurisdiction notes:

NSW: A volunteer ambulance service audit was undertaken in 2008-09 which has led to improved reporting of data for ambulance stations and locations.

Vic: General purpose ambulances exclude contractors' non-emergency vehicles and special operations vehicles include four fixed wing and three rotary wing aircraft under contract. In 2006-07 for the then Victorian Metropolitan Ambulance Service (MAS), two ambulances were excluded as they were loaned for student training purposes only and not used for responding.

WA: St John WA uses a number of country ambulance sub centres as training facility as well as the dedicated training facility in the metro area.

ACT: For 2006-07 the ESA provided shared HQ/Comcen, Fleet Workshop and Store/Logistics Centre to all four operational agencies (ambulance, urban fire, rural fire, and SES).

**na** Not available. – Nil or rounded to zero.

Source: State and Territory governments (unpublished).

Table 9A.40 Air ambulance medical resources and expenditure (2014-15 dollars) (a), (b), (c), (d)

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	Unit	NSW	Vic	Qld	<i>WA</i> (e)	<i>SA</i> (e)	Tas (e)	ACT	<i>NT</i> (e)	Aust
2014-15										
Total aircraft, o	perated by:									
State Ambuland	ce Service									
Fixed wing	no.	6	4	_	_	_	1	_	_	11
Helicopter	no.	10	5	_	_	_	_	_	_	15
Other service p	roviders									
Fixed wing	no.	2	_	16	16	5	_	_	_	39
Helicopter	no.	4	_	12	4	2	2	1	_	25
Total	no.	22	9	28	20	7	3	1	_	90
Expenditure	\$'000	117 405	57 745	-	1 335	_	4 995	417	_	181 897
2013-14										
Total aircraft, o	perated by:									
State Ambuland	ce Service									
Fixed wing	no.	6	4	-	_	_	1	_	_	11
Helicopter	no.	10	5	-	_	_	_	_	_	15
Other service p	roviders									
Fixed wing	no.	2	_	14	15	5	_	_	_	36
Helicopter	no.	4	_	13	4	3	1	1	_	26
Total	no.	22	9	27	19	8	2	1	_	88
Expenditure	\$'000	108 387	57 477	-	1 673	13 195	5 134	551	610	187 028
2012-13										
Total aircraft, o	perated by:									
State Ambuland	ce Service									
Fixed wing	no.	5	4	_	_	_	1	_	_	10
Helicopter	no.	5	5	_	_	_	_	_	_	10
Other service p	roviders									
		1		14	13	7				35

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Table 9A.40 Air ambulance medical resources and expenditure (2014-15 dollars) (a), (b), (c), (d)

	Unit	NSW	Vic	Qld	WA (e)	SA (e)	Tas (e)	ACT	<i>NT</i> (e)	Aust
Helicopter	no.	5	_	12	3	3	1	1	_	25
Total	no.	16	9	26	16	10	2	1	_	80
Expenditure	\$'000	100 420	57 785	-	1 251	13 274	4 370	623	619	178 340
2011-12										
Total aircraft, o	perated by:									
State Ambulan	ce Service									
Fixed wing	no.	4	4	_	_	_	1	_	_	9
Helicopter	no.	5	5	_	_	_	_	_	_	10
Other service p	providers									
Fixed wing	no.	1	_	14	13	7	_	_	_	35
Helicopter	no.	5	_	12	3	3	1	1	_	25
Total	no.	15	9	26	16	10	2	1	_	79
Expenditure	\$'000	94 984	67 280	-	1 281	9 404	4 036	619	627	178 231
2010-11										
Total aircraft, o	perated by:									
State Ambulan	nce Service									
Fixed wing	no.	4	4	_	_	_	1	_	_	9
Helicopter	no.	5	5	_	_	_	_	_	_	10
Other service p	providers									
Fixed wing	no.	1	_	14	13	7	_	_	_	35
Helicopter	no.	5	_	11	3	3	1	1	_	24
Total	no.	15	9	25	16	10	2	1	-	78
Expenditure	\$'000	88 098	51 745	-	1 392	_	4 050	637	_	145 921
2009-10										
Total aircraft, o	perated by:									
State Ambulan	nce Service									
Fixed wing	no.	4	4	_	_	_	1	_	_	9
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Table 9A.40 Air ambulance medical resources and expenditure (2014-15 dollars) (a), (b), (c), (d)

	Unit	NSW	Vic	Qld	<i>WA</i> (e)	SA (e)	Tas (e)	ACT	NT (e)	Aust
Helicopter	no.	9	5	_	1	_	_	_	_	15
Other service p	roviders									
Fixed wing	no.	_	_	13	13	7	_	_	_	33
Helicopter	no.	9	_	15	2	3	1	1	_	31
Total	no.	22	9	28	16	10	2	1	_	88
Expenditure	\$'000	89 689	40 674	-	1 475	-	3 984	635	_	136 458
2008-09										
Total aircraft, o	perated by:									
State Ambulan	ce Service									
Fixed wing	no.	4	4	_	_	_	1	_	_	9
Helicopter	no.	5	5	_	_	_	_	_	_	10
Other service p	roviders									
Fixed wing	no.	1	_	14	12	7	_	_	_	34
Helicopter	no.	5	_	14	1	3	1	1	_	25
Total	no.	15	9	28	13	10	2	1	-	78
Expenditure	\$'000	84 420	39 568	-	1 369	-	4 083	666	-	130 106
2007-08										
Total aircraft, o	perated by:									
State Ambulan	ce Service									
Fixed wing	no.	4	4	_	_	_	1	_	_	9
Helicopter	no.	4	4	_	_	_	_	_	_	8
Other service p	oroviders									
Fixed wing	no.	1	_	13	11	7	_	_	6	38
Helicopter	no.	5	1	16	1	3	1	1	_	28
Total	no.	14	9	29	12	10	2	1	6	83
Expenditure	\$'000	74 715	32 648	-	558	-	4 487	718	-	113 126
2006-07										

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Table 9A.40 Air ambulance medical resources and expenditure (2014-15 dollars) (a), (b), (c), (d)

				=	=					
	Unit	NSW	Vic	Qld	WA (e)	SA (e)	Tas (e)	ACT	NT (e)	Aust
Total aircraft										
Operated by St	tate Ambuland	e Service								
Fixed wing	no.	4	4	_	_	_	1	_	_	9
Helicopter	no.	4	4	_	_	_	_	_	_	8
Operated by ot	her service pr	oviders								
Fixed wing	no.	1	_	9	11	4	_	_	6	31
Helicopter	no.	5	2	13	1	3	1	1	_	26
Total	no.	14	10	22	12	7	2	1	6	74
Expenditure	\$'000	52 638	34 696	2 301	544	_	4 572	675	_	95 428
2005-06										
Total aircraft										
Operated by St	tate Ambuland	e Service								
Fixed wing	no.	4	4	_	_	_	1	_	_	9
Helicopter	no.	_	3	_	_	_	_	_	_	3
Operated by ot	her service pr	oviders								
Fixed wing	no.	1	_	7	11	4	_	_	6	29
Helicopter	no.	9	3	12	1	3	1	1	_	30
Total	no.	14	10	19	12	7	2	1	6	71
Expenditure	\$'000	53 388	32 159	2 339	530	_	4 026	762	_	93 204

<sup>(</sup>a) These figures do not represent the total air ambulance medical expenditure for jurisdictions, but only that funded through ambulance services and reported as part of the total ambulance service expenditure.

(e) Jurisdiction notes:

WA and SA:

<sup>(</sup>b) Time series financial data are adjusted to 2013-14 dollars using the General Government Final Consumption Expenditure (GGFCE) chain price deflator (2013-14 = 100) (table 2A.48). See chapter 2 (sections 2.5-6) for details.

<sup>(</sup>c) Due to differences in definitions and counting rules, data reported may differ from data in agency annual reports and other sources.

<sup>(</sup>d) Totals may not add due to rounding.

Table 9A.40 Air ambulance medical resources and expenditure (2014-15 dollars) (a), (b), (c), (d)

	Unit	NSW	Vic	Qld	WA (e)	SA (e)	Tas (e)	ACT	NT (e)	Aust
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Fixed wing services are provided by the Royal Flying Doctor Service (RFDS).

Tas: Aircraft and pilot are provided by the RFDS under contract, aero medical crew are provided by the State.

NT: Fixed wing services are provided by the RFDS in central section, with Careflight providing rotary and fixed wing services in the 'top end' of the NT.

- Nil or rounded to zero.

Source: Council of Ambulance Authorities (unpublished).

Table 9A.41 Cardiac arrest survived event rate (a), (b), (c), (d), (e), (f), (g)

	Unit	NSW (h)	Vic (h)	Qld (h)	WA	SA (h)	Tas (h)	ACT	NT (h)	Aust	Total (h)
Paramedic with	essed adu	ılt cardiac arre	ests								
2014-15	no.	116	433	238	96	81	na	27	9	na	1 000
2013-14	no.	174	438	230	86	35	na	30	8	na	1 001
2012-13	no.	na	435	267	58	83	na	26	8	na	877
2011-12	no.	na	397	340	67	73	11	19	6	na	913
2010-11	no.	na	407	355	59	98	13	10	na	na	942
2009-10	no.	na	364	291	39	74	30	8	na	na	806
2008-09	no.	262	357	278	58	104	17	12	na	na	1 088
2007-08	no.	246	323	299	49	65	16	8	17	1 023	1 023
2006-07	no.	191	246	292	36	84	na	3	9	na	861
2005-06	no.	na	261	266	54	na	na	8	na	na	589
Survival incide	nts										
2014-15	no.	62	196	107	29	32	na	17	5	na	448
2013-14	no.	79	202	106	29	11	na	11	3	na	441
2012-13	no.	na	214	137	27	26	na	9	1	na	414
2011-12	no.	na	196	150	29	28	3	12	1	na	419
2010-11	no.	na	190	143	21	51	4	3	na	na	412
2009-10	no.	na	174	104	12	30	14	3	na	na	337
2008-09	no.	70	154	94	19	45	9	4	na	na	395
2007-08	no.	83	131	99	14	31	5	4	11	378	378
2006-07	no.	71	98	93	8	44	na	1	3	na	318
2005-06	no.	na	92	82	12	na	na	1	na	na	187
Survival rate											
2014-15	%	53.4	45.3	45.0	30.2	39.5	na	63.0	55.6	na	44.8
2013-14	%	45.4	46.1	46.1	33.7	31.4	na	36.7	37.5	na	44.1
2012-13	%	na	49.2	51.3	46.6	31.3	na	34.6	12.5	na	47.2
2011-12	%	na	49.4	44.1	43.3	38.4	27.3	63.2	16.7	na	45.9
2010-11	%	na	46.7	40.3	35.6	52.0	30.8	30.0	na	na	43.7

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Table 9A.41 Cardiac arrest survived event rate (a), (b), (c), (d), (e), (f), (g)

				. ,,		,, . ,, .	· ·				
	Unit	NSW (h)	Vic (h)	Qld (h)	WA	SA (h)	Tas (h)	ACT	NT (h)	Aust	Total (h)
2009-10	%	na	47.8	35.7	30.8	40.5	46.7	37.5	na	na	41.8
2008-09	%	26.7	43.1	33.8	32.8	43.3	52.9	33.3	na	na	36.3
2007-08	%	33.7	40.6	33.1	28.6	47.7	31.3	50.0	64.7	37.0	37.0
2006-07	%	37.2	39.8	31.8	22.2	52.4	na	33.3	33.3	na	36.9
2005-06	%	na	35.2	30.8	22.2	na	na	12.5	na	na	31.7
Adult cardiac ar	rests whe	ere resuscitati	on attempted	d (excluding pa	aramedic wi	tnessed)					
2014-15	no.	2 077	2 225	1 113	783	525	330	65	69	7 187	7 187
2013-14	no.	2 292	2 243	1 054	780	287	302	81	84	7 123	7 123
2012-13	no.	na	2 020	1 097	756	586	323	69	138	na	4 989
2011-12	no.	na	1 970	1 634	545	649	167	55	123	na	5 143
2010-11	no.	na	1 889	1 646	434	648	88	52	145	na	4 902
2009-10	no.	na	1 742	1 552	329	565	170	53	86	na	4 497
2008-09	no.	1 821	1 772	1 533	355	631	131	69	72	6 384	6 384
2007-08	no.	2 438	1 702	1 577	389	620	83	64	111	6 984	6 984
2006-07	no.	1 875	1 655	1 505	380	633	na	59	53	na	6 160
2005-06	no.	na	1 592	1 369	364	na	na	67	na	na	3 392
Survival inciden	nts										
2014-15	no.	645	664	278	192	123	96	24	18	2 040	2 040
2013-14	no.	681	663	275	181	54	102	24	24	2 004	2 004
2012-13	no.	na	608	269	204	143	99	15	39	na	1 377
2011-12	no.	na	634	392	125	142	56	12	24	na	1 385
2010-11	no.	na	618	347	62	164	28	13	na	na	1 232
2009-10	no.	na	601	349	38	132	47	18	15	na	1 200
2008-09	no.	337	586	364	48	149	42	23	12	1 561	1 561
2007-08	no.	476	473	293	35	157	29	17	24	1 504	1 504
2006-07	no.	387	463	242	45	151	na	14	7	na	1 309
2005-06	no.	na	426	248	31	na	na	23	na	na	728
Survival rate											

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Table 9A.41 Cardiac arrest survived event rate (a), (b), (c), (d), (e), (f), (g)

	Unit	NSW (h)	Vic (h)	Qld (h)	WA	SA (h)	Tas (h)	ACT	NT (h)	Aust	Total (h)
2014-15	%	31.1	29.8	25.0	24.5	23.4	29.1	36.9	26.1	28.4	28.4
2013-14	%	29.7	29.6	26.1	23.2	18.8	33.8	29.6	28.6	28.1	28.1
2012-13	%	na	30.1	24.5	27.0	24.4	30.7	21.7	28.3	na	27.6
2011-12	%	na	32.2	24.0	22.9	21.9	33.5	21.8	19.5	na	26.9
2010-11	%	na	32.7	21.1	14.3	25.3	31.8	25.0	na	na	25.1
2009-10	%	na	34.5	22.5	11.6	23.4	27.6	34.0	17.4	na	26.7
2008-09	%	18.5	33.1	23.7	13.5	23.6	32.1	33.3	16.7	24.5	24.5
2007-08	%	19.5	27.8	18.6	9.0	25.3	34.9	26.6	21.6	21.5	21.5
2006-07	%	20.6	28.0	16.1	11.8	23.9	na	23.7	13.2	na	21.3
2005-06	%	na	26.8	18.1	8.5	na	na	34.3	na	na	21.5
Adult VF/VT card	diac arres	sts (excluding	paramedic w	vitnessed)							
2014-15	no.	727	630	369	161	151	144	27	17	2 226	2 226
2013-14	no.	697	604	350	178	81	140	32	24	2 106	2 106
2012-13	no.	na	589	379	156	167	143	17	46	na	1 497
2011-12	no.	na	650	445	132	167	40	19	39	na	1 492
2010-11	no.	na	592	423	148	185	27	10	na	na	1 385
2009-10	no.	na	530	436	107	143	45	18	na	na	1 279
2008-09	no.	453	566	430	114	172	48	25	na	na	1 808
2007-08	no.	487	508	436	133	161	29	26	31	1 811	1 811
2006-07	no.	403	510	458	121	194	na	19	10	na	1 715
2005-06	no.	na	577	470	118	na	na	23	na	na	1 188
Survival inciden	nts										
2014-15	no.	277	314	163	78	64	54	13	12	975	975
2013-14	no.	263	321	158	68	26	64	18	16	934	934
2012-13	no.	na	290	156	65	78	63	10	29	na	691
2011-12	no.	na	342	167	45	75	23	6	13	na	671
2010-11	no.	na	300	151	47	76	13	6	na	na	593
2009-10	no.	na	281	158	25	64	21	8	na	na	557

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Table 9A.41 Cardiac arrest survived event rate (a), (b), (c), (d), (e), (f), (g)

	Unit	NSW (h)	Vic (h)	Qld (h)	WA	SA (h)	Tas (h)	ACT	NT (h)	Aust	Total (h)
2008-09	no.	149	290	179	30	81	25	11	na	na	765
2007-08	no.	183	232	144	22	69	11	10	10	681	681
2006-07	no.	164	214	138	33	90	na	7	1	na	647
2005-06	no.	na	228	143	20	na	na	8	na	na	399
Survival rate											
2014-15	%	38.1	49.8	44.2	48.4	42.4	37.5	48.1	70.6	43.8	43.8
2013-14	%	37.7	53.1	45.1	38.2	32.1	45.7	56.3	66.7	44.3	44.3
2012-13	%	na	49.2	41.2	41.7	46.7	44.1	58.8	63.0	na	46.2
2011-12	%	na	52.6	37.5	34.1	44.9	57.5	31.6	33.3	na	45.0
2010-11	%	na	50.7	35.7	31.8	41.1	48.1	60.0	na	na	42.8
2009-10	%	na	53.0	36.2	23.4	44.8	46.7	44.4	na	na	43.5
2008-09	%	32.9	51.2	41.6	26.3	47.1	52.1	44.0	na	na	42.3
2007-08	%	37.6	45.7	33.0	16.5	42.9	37.9	38.5	32.3	37.6	37.6
2006-07	%	40.7	42.0	30.1	27.3	46.4	na	36.8	10.0	na	37.7
2005-06	%	na	39.5	30.4	16.9	na	na	34.8	na	na	33.6

- (a) Cardiac arrest survived event rate is defined by the percentage of patients, aged 16 years and over, who were in out of hospital cardiac arrest and had a return to spontaneous circulation (that is, the patient having a pulse) until administration and transfer of care to the medical staff at the receiving hospital (Jacobs, et al. 2004).
  - i) Paramedic witnessed cardiac arrest where a person was in out-of-hospital cardiac arrest that occurred in the presence of ambulance paramedic or officer.
  - ii) Adult cardiac arrest where resuscitation attempted where: (1) a person was in out-of-hospital cardiac arrest (which was not witnessed by a paramedic); and (2) chest compressions and/or defibrillation was undertaken by ambulance or emergency medical services personnel.
  - iii) Adult VF/VT cardiac arrests where: (1) a person was in out-of-hospital cardiac arrest (which was not witnessed by a paramedic); and (2) the arrest rhythm on the first ECG assessment was either Ventricular Fibrillation or Ventricular Tachycardia (VF/VT) (irregular and/or fast heartbeat).
- (b) For each of the measures, a higher or increasing rate is a desirable outcome.
- (c) Successful outcome is defined as the patient having return of spontaneous circulation (ROSC) on arrival to hospital (i.e. the patient having a pulse). This is not the same as the patient surviving the cardiac arrest as having ROSC is only one factor that contributes to the overall likelihood of survival.

## Table 9A.41 Cardiac arrest survived event rate (a), (b), (c), (d), (e), (f), (g)

Unit NSW (h) Vic (h) Qld (h) WA SA (h) Tas (h) ACT NT (h) Aust Total (h)

- (d) The indicators used to measure outcomes for cardiac arrests are not directly comparable as each are subject to variations based on differing factors used to define the indicator which are known to influence outcome. A recent review of the data across jurisdictions has highlighted a level of uncertainty that all jurisdictions are utilising a consistent definition in the denominator presented within the Cardiac Arrest data. These discrepancies are currently the subject of further review by the Council of Ambulance Authorities.
- (e) The measure 'Adult cardiac arrests where resuscitation attempted' provides an overall indicator of outcome without specific consideration to other factors known to influence survival.
- (f) Patients in Ventricular Fibrillation (VF) or Ventricular Tachycardia (VT) are more likely to have better outcomes compared with other causes of cardiac arrest as these conditions are primarily correctable through defibrillation.
- (g) Paramedic witnessed cardiac arrests are analysed separately in the indicators reported as these cardiac arrests are treated immediately by the paramedic and as such have a better likelihood of survival due to this immediate and rapid intervention. This is vastly different to cardiac arrests occurring prior to the ambulance arriving where such increasing periods of treatment delay are known to negatively influence outcome.
- (h) Jurisdiction notes:

NSW: Cardiac arrest survived event data for NSW are compiled with the following caveats:

- 1. The extraction only uses data that is available in the electronic Medical Record (eMR).
- 2. The quality of eMR documentation and resulting difficulties in confident interpretation and subsequent comparisons are:
  - i) Within all areas of healthcare, clinical databases (such as eMR or the Patient Health Care Records) are known to have limitations around the accuracy and completeness of data recorded within them.
  - ii) The NSW Ambulance source of information in relation to out-of-hospital cardiac arrest are the datasets populated by paramedics. Therefore, ROSC rates determined from these sources can only reflect a 'best estimate' of actual rates.

Data consistency issues mean that this measure was unable to be reported from 2009-10 to 2012-13.

- Vic: Excludes patients with unknown rhythm on arrival at hospital.
- Qld: Data are for the calendar year (2014-15 data pertains to the 2014 calendar year).

Patients with 'Do not attempt resuscitation orders' are excluded from the cardiac arrest data collection from 1 July 2013 as this information was not coded prior to this date.

- SA: In 2013, due to a redesign in the Patient Report Form, mapping issues between HP-admin and the South Australian Ambulance Service data base occurred, leading to incomplete data for cardiac arrest cases and therefore lower numbers being reported on than in previous years. The mapping issue has been resolved but is undergoing testing prior to re-running data reports.
- Tas: For 2012-13 and 2013-14, data inconsistency issues resulting from the introduction of improved counting procedures in 2013 mean that Paramedic Witnessed event data are unable to be reported.

For 2010-11, data only includes data for the first half year.

For 2007-08, VF/VT arrests is for two out of three regions only as no rhythm was recorded in the remaining region.

Table 9A.41 Cardiac arrest survived event rate (a), (b), (c), (d), (e), (f), (g)

Unit NSW (h) Vic (h) Qld (h) WA SA (h) Tas (h) ACT NT (h) Aust Total (h)

NT: For 2008-09, VF/VT arrests are not available due to a change in systems.

Total: Total for the jurisdictions where data are available

na Not available.

Source: State and Territory governments (unpublished).

Table 9A.42 Patients who received care from the ambulance service and report a clinically meaningful pain reduction (a), (b)

This page has been changed since an earlier version of the Report. See errata at

http://www.pc.gov.au/research/ongoing/report-on-government-services/2016/emergency-management#errata

	Unit	NSW	Vic	Qld (d)	WA (c)	SA	Tas	ACT	NT (c)	Aust	Total (c)
Proportion of	f patients	who report a	clinically me	eaningful pair	n reduction						
2014-15	%	86.4	90.3	88.7	82.3	64.6	88.3	93.4	86.7	86.5	
2013-14	%	86.8	90.8	89.0	83.3	75.5	87.2	93.1	na		87.8
2012-13	%	72.9	91.3	89.2	80.4	73.3	84.3	na	na		83.7
Total patients	s who rep	ort clinically	meaningful p	oain reduction	n						
2014-15	no.	35 832	38 085	58 418	10 026	8 464	5 215	2 782	4 404	163 226	
2013-14	no.	37 489	48 753	55 056	11 037	9 413	4 817	2 886	na		169 451
2012-13	no.	40 063	45 626	53 117	7 539	6 301	4 356	na	na		157 002
Total number	r of pain n	nanagement	patients								
2014-15	no.	41 460	42 187	65 831	12 189	13 110	5 909	2 979	5 078	188 743	
2013-14	no.	43 202	53 701	61 850	13 243	12 460	5 525	3 101	na		193 082
2012-13	no.	54 973	49 979	59 567	9 377	8 597	5 170	na	na		187 663

<sup>(</sup>a) Patients counted who:

- are aged 16 years and over and received care from the ambulance service, which included the administration of pain medication (analgesia)
- recorded at least 2 pain scores (pre- and post-treatment) on a Numeric Rating Scale
- recorded an initial pain score of 7 or above on the Numeric Rating Scale of 1-10.

Excluded are patients who refuse pain medication for whatever reason.

- (b) Clinically meaningful pain reduction is defined as a minimum 2 point reduction in pain score from first to final recorded measurement.
- (c) Jurisdiction notes:

Qld: For cardiac patients analgesia includes Glyceryl trinitrate, Fentanyl and Morphine. For trauma and non-specified aetiology patients analgesia includes Morphine, Ketamine, Fentanyl and Methoxyflurane.

WA: Where the date of birth of the patient is not recorded/missing, the case is excluded.

NT: 2013-14 data are not available due to the protected industrial action.

Total: Total excludes the ACT and the NT in 2012-13. Total excludes the NT in 2013-14.

**na** Not available. .. Not applicable.

Source: State and Territory governments (unpublished).

Table 9A.43 Satisfaction with ambulance service organisations (a), (b), (c)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2015										
Number of patients surveyed	no.	1 300	1 760	1 300	1 300	1 500	1 300	1 300	1 300	11 060
Usable responses	no.	425	598	447	372	467	513	397	182	3 401
Overall satisfaction										
Very satisfied or satisfied	%	99	97	98	97	98	98	98	97	98
95% confidence interval	±	1.1	1.4	1.3	1.7	1.3	1.3	1.3	2.6	0.5
Neither satisfied / dissatisfied	%	_	2	_	1	1	1	_	1	1
Dissatisfied / very dissatisfied	%	1	1	2	2	1	1	2	2	1
Phone answer time										
Very satisfied or satisfied	%	97	97	99	98	98	99	99	97	98
Neither satisfied / dissatisfied	%	2	2	1	1	1	_	1	2	1
Dissatisfied / very dissatisfied	%	1	1	_	1	1	1	_	1	1
Ambulance arrival time										
Very satisfied or satisfied	%	97	93	95	97	96	91	96	95	95
Neither satisfied / dissatisfied	%	2	3	2	2	2	6	2	3	3
Dissatisfied / very dissatisfied	%	1	4	3	1	2	3	2	2	2
Satisfaction with treatment										
Very satisfied or satisfied	%	99	98	98	97	98	99	98	97	98
Neither satisfied / dissatisfied	%	_	1	1	2	1	_	1	1	1
Dissatisfied / very dissatisfied	%	1	1	1	1	1	1	1	2	1
Satisfaction with paramedic at	titude									
Very satisfied or satisfied	%	98	98	98	97	99	98	98	97	98
Neither satisfied / dissatisfied	%	1	1	1	1	_	1	1	1	1
Dissatisfied / very dissatisfied	%	1	1	1	2	1	1	1	2	1
2014										
Number of patients surveyed	no.	1 300	1 386	1 300	1 300	1 500	1 300	1 300	1 300	10 686
Usable responses	no.	384	432	451	337	551	571	404	145	3 275
Overall satisfaction										

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Table 9A.43 Satisfaction with ambulance service organisations (a), (b), (c)

				-	. ,, , ,, ,	•				
	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Very satisfied or satisfied	%	96	97	99	99	98	98	98	97	98
95% confidence interval	±	1.8	1.6	0.9	1.0	1.2	1.0	1.4	3.0	0.5
Neither satisfied / dissatisfied	%	2	1	1	_	1	1	1	2	1
Dissatisfied / very dissatisfied	%	2	2	_	1	1	1	1	1	1
Phone answer time										
Very satisfied or satisfied	%	97	97	99	99	99	98	98	98	98
Neither satisfied / dissatisfied	%	2	3	1	1	1	1	1	2	2
Dissatisfied / very dissatisfied	%	1	_	_	_	_	1	1	_	_
Ambulance arrival time										
Very satisfied or satisfied	%	92	94	96	98	96	96	95	93	94
Neither satisfied / dissatisfied	%	4	3	2	1	3	1	3	4	3
Dissatisfied / very dissatisfied	%	4	3	2	1	1	3	2	3	3
Satisfaction with treatment										
Very satisfied or satisfied	%	97	98	99	98	99	99	98	99	98
Neither satisfied / dissatisfied	%	2	1	1	1	_	1	1	_	1
Dissatisfied / very dissatisfied	%	1	1	_	1	1	_	1	1	1
Satisfaction with paramedic at	titude									
Very satisfied or satisfied	%	97	98	99	99	99	99	98	98	98
Neither satisfied / dissatisfied	%	1	1	_	1	1	_	1	1	1
Dissatisfied / very dissatisfied	%	2	1	1	_	_	1	1	1	1
2013										
Number of patients surveyed	no.	1 300	1 300	1 300	1 300	1 300	1 300	1 300	1 300	10 400
Usable responses	no.	385	430	396	364	546	591	383	189	3 284
Overall satisfaction										
Very satisfied or satisfied	%	99	98	96	99	99	98	98	95	98
95% confidence interval	±	1.0	1.3	2.0	1.2	1.0	1.0	1.2	2.9	0.5
Neither satisfied / dissatisfied	%	1	1	2	1	1	1	1	3	1
Dissatisfied / very dissatisfied	%	_	1	2	_	_	1	1	2	1

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Table 9A.43 Satisfaction with ambulance service organisations (a), (b), (c)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Phone answer time										
Very satisfied or satisfied	%	98	98	97	97	98	98	98	96	98
Neither satisfied / dissatisfied	%	1	1	2	2	2	2	1	2	1
Dissatisfied / very dissatisfied	%	1	1	1	1	_	1	1	2	1
Ambulance arrival time										
Very satisfied or satisfied	%	95	93	95	96	98	98	95	89	95
Neither satisfied / dissatisfied	%	2	3	3	3	1	1	3	5	2
Dissatisfied / very dissatisfied	%	3	4	2	1	1	1	2	6	3
Satisfaction with treatment										
Very satisfied or satisfied	%	99	99	98	99	99	99	98	96	99
Neither satisfied / dissatisfied	%	1	_	1	1	_	1	1	3	-
Dissatisfied / very dissatisfied	%	_	1	1	_	1	1	1	1	1
Satisfaction with paramedic at	titude									
Very satisfied or satisfied	%	99	99	98	99	99	97	99	95	99
Neither satisfied / dissatisfied	%	1	1	1	1	1	2	_	3	1
Dissatisfied / very dissatisfied	%	_	_	1	_	_	1	1	2	-
2012										
Number of patients surveyed	no.	1 300	2 600	1 300	1 300	1 475	1 300	1 300	1 300	11 875
Usable responses	no.	458	996	453	406	579	555	478	198	4 123
Overall satisfaction										
Very satisfied or satisfied	%	98	97	97	98	97	98	97	98	98
95% confidence interval	±	1.2	1.0	1.6	1.4	1.4	1.1	1.6	2.0	0.5
Neither satisfied / dissatisfied	%	1	1	2	1	2	1	1	2	1
Dissatisfied / very dissatisfied	%	1	2	1	1	1	1	2	_	1
Phone answer time										
Very satisfied or satisfied	%	99	98	97	98	98	99	99	97	98
Neither satisfied / dissatisfied	%	_	1	2	2	_	1	1	2	,
Dissatisfied / very dissatisfied	%	1	1	1	_	2	_	_	1	1

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Table 9A.43 Satisfaction with ambulance service organisations (a), (b), (c)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Ambulance arrival time										
Very satisfied or satisfied	%	96	92	96	96	96	97	94	90	95
Neither satisfied / dissatisfied	%	3	4	1	3	2	2	3	6	3
Dissatisfied / very dissatisfied	%	1	4	3	1	2	1	3	4	2
Satisfaction with treatment										
Very satisfied or satisfied	%	99	98	98	98	98	98	97	97	98
Neither satisfied / dissatisfied	%	1	1	1	_	1	1	1	2	1
Dissatisfied / very dissatisfied	%	_	1	1	2	1	1	2	1	1
Satisfaction with paramedic att	titude									
Very satisfied or satisfied	%	99	97	98	97	98	99	96	98	98
Neither satisfied / dissatisfied	%	1	2	1	2	_	1	2	_	1
Dissatisfied / very dissatisfied	%	_	1	1	1	2	_	2	2	1
2011										
Number of patients surveyed	no.	1 300	2 600	1 300	1 300	1 476	1 585	1 300	1 300	12 161
Usable responses	no.	470	1 019	404	403	624	638	423	202	4 183
Overall satisfaction										
Very satisfied or satisfied	%	98	98	98	98	98	98	96	98	98
95% confidence interval	±	1.1	0.9	1.4	1.4	1.0	1.0	1.9	1.9	0.4
Neither satisfied / dissatisfied	%	1	1	1	1	1	1	2	1	1
Dissatisfied / very dissatisfied	%	1	1	1	1	1	1	2	1	1
Phone answer time										
Very satisfied or satisfied	%	97	97	98	97	97	99	99	97	97
Neither satisfied / dissatisfied	%	2	2	1	2	2	1	1	3	2
Dissatisfied / very dissatisfied	%	1	1	1	1	1	_	_	_	1
Ambulance arrival time										
Very satisfied or satisfied	%	94	92	96	94	95	96	95	89	94
Neither satisfied / dissatisfied	%	3	4	1	3	3	3	3	5	3
Dissatisfied / very dissatisfied	%	3	4	3	3	2	1	2	6	3

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Table 9A.43 Satisfaction with ambulance service organisations (a), (b), (c)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Satisfaction with treatment										
Very satisfied or satisfied	%	99	98	99	98	98	99	96	100	98
Neither satisfied / dissatisfied	%	_	1	_	1	1	1	2	_	1
Dissatisfied / very dissatisfied	%	1	1	1	1	1	_	2	_	1
Satisfaction with paramedic at	titude									
Very satisfied or satisfied	%	99	98	99	98	98	99	96	99	99
Neither satisfied / dissatisfied	%	1	1	_	2	1	_	2	1	_
Dissatisfied / very dissatisfied	%	_	1	1	_	1	1	2	_	1
2010										
Number of patients surveyed	no.	1 300	2 600	1 300	1 300	1 300	1 730	1 300	1 300	12 130
Usable responses	no.	486	1 071	466	400	565	795	526	194	4 503
Overall satisfaction										
Very satisfied or satisfied	%	98	98	98	98	99	97	97	97	98
95% confidence interval	±	1.1	0.9	1.3	1.3	0.9	1.1	1.6	2.4	0.4
Neither satisfied / dissatisfied	%	1	1	1	1	_	1	1	1	1
Dissatisfied / very dissatisfied	%	1	1	1	1	1	2	2	2	1
2009										
Overall satisfaction										
Very satisfied or satisfied	%	98	97	98	96	98	98	96	97	97
95% confidence interval	±	1.4	0.9	1.2	1.8	1.0	1.1	1.3	2.4	0.5
Neither satisfied / dissatisfied	%	1	2	1	2	1	1	1	3	2
Dissatisfied / very dissatisfied	%	1	1	1	2	1	1	3	_	1
2008										
Overall satisfaction										
Very satisfied or satisfied	%	96	98	99	96	98	98	96	96	98
95% confidence interval	±	na								
Neither satisfied / dissatisfied	%	2	1	_	2	1	_	1	2	1
Dissatisfied / very dissatisfied	%	2	1	1	2	1	2	3	2	1

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Table 9A.43 Satisfaction with ambulance service organisations (a), (b), (c)

	Unit	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2007										
Overall satisfaction										
Very satisfied or satisfied	%	97	98	97	97	98	99	95	93	97
95% confidence interval	±	na	na	na	na	na	na	na	na	na
Neither satisfied / dissatisfied	%	1	2	1	1	1	1	3	4	2
Dissatisfied / very dissatisfied	%	2	1	2	2	1	_	2	3	1
2006										
Overall satisfaction										
Very satisfied or satisfied	%	98	97	98	95	99	97	98	96	97
95% confidence interval	±	na	na	na	na	na	na	na	na	na
Neither satisfied / dissatisfied	%	1	2	1	3	_	2	1	1	1
Dissatisfied / very dissatisfied	%	1	1	1	2	1	1	1	3	2

<sup>(</sup>a) These results are from a survey distributed to code 1 and code 2 patients (Emergency and Urgent), per jurisdiction, per year.

**na** Not available. – Nil or rounded to zero.

Source: Council of Ambulance Authorities 2015, Council of Ambulance Authorities Patient Satisfaction Survey 2015, Adelaide.

<sup>(</sup>b) Overall satisfaction rates from 2009 include the 95 per cent confidence interval (for example, X per cent ± X per cent). Confidence intervals for prior years are not available.

<sup>(</sup>c) The percentages reported include 95 per cent confidence intervals (for example, 40.0 per cent ± 2.7 per cent) (in the form of error bars in figures and percentages in tables). Confidence intervals have been calculated for this Report on the assumption that a random sample of the population was selected.

Table 9A.44 Ambulance code 1 response times (minutes) (a)

	NSW	Vic (c)	Qld	WA (c)	SA	Tas (c)	ACT	NT
Statewide 50th percentile		.,		. ,		· · ·		
2014-15	11.2	11.0	8.3	8.8	9.1	11.6	8.0	7.5
2013-14	10.8	11.1	8.2	8.8	8.8	11.4	8.2	7.6
2012-13	11.1	11.2	8.2	9.1	9.4	11.0	8.7	9.5
2011-12	10.9	11.0	8.3	9.6	9.8	11.2	9.3	9.6
2010-11	10.6	10.7	8.2	10.7	9.4	11.4	9.8	10.3
2009-10	10.3	10.0	8.1	9.6	9.4	11.0	10.0	10.1
2008-09	10.3	10.0	8.4	9.5	9.4	10.9	10.3	9.5
2007-08	9.9	10.0	8.3	9.3	9.4	10.3	9.2	10.1
2006-07	9.6	9.0	8.2	9.0	9.4	10.5	8.2	9.0
2005-06	9.5	9.0	8.0	9.7	9.4	10.2	7.5	8.5
Statewide 90th percentile								
2014-15	22.9	22.1	16.4	16.8	16.8	24.0	12.5	17.5
2013-14	22.2	22.4	16.3	16.1	16.6	23.7	12.9	17.1
2012-13	23.0	22.9	16.5	16.5	17.4	22.8	13.7	21.6
2011-12	22.5	22.1	17.0	17.8	17.4	23.1	14.8	22.5
2010-11	21.7	21.0	16.7	18.8	16.4	23.2	15.6	23.9
2009-10	21.0	19.9	16.4	17.8	16.1	22.8	15.8	24.1
2008-09	20.8	19.0	17.2	17.6	16.0	22.8	16.8	19.6
2007-08	19.9	19.0	16.7	16.6	15.7	22.4	16.3	23.5
2006-07	19.7	18.0	16.5	15.2	15.6	21.5	14.2	22.0
2005-06	19.6	17.0	16.0	15.9	15.6	21.1	13.3	21.0
Capital city 50th percentile (b)								
2014-15	11.2	10.5	8.3	8.4	8.8	10.8	8.0	8.5
2013-14	10.6	10.8	8.2	8.4	8.6	10.4	8.2	8.3
2012-13	10.9	10.9	8.2	8.7	9.2	10.1	8.7	8.4
2011-12	10.7	10.6	8.5	9.3	9.7	10.3	9.3	8.6
2010-11	10.3	10.1	8.2	9.8	9.2	10.6	9.8	8.4

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Table 9A.44 Ambulance code 1 response times (minutes) (a)

	NSW	Vic (c)	Qld	WA (c)	SA	Tas (c)	ACT	NT
2009-10	10.0	9.5	8.1	9.4	9.3	10.2	10.0	8.1
2008-09	10.1	9.2	8.5	9.2	9.2	10.0	10.3	7.6
2007-08	9.7	9.4	8.4	9.2	9.3	9.6	9.2	12.5
2006-07	9.3	9.0	8.3	8.9	9.3	9.4	8.2	8.3
2005-06	9.1	9.0	9.0	9.1	9.3	9.2	7.5	8.3
Capital city 90th percentile (b)								
2014-15	21.2	18.3	15.1	14.3	14.7	17.5	12.5	18.2
2013-14	19.8	19.2	14.7	13.9	14.5	16.8	12.9	17.4
2012-13	20.6	19.5	14.9	14.2	15.4	16.1	13.7	14.6
2011-12	19.7	18.7	15.7	15.4	15.5	16.2	14.8	15.0
2010-11	19.1	17.2	15.1	15.9	14.5	17.6	15.6	16.9
2009-10	18.3	15.7	14.5	15.0	14.3	16.6	15.8	17.2
2008-09	18.7	15.1	15.8	15.7	14.2	16.6	16.8	14.1
2007-08	17.8	15.5	15.3	15.6	14.1	16.0	16.3	22.0
2006-07	17.0	15.0	15.0	14.9	14.2	15.6	14.2	20.5
2005-06	16.6	14.0	15.0	15.4	14.2	15.3	13.3	21.0
Capital city (b)								
Population ('000)	5 587.5	4 486.4	2 935.0	1 979.1	1 238.9	338.3	384.3	140.4
Area (sq km) (mil)	12 368	9 991	15 826	6 418	3 258	1 695	2 358	3 164
Population per sq km	451.8	449.1	185.5	308.4	380.3	199.5	163.0	44.4

<sup>(</sup>a) Response times commence from the following time points: NSW, Queensland and WA from transfer to dispatch; Victoria, SA, Tasmania and the ACT from first key stroke; and, the NT from when a crew is dispatched.

Vic: The basis of response time reporting changed in 2007-08 and results are not directly comparable with previous years. Metropolitan response and case times data are sourced from Computer Aided Dispatch system, prior to 2008-09 these data were sourced from patient care records completed by paramedics. Rural response times are sourced from Patient Care Records completed by paramedics.

<sup>(</sup>b) Urban centre response times are currently measured by the response times within each jurisdictions' capital city — boundaries based on the ABS Greater Capital City Statistical Areas (GCCSAs). GCCSAs represent a broad socioeconomic definition of each of the eight state and territory capital cities. They contain not only the urban area of the city, but also the surrounding and non-urban areas where much of the population has strong links to the capital city. Capital cities are Sydney, Melbourne, Brisbane, Perth, Adelaide, Hobart, Canberra and Darwin.

<sup>(</sup>c) Jurisdiction notes:

Table 9A.44 Ambulance code 1 response times (minutes) (a)

NSW	Vic (c)	Qld	WA (c)	SA	Tas (c)	ACT	NT
	· ,		· ,		( )		

WA: Ambulance first responder locations data are not available for 2007-08.

Tas: The highest proportion of population is in small rural areas, relative to other jurisdictions, which increase median response times.

Source: State and Territory governments (unpublished); ABS 2014, Regional Population Growth, Australia, 2014, Cat. no. 3218.0, Canberra (table 2A.12).

Table 9A.45 Triple zero (000) call answering time (a), (b)

		NSW	Vic	Qld (c)	WA	SA (c)	Tas (c)	ACT	NT	Aust
Proportion of	calls from t	he emergenc	y call service	e answered by	y ambulance	service com	munication ce	entre staff in a	a time equal	to or
less than 10 se	econds									
2014-15	%	86.1	93.8	91.2	94.4	92.3	96.8	95.8	93.4	89.5
2013-14	%	88.5	92.8	90.7	94.1	91.3	96.2	96.0	9.0	89.4
2012-13	%	90.9	91.4	90.6	94.4	91.3	94.2	88.7	10.4	89.9
Calls from the	emergency	call service	answered by	ambulance s	service comr	nunication co	entre staff in a	time equal to	or less tha	n 10
seconds										
2014-15	'000	677.4	637.8	624.5	183.4	170.6	61.1	34.0	4.4	2 393.1
2013-14	'000	691.1	618.0	583.4	167.8	165.4	58.4	31.8	4.1	2 314.9
2012-13	'000	782.1	600.0	559.9	162.5	162.1	54.1	27.9	4.7	2 353.3
Number of cal	ls received	by the triple	zero (000) en	nergency call	service that	require an a	mbulance serv	vice .		
2014-15	'000	786.6	679.9	684.4	194.3	184.7	63.1	35.5	46.9	2 675.4
2013-14	'000	780.5	665.7	643.4	178.3	181.1	60.7	33.1	45.7	2 588.5
2012-13	'000	860.4	656.3	617.7	172.0	177.6	57.5	31.5	45.0	2 618.0

- (a) Ambulance service triple zero (000) call answering time is defined as the time interval commencing when the emergency call service has answered the triple zero (000) call and selected the desired Emergency Service Organisation to when the ambulance service communication centre has answered the call.
- (b) Data sourced from Telstra may include additional time as the Emergency Call Person (Telstra) ensures the call has been answered which may involve some three way conversation. Some services subtract a fixed time from the Telstra reported times to allow for the time after the call is answered until the Telstra agent disconnects from the call.
- (c) Jurisdiction notes:
- SA: SA Ambulance Service sources data from internal systems and might not be comparable with other services where data is provided by Telstra.

## Qld and Tas:

The Queensland Ambulance Service and Ambulance Tasmania currently use Telstra data for reporting. Due to the limitations with Telstra data, the timer starts as soon as the Telstra agent selects the relevant agency, thus the appropriate number has to be dialled and the call setup through the Telstra network before the Triple Zero (000) call presents to the respective ambulance communications centre. As a result, for reporting, time is deducted from the Telstra Triple Zero (000) report to account for the set up time taken prior to the presentation of the call to the respective ambulance communications systems.

Table 9A.45 Triple zero (000) call answering time (a), (b)

NSW Vic Qld (c) WA SA (c) Tas (c) ACT NT Aust

Qld: With the completion of the state-wide Automated Call Distribution system the data source for this measure will change from Telstra reporting to Queensland Ambulance Service reporting to overcome the limitations of the current Telstra reporting and will result in a more accurate reporting methodology.

Source: State and Territory governments (unpublished).

Table 9A.46 Ambulance service costs (\$'000) (2014-15 dollars) (a)

	NSW	Vic	Qld	WA (f)	SA (f)	Tas (f)	ACT (f)	NT (f)	Aust
2014-15				(.)	511 (1)	1 3.5 (1)		(')	
Labour costs - Salaries and payments in the nature of salaries (b)	599 202	464 951	425 065	136 558	166 788	45 305	29 005	18 981	1 885 855
Capital costs (c)									
Depreciation	18 049	25 903	32 819	14 332	9 195	2 700	1 291	1 368	105 658
User cost of capital - Other assets	15 847	19 494	25 502	8 970	4 635	1 960	908	225	77 542
Other costs (d)	240 524	215 216	133 397	63 192	65 754	15 608	13 350	6 026	753 068
Total expenditure (e)	873 622	725 565	616 783	223 053	246 372	65 573	44 554	26 600	2 822 123
Other expenses									
Payroll tax (b)	_	_	_	_	_	_	_	_	_
User cost of capital - Land	9 859	6 194	8 400	2 556	1 395	573	585	24	29 586
Interest on borrowings	_	_	_	_	_	_	_	_	_
2013-14									
Labour costs - Salaries and payments in the nature of salaries (b)	539 965	412 726	397 982	130 089	168 705	45 022	28 300	18 163	1 740 952
Capital costs (c)									
Depreciation	17 823	30 037	36 289	14 215	9 081	2 891	1 178	1 712	113 226
User cost of capital - Other assets	12 791	18 741	26 812	8 505	4 607	2 028	806	269	74 558
Other costs (d)	263 159	213 381	131 654	64 672	63 215	16 777	14 186	6 042	773 086
Total expenditure (e)	833 738	674 885	592 736	217 481	245 608	66 717	44 471	26 186	2 701 822
Other expenses									
Payroll tax (b)	_	_	16 493	_	_	_	_	_	16 493
User cost of capital - Land	9 301	6 138	8 944	2 002	1 355	528	588	25	28 880
Interest on borrowings	_	_	_	_	139	_	_	_	139

Table 9A.46 Ambulance service costs (\$'000) (2014-15 dollars) (a)

	NSW	Vic	Qld	WA (f)	SA (f)	Tas (f)	ACT (f)	NT (f)	Aust
2012-13									
Labour costs - Salaries and payments in the nature of salaries (b)	522 475	391 923	394 160	118 392	140 021	43 127	27 662	19 111	1 656 870
Capital costs (c)									
Depreciation	18 560	26 746	47 464	13 677	8 031	2 923	1 084	1 623	120 108
User cost of capital - Other assets	13 117	17 858	26 995	8 028	4 396	1 973	811	341	73 519
Other costs (d)	227 753	209 512	117 110	66 532	63 787	14 759	16 891	5 658	722 002
Total expenditure (e)	781 904	646 040	585 729	206 629	216 234	62 782	46 447	26 733	2 572 498
Other expenses									
Payroll tax (b)	_	_	16 533	_	_	513	_	_	17 046
User cost of capital - Land	9 459	4 746	9 097	1 875	1 332	587	596	25	27 716
Interest on borrowings	_	_	_	_	122	_	_	_	122
2011-12									
Labour costs - Salaries and payments in the nature of salaries (b)	527 243	393 216	397 577	101 590	194 825	39 479	24 932	17 814	1 696 677
Capital costs (c)									
Depreciation	20 436	30 094	41 009	10 406	8 822	3 181	898	1 526	116 372
User cost of capital - Other assets	13 602	16 144	28 236	6 716	4 535	2 249	587	334	72 404
Other costs (d)	214 499	198 219	125 894	60 714	57 413	15 266	12 572	4 719	689 297
Total expenditure (e)	775 781	637 673	592 717	179 426	265 596	60 176	38 988	24 393	2 574 750
Other expenses									
Payroll tax (b)	np	_	16 804	_	_	2 295	_	_	np
User cost of capital - Land	7 645	4 367	9 062	977	986	608	474	22	24 141
Interest on borrowings	_	_	_	_	130	_	_	_	130

Table 9A.46 Ambulance service costs (\$'000) (2014-15 dollars) (a)

	NSW	Vic	Qld	WA (f)	SA (f)	Tas (f)	ACT (f)	NT (f)	Aust
2010-11									
Labour costs - Salaries and payments in the nature of salaries (b)	504 157	378 728	386 858	81 940	134 632	36 808	22 571	16 410	1 562 103
Capital costs (c)									
Depreciation	20 984	29 133	39 984	10 373	10 210	2 933	928	1 194	115 739
User cost of capital - Other assets	11 855	16 147	27 950	6 007	4 269	2 159	754	358	69 499
Other costs (d)	200 120	185 655	121 746	50 149	50 831	15 925	10 783	4 321	639 530
Total expenditure (e)	737 117	609 662	576 537	148 468	199 942	57 826	35 037	22 282	2 386 871
Other expenses									
Payroll tax (b)	_	_	15 914	_	_	2 022	_	_	17 936
User cost of capital - Land	5 919	4 343	8 816	816	1 113	614	437	22	22 082
Interest on borrowings	_	_	1	_	123	_	_	_	124
2009-10									
Labour costs - Salaries and payments in the nature of salaries (b)	489 056	372 714	364 811	70 987	135 172	31 356	25 444	14 667	1 504 207
Capital costs (c)									
Depreciation	22 660	29 453	41 404	11 710	10 795	2 500	805	1 025	120 351
User cost of capital - Other assets	11 970	17 161	29 825	5 792	4 077	1 977	783	278	71 864
Other costs (d)	216 783	190 684	114 577	51 041	47 401	12 680	11 467	4 356	648 988
Total expenditure (e)	740 469	610 012	550 618	139 530	197 445	48 513	38 498	20 326	2 345 410
Other expenses									
Payroll tax (b)	_	_	15 055	_	_	1 885	_	_	16 940
User cost of capital - Land	5 895	4 487	9 925	859	1 170	666	460	24	23 486
Interest on borrowings	_	_	10	_	_	_	_	_	10

Table 9A.46 Ambulance service costs (\$'000) (2014-15 dollars) (a)

	NSW	Vic	Qld	WA (f)	SA (f)	Tas (f)	ACT (f)	NT (f)	Aust
2008-09									
Labour costs - Salaries and payments in the nature of salaries (b)	474 110	352 400	332 078	67 365	183 103	30 321	17 070	13 438	1 469 886
Capital costs (c)									
Depreciation	22 766	24 319	38 993	11 737	11 439	2 052	908	999	113 213
User cost of capital - Other assets	13 619	19 934	30 006	5 736	3 957	1 704	770	284	76 009
Other costs (d)	210 303	190 930	127 958	45 671	46 765	13 253	10 338	4 847	650 065
Total expenditure (e)	720 797	587 583	529 034	130 510	245 264	47 330	29 086	19 568	2 309 173
Other expenses									
Payroll tax (b)	_	_	13 653	_	_	1 752	_	_	15 405
User cost of capital - Land	5 453	4 680	10 181	845	1 202	650	472	24	23 508
Interest on borrowings	_	_	55	_	_	_	_	_	55
2007-08									
Labour costs - Salaries and payments in the nature of salaries (b)	425 041	346 474	309 636	60 877	114 524	27 523	15 366	15 125	1 314 567
Capital costs (c)									
Depreciation	26 368	23 057	32 063	10 632	10 209	2 111	561	890	105 892
User cost of capital - Other assets	13 736	17 744	27 015	5 786	4 319	1 220	804	240	70 864
Other costs (d)	193 273	170 015	105 607	47 691	46 293	12 154	9 764	4 770	589 567
Total expenditure (e)	658 417	557 291	474 322	124 986	175 345	43 007	26 495	21 025	2 080 890
Other expenses									
Payroll tax (b)	_	_	13 017	_	_	1 733	_	_	14 750
User cost of capital - Land	5 568	4 715	7 406	878	1 178	206	396	25	20 373
Interest on borrowings	_	_	157	_	_	_	_	_	157

Table 9A.46 Ambulance service costs (\$'000) (2014-15 dollars) (a)

	=								
	NSW	Vic	Qld	WA (f)	SA (f)	Tas (f)	ACT (f)	NT (f)	Aust
2006-07									
Labour costs - Salaries and payments in the nature of salaries (b)	386 415	325 380	284 529	50 919	99 228	24 964	14 291	12 169	1 197 896
Capital costs (c)									
Depreciation	18 885	23 659	31 596	9 284	9 570	1 411	660	683	95 748
User cost of capital - Other assets	14 725	18 999	25 893	2 122	4 349	1 022	805	180	68 094
Other costs (d)	170 559	163 851	104 208	48 377	37 409	12 488	9 579	3 971	550 442
Total expenditure (e)	590 584	531 890	446 227	110 702	150 555	39 885	25 335	17 002	1 912 181
Other expenses									
Payroll tax (b)	_	_	11 347	_	_	1 527	_	_	12 874
User cost of capital - Land	5 962	4 474	7 708	4 415	913	215	348	26	24 062
Interest on borrowings	2	_	260	_	_	_	_	_	263
2005-06									
Labour costs - Salaries and payments in the nature of salaries (b)	380 123	316 377	269 900	48 807	87 242	23 688	15 955	11 202	1 153 293
Capital costs (c)									
Depreciation	18 451	22 738	26 922	6 807	9 712	2 494	429	719	88 271
User cost of capital - Other assets	15 449	16 591	23 949	4 753	4 129	988	1 487	138	67 485
Other costs (d)	146 638	151 864	89 653	38 713	33 066	11 472	8 293	3 756	483 454
Total expenditure (e)	560 661	507 569	410 424	99 081	134 148	38 641	26 165	15 814	1 792 503
Other expenses									
Payroll tax (b)	_	14 058	12 540	_	_	1 357	_	_	27 955
User cost of capital - Land	6 177	4 384	5 158	2 810	679	230	267	27	19 733
Interest on borrowings	138	_	424	_	_	_	_	22	584

<sup>(</sup>a) Time series financial data are adjusted to 2014-15 dollars using the General Government Final Consumption Expenditure (GGFCE) chain price deflator (2014-15 = 100) (table 2A.48). See chapter 2 (sections 2.5-6) for details.

<sup>(</sup>b) Payroll tax is excluded from labour costs.

## Table 9A.46 Ambulance service costs (\$'000) (2014-15 dollars) (a)

NSW Vic Qld WA (f) SA (f) Tas (f) ACT (f) NT (f) Aust

- (c) The user cost of capital is partly dependent on depreciation and asset revaluation methods employed. Details of the treatment of assets by emergency management agencies across jurisdictions are outlined in table 9A.50.
- (d) Other costs include the running costs, contract fees, provision for losses and other recurrent costs.
- (e) Total expenditure excludes the user cost of capital for land, interest on borrowings and payroll tax.
- (f) Jurisdiction notes:
- WA: WA use a contracted service model for ambulance services.
- SA: 2007-08 other fees from citizens includes workers compensation fees. The increase in salaries and payments in the nature of salaries from 2007-08 to 2008-09 reflect three significant events that in 2008-09: 1) increase in wages 2) subsequent back pay paid to frontline paramedics as a result of the "work value" case (from the 2007 enterprise bargaining agreement) reaching finalisation and 3) an increase in the number of frontline paramedics recruited.
- Tas: The service is part of the Department of Health and Human Services and sources corporate support services from the Department. Other assets includes \$3 million funded through recurrent operational funds (land and buildings, medical equipment) subsequently transferred to capital.
- ACT: Operating costs include direct costs for the ACT Ambulance Service. Indirect costs from supporting organizations and the umbrella department have been allocated based on a cost attribution model.
  - Variation in expenses largely due to the recognition of the Professional Officer Workvalue Outcome of \$6.444m, relating to the period 1 July 2008-30 June-2010.
- NT: NT use a contracted service model for ambulance services. All property holding assets are held under a separate entity to St John Ambulance NT.
  - **np** Not published. Nil or rounded to zero.
- Source: State and Territory governments (unpublished); ABS 2015, Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0 (table 2A.48).

Table 9A.47 Ambulance service organisations' expenditure per person (2014-15 dollars) (a), (b)

	-		o) (a), (b)							
	Unit	NSW	Vic	Qld	WA (c)	SA (c)	Tas	ACT	NT (c)	Aust
2014-15										
Total	\$m	873.6	725.6	616.8	223.1	246.4	65.6	44.6	26.6	2 822.1
Population	m	7.6	5.9	4.8	2.6	1.7	0.5	0.4	0.2	23.6
Per person	\$	115.47	123.26	129.84	86.41	145.65	127.27	114.94	108.90	119.45
2013-14										
Total	\$m	833.7	674.9	592.7	217.5	245.6	66.7	44.5	26.2	2 701.8
Population	m	7.5	5.8	4.7	2.6	1.7	0.5	0.4	0.2	23.3
Per person	\$	111.68	116.54	126.36	85.26	146.43	129.81	115.76	107.95	115.86
2012-13										
Total	\$m	781.9	646.0	585.7	206.6	216.2	62.8	46.4	26.7	2 572.5
Population	m	7.3	5.7	4.6	2.5	1.7	0.5	0.4	0.2	22.9
Per person	\$	106.40	113.75	127.03	83.56	130.09	122.52	122.37	112.86	112.30
2011-12										
Total	\$m	775.8	637.7	592.7	179.4	265.6	60.2	39.0	24.4	2 574.8
Population	m	7.2	5.6	4.5	2.4	1.6	0.5	0.4	0.2	22.5
Per person	\$	107.04	114.39	131.34	75.16	161.45	117.60	105.17	104.98	114.51
2010-11										
Total	\$m	737.1	609.7	576.5	148.5	199.9	57.8	35.0	22.3	2 386.9
Population	m	7.2	5.5	4.4	2.3	1.6	0.5	0.4	0.2	22.2
Per person	\$	102.66	110.93	129.94	64.02	122.48	113.34	96.03	96.75	107.65
2009-10										
Total	\$m	740.5	610.0	550.6	139.5	197.4	48.5	38.5	20.3	2 345.4
Population	m	7.1	5.4	4.4	2.3	1.6	0.5	0.4	0.2	21.9
Per person	\$	104.27	112.56	126.07	61.64	121.99	95.79	107.58	89.23	107.26
2008-09										
Total	\$m	720.8	587.6	529.0	130.5	245.3	47.3	29.1	19.6	2 309.2
Population	m	7.0	5.3	4.3	2.2	1.6	0.5	0.4	0.2	21.5

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Table 9A.47 Ambulance service organisations' expenditure per person (2014-15 dollars) (a), (b)

	-									
	Unit	NSW	Vic	Qld	WA (c)	SA (c)	Tas	ACT	NT (c)	Aust
Per person	\$	102.94	110.59	123.73	59.08	153.49	94.33	82.84	87.94	107.53
2007-08										
Total	\$m	658.4	557.3	474.3	125.0	175.3	43.0	26.5	21.0	2 080.9
Population	m	6.9	5.2	4.2	2.1	1.6	0.5	0.3	0.2	21.0
Per person	\$	95.65	107.18	114.02	58.54	111.08	86.73	76.98	97.06	99.01
2006-07										
Total	\$m	590.6	531.9	446.2	110.7	150.6	39.9	25.3	17.0	1 912.2
Population	m	6.8	5.1	4.1	2.1	1.6	0.5	0.3	0.2	20.6
Per person	\$	87.03	104.21	110.02	53.30	96.43	81.15	74.87	80.57	92.70
2005-06										
Total	\$m	560.7	507.6	410.4	99.1	134.1	38.6	26.2	15.8	1 792.5
Population	m	6.7	5.0	4.0	2.0	1.5	0.5	0.3	0.2	20.3
Per person	\$	83.46	101.04	103.53	48.81	86.84	79.17	78.45	76.25	88.25

<sup>(</sup>a) Time series financial data are adjusted to 2013-14 dollars using the General Government Final Consumption Expenditure (GGFCE) chain price deflator (2013-14 = 100) (table 2A.48). See chapter 2 (sections 2.5-6) for details.

WA: WA use a contracted service model for ambulance services.

SA: 2011-12 SA Ambulance Service results include some significant once-off items. There are two items involving calculations of net present value using the long term government bond rate as the long term discount rate. In 2012 that rate reduced significantly which caused increases in: (1) Long Service Leave Liability which was re-valued up by about \$9 million. (2) the Defined Benefit Superannuation Fund liability which experienced an actuarial loss of about \$24 million.

The 2011-12 results also includes back-pay for an Enterprise Bargaining Agreement. The SAAS EB has a preserved commencement date and consequently once the EB is ratified some increases are backdated to end of the last agreement (31 December 2010). The 2011-12 results include a retrospective adjustment of approximately \$4 million for the 6 months from January 2011 to June 2011.

NT: NT use a contracted service model for ambulance services. All property holding assets are held under a separate entity to St John Ambulance NT.

<sup>(</sup>b) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

<sup>(</sup>c) Jurisdiction notes:

Table 9A.47 Ambulance service organisations' expenditure per person (2014-15 dollars) (a), (b)

Unit NSW Vic Qld WA (c) SA (c) Tas ACT NT (c) Aust

Source: State and Territory governments (table 9A.46); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).; ABS 2015, Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0 (table 2A.48).

Table 9A.48 Ambulance service organisations' revenue per person (2014-15 dollars) (a), (b), (c)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2014-15									
Government grants/contributions	78.08	80.85	99.25	46.78	75.20	93.15	94.98	95.50	80.18
Transport fees	29.49	29.01	24.05	38.91	50.86	18.08	14.28	11.61	30.15
Subscriptions and other income	3.21	13.33	2.10	11.72	18.26	_	2.15	4.83	7.45
Total	110.77	123.19	125.40	97.42	144.32	111.23	111.40	111.94	117.77
2013-14									
Government grants/contributions	76.63	74.47	99.15	44.95	76.30	98.68	88.85	90.42	77.95
Transport fees	30.96	28.97	24.89	36.20	47.28	13.86	16.15	11.66	30.16
Subscriptions and other income	1.16	12.43	2.24	14.96	19.48	5.28	1.46	4.63	7.13
Total	108.75	115.87	126.28	96.10	143.05	117.83	106.46	106.72	115.25
2012-13									
Government grants/contributions	76.55	88.66	99.78	42.28	82.91	106.30	85.16	98.04	82.01
Transport fees	28.79	22.10	24.54	35.71	45.51	13.02	13.34	11.28	27.44
Subscriptions and other income	2.77	12.94	3.51	16.51	21.05	5.82	1.15	2.21	8.28
Total	108.11	123.70	127.83	94.49	149.46	125.14	99.65	111.52	117.74
2011-12									
Government grants/contributions	73.06	74.95	103.83	38.94	70.09	101.89	87.36	89.37	76.92
Transport fees	28.40	21.36	24.88	35.36	41.38	12.53	13.22	11.88	26.85
Subscriptions and other income	1.66	17.95	3.74	17.31	20.23	5.29	0.42	4.60	9.23
Total	103.12	114.27	132.45	91.61	131.70	119.71	101.00	105.85	113.00
2010-11									
Government grants/contributions	70.85	68.45	101.35	29.71	65.64	101.97	66.04	86.65	72.46
Transport fees	27.81	21.04	23.89	33.24	44.44	9.49	15.17	10.19	26.32
Subscriptions and other income	1.23	21.92	4.66	16.41	18.29	1.37	0.40	4.61	9.91
Total	99.89	111.41	129.89	79.36	128.37	112.82	81.62	101.45	108.70
2009-10									
Government grants/contributions	72.44	69.96	96.47	20.94	66.91	100.69	57.56	76.26	71.33
Transport fees	28.66	21.40	25.24	29.18	40.18	9.63	13.50	11.30	26.21

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Table 9A.48 Ambulance service organisations' revenue per person (2014-15 dollars) (a), (b), (c)

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Subscriptions and other income	1.48	20.07	3.78	16.74	17.23	1.88	1.43	4.78	9.34
Total	102.58	111.43	125.50	66.86	124.33	112.21	72.49	92.34	106.87
2008-09									
Government grants/contributions	72.13	69.23	98.95	20.65	75.10	86.81	60.92	73.20	71.84
Transport fees	27.56	19.58	19.71	25.45	35.93	10.73	14.13	9.95	23.63
Subscriptions and other income	1.31	21.50	4.92	16.59	16.82	1.39	0.46	30.38	10.04
Total	101.00	110.31	123.58	62.69	127.86	98.93	75.51	113.53	105.51
2007-08									
Government grants/contributions	66.47	63.21	92.44	20.05	50.08	67.70	58.40	69.78	64.78
Transport fees	25.91	20.58	20.11	28.84	36.75	10.60	15.03	10.00	23.85
Subscriptions and other income	1.70	23.50	4.88	17.48	17.20	1.58	0.47	29.10	10.75
Total	94.08	107.29	117.43	66.37	104.03	79.88	73.90	108.87	99.38
2006-07									
Government grants/contributions	61.65	60.05	88.58	20.71	43.40	67.04	53.99	67.85	61.10
Transport fees	21.50	20.32	19.16	27.59	34.46	8.29	14.35	9.88	21.79
Subscriptions and other income	1.94	23.44	5.13	15.71	17.21	0.73	0.69	25.94	10.62
Total	85.09	103.81	112.88	64.00	95.06	76.06	69.03	103.66	93.52
2005-06									
Government grants/contributions	61.16	64.88	83.01	21.47	43.06	62.06	71.16	62.58	61.20
Transport fees	17.34	19.74	18.81	25.41	32.62	7.51	3.87	10.01	19.66
Subscriptions and other income	2.92	22.03	4.57	15.59	17.29	1.23	0.44	25.93	10.48
Total	81.42	106.65	106.39	62.46	92.97	70.80	75.48	98.52	91.33

<sup>(</sup>a) Time series financial data are adjusted to 2014-15 dollars using the General Government Final Consumption Expenditure (GGFCE) chain price deflator (2014-15 = 100) (table 2A.48). See chapter 2 (sections 2.5-6) for details.

Source: State and Territory governments (table 9A.33); ABS (unpublished), Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2).; ABS 2015, Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0 (table 2A.48).

<sup>(</sup>b) Population data used to derive rates are as at 31 December. Estimated Resident Population (ERP) data for 2004 to 2010 are final, based on the 2011 Census of Population and Housing. Estimates for September quarter 2011 onwards are preliminary. See chapter 2 (table 2A.2) for details.

<sup>(</sup>c) Other revenue is equal to the sum of subscriptions, donations and miscellaneous revenue.

# All jurisdictions — contextual and other information

Table 9A.49 Communications and dispatching systems

NSW	Vic(a)	Qld(b)	WA	SA	Tas (c)	ACT(d)	NT(e)
Operating CAD system	Operating	Operating	Operating	SA is upgrading their CAD software	Operating	Operating	Operating
Fire Brigades	Metropolitan Fire and Emergency Services Board	Fire and Rescue Service	Department of Fire and Emergency Services	Metropolitan Fire Service	Tasmania Fire Service (all brigades)	ACT Fire and Rescue	Fire and Rescue
Rural Fire Service	Country Fire Authority		Fire and Rescue Service	Country Fire Service		Rural Fire Service	
NSW Ambulance	Ambulance Victoria	Ambulance Service	Local Government Bush Fire Brigades	Ambulance Service	Ambulance Service	Ambulance	St John Ambulance
	SES		SES	SES		SES	TES
	Police			Police			Police
Complete	Complete	Complete	Complete	Complete	Complete	Complete	Complete
Statewide	Melbourne Metropolitan	Statewide	Statewide	Statewide	Statewide for each service	Territorywide	Darwin emergency response area
	Inner Country						
	CFA Statewide						
	SES Statewide						
	Operating CAD system  Fire Brigades  Rural Fire Service  NSW Ambulance  Complete	Operating CAD system  Fire Brigades  Metropolitan Fire and Emergency Services Board  Rural Fire Service  Country Fire Authority  NSW Ambulance  Ambulance Victoria  SES Police  Complete  Complete  Melbourne Metropolitan  Inner Country  CFA Statewide	Operating CAD system  Fire Brigades  Metropolitan Fire and Rescue Service  Brigades  Metropolitan Fire Fire and Rescue Service  Services Board  Rural Fire Service  Country Fire Authority  NSW Ambulance  Ambulance Victoria Ambulance Service  SES Police  Complete  Complete  Complete  Statewide  Melbourne Metropolitan  Inner Country  CFA Statewide	Operating CAD system       Operating       Operating       Operating         Fire Brigades       Metropolitan Fire and Emergency Service       Fire and Rescue Service       Department of Fire and Emergency Services         Rural Fire Service       Country Fire Authority       Fire and Rescue Service         NSW Ambulance       Ambulance Victoria       Ambulance Service       Local Government Bush Fire Brigades         SES       SES         Police       Complete       Complete       Complete         Statewide       Melbourne Metropolitan       Statewide       Statewide         Inner Country CFA Statewide       CFA Statewide       Statewide	Operating CAD system         Operating         Operating         Operating         Operating         SA is upgrading their CAD software           Fire Brigades         Metropolitan Fire and Emergency Services Board         Fire and Rescue Service         Department of Fire and Emergency Service         Metropolitan Fire Service           Rural Fire Service         Country Fire Authority         Fire and Rescue Service         Country Fire Service           NSW Ambulance         Ambulance Victoria         Ambulance Service         Local Government Bush Fire Brigades         Ambulance Service           SES         SES         SES         SES           Police         Complete         Complete         Complete           Statewide         Statewide         Statewide	Operating CAD system  Operating Operating Operating Operating Operating SA is upgrading their Operating CAD software  Fire Brigades  Metropolitan Fire and Rescue Service Services Services Ocuntry Fire Authority  NSW Ambulance  Ambulance Victoria SES SES Police  Complete  Operating Operating SA is upgrading their Operating CAD software  Metropolitan Fire Service Service Service Service  Country Fire Service Service Country Fire Service Service  Country Fire Service Service  Ambulance Service SES SES SES SES Police  Complete  Complete  Complete  Complete  Complete  Statewide Service Service Country Fire Service Service Ambulance Service Ambulance Service Country Fire Service Serv	Operating CAD system  Operating Operating Operating Operating Operating SA is upgrading their Operating CAD software  Operating Operating Operating Operating SA is upgrading their Operating CAD software  Operating Operating Operating Operating Operating Operating SA is upgrading their Operating Operating Operating Operating Operating Operating Operating Operating SA is upgrading their Operating Operatin

**CAD** = computer aided dispatch.

- (a) Vic: Further development includes technological enhancement of mobile data terminals for all services and an automatic vehicle location system for police, the SES and fire services.
- (b) Qld: The roll out of a new single state-wide CAD system across all ambulance and fire communication centres was completed in 2008-09.
- (c) Tas: The CAD system is routinely upgraded to enhance service delivery by taking advantage of a range of technological innovations.
- (d) ACT: Common CAD system.
- (e) NT: Communications and "000" dispatch are provided by PFES Joint Emergency Services Communications Centre.

Source: State and Territory governments (unpublished).

Table 9A.50 Treatment of assets by emergency management agencies (a)

		NSW (b)	Vic	Qld (d)	WA	SA	Tas	ACT (e), (f)	NT
Depreciation method	Depreciable assets	Straight-line	Straight-line	Straight-line	Straight-line	Straight-line	Straight-line	Straight-line	Straight-line
Revaluation method	Land	Fair or market value	Deprival or market value	Fair or market value	Market Value & Hypothetical Alternate Land Use Value	Market value	Fair value or historical cost	Market value	na
	Buildings	Fair or market value	Deprival or market value	Fair or market value	Depreciated Replacement Cost	Market value	Fair value or historical cost	Market value	na
	Other assets	Fair or market value	Deprival or market value	Fair or market value	Historical cost	Market value	na	na	na
Frequency of revaluations	Land, buildings	3 years	1–5 years	1–5 years	1 years	2 years	5 years	3 years	na
	Other assets	5 years	1-5 years	Annually	na	2 years	na	na	na
Useful asset lives (c)	Buildings	40 years	52–66 years	15–80 years	40 years	40-50 years	33–100 years	30–40 years	40 years
	Specialist equipment	10 years	2-50 years	3-20 years	10-15 years	10-20 years	5-25 years	10 years	5-10 years
	IT equipment	3 years	Leased	3-5 years	3 years	5 years	5-10 years	4 years	na
	Other vehicles	3-5 years	2-20 years	2-10 years	5-20 years	15-20 years	5-10 years	7–15 years	5-15 years
	Office equipment (g)	5–10 years	2–20 years	3-10 years	10-15 years	10 years	3-10 years	7 years	na
	Other equipment (h)	5-10 years	3-20 years	3-10 years	5-15 years	10 years	3-10 years	10 years	na
Threshold capitalisation levels (\$)	Buildings	10 000	5 000	10 000	5 000	10 000	1 000	5 000	na
	IT equipment	10 000	Leased	5 000	5 000	10 000	1 000	5 000	na
	Other assets	10 000	5 000	5 000	5 000	10 000	1 000	5 000	na

<sup>(</sup>a) Market value is the current (net) value market selling price or exchange value; deprival value may be either the depreciated replacement cost of an asset of a similar service potential or the stream of its future economic benefits.

- (c) Estimated as 1/depreciation rate.
- (d) Asset lives for some assets have been grouped with other classifications.
- (e) The recognition threshold for the revaluation of assets is \$500 000.

<sup>(</sup>b) The assets used by the NSW Rural Fire Service are largely vested in Local Government. Accordingly, although issues such a asset depreciation and useful lives may be guided by Service policies, Local Government policies will prevail in other areas.

Table 9A.50 Treatment of assets by emergency management agencies (a)

NSW (b) Vic Qld (d) WA SA Tas ACT (e), (f) NT

- (f) Treatment includes all four response agencies: the ACT Fire and Rescue, the ACT Rural Fire Service, the ACT State Emergency Service and the ACT Ambulance Service. Assets have been manually apportioned. Apportionment process varies from previous years.
- (g) For some jurisdictions, office equipment includes furniture and fittings.
- (h) For some jurisdictions, other equipment includes information technology.na Not available.

Source: State and Territory governments.

Table 9A.51 **Deflators (a), (b), (c)** 

	General Goverenment Final Consumption Expenditure (GGFCE) price deflator	Domestic final demand (DFD) chain price index
	2014-15 dollars (2014-15=100)	2014-15 dollars (2014-15=100)
Nominal dollars (year)		
2005-06	77.8	80.4
2006-07	80.7	83.0
2007-08	83.9	85.7
2008-09	87.2	89.3
2009-10	89.6	90.8
2010-11	94.2	92.6
2011-12	95.7	94.0
2012-13	97.0	96.0
2013-14	98.3	98.3
2014-15	100.0	100.0

- (a) Data are sourced from table 36, Expenditure on Gross Domestic Product (GDP), Chain volume measures and current prices, Annual (Series ID: A2304687R – GGFCE and A2304685K – DFD) (ABS 2015). See Statistical context, section 2.6 Statistical concepts used in the Report for information on how these gross domestic product deflators were calculated using data from that source.
- (b) Estimates used to calculate the GGFCE Chain price indexes are subject to annual re-referencing by the Australian Bureau of Statistics (ABS) and also reflect any revisions inherent in source data which are aggregated up to the GGFCE level. These processes can cause volatility in deflator values from year to year. In addition to changes caused by re-referencing and source data revisions, starting from the 2013-14 deflator, the deflator in this table will differ in future reports due to the introduction by the ABS of updated supply-use benchmarks, which will be backcast, causing revisions throughout the time series.
- (c) To convert nominal dollars to real dollars, divide the amount in nominal dollars by the GGFCE Chain price indexes for the applicable financial year and multiply by 100. For example: to convert 2005-06 dollars to 2014-15 dollars, divide by 77.8 and multiply by 100; to convert 2008-09 dollars to 2013-14 dollars, divide by 88.7 and multiply by 100. For further information, see Statistical context, table 2.1, p. 2.16.

Source: Review calculations based on ABS (2015) Australian National Accounts: National Income, Expenditure and Product, June 2015, Cat. no. 5206.0, Canberra.

# Data quality information — Fire and ambulance services, chapter 9

## **Data quality information**

Data quality information (DQI) provides information against the seven Australian Bureau of Statistics (ABS) data quality framework dimensions, for a selection of performance indicators and/or measures in the Fire and ambulance services chapter. DQI for additional indicators will be progressively introduced in future reports.

Technical DQI has been supplied or agreed by relevant data providers. Additional Steering Committee commentary does not necessarily reflect the views of data providers.

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## **Emergency services for fire events**

## Fire incidents

## Fire incidents per 100 000 people in the population

Data quality information for this indicator has been drafted by the Emergency Management Working Group in consultation with the Australasian Fire and Emergency Service Authorities Council (AFAC), with additional Steering Committee comments.

## Indicator definition and description

**Element** Equity/effectiveness — Prevention/mitigation

**Indicator** Fire incidents

Measures

'Fire incidents' is defined as the number of fire events that are reported to a fire service organisation and require a response.

A jurisdiction's fire service organisation includes fire service providers, land management agencies and their umbrella department/s.

Data are provided for:

- fire incidents attended by fire service organisations per 100 000 people the total number of fire events that are reported to a fire service and require a response
  - structure fires a structure fire is a fire in a building, or involving a building, whether or not there is damage to the structure
  - landscape (bush and grass) fire incidents 'Landscape (bush and grass) fire incidents' includes all vegetation fires (such as bushfires or grassfires), irrespective of the size of the area burnt
  - other fire incidents Other fire incidents include mobile property type fires (such as to cars planes, or trains). outside storage fires, special structure fires (such as to bridges or tunnels). is a fire in a building, or involving a building, whether or not there is damage to the structure.

Measures of 'non-fire' incidents and false alarms incidents attended to by fire service organisations is provided as contextual information relating to the broader activities of fire service organisations.

Measures (other than ignition factors for structure types) are calculated as:

Numerator: the number of fire incidents (by type)

Denominator: (estimated resident population)

Fire incidents are coded by type according to the Australian Incident Reporting System (AIRS) classification:

- Fire incident events are where the Type of Incident is a fire or explosion:
  - A23 = Division 1 (Codes 100 to 199 inclusive)
- Structure fires are where the Type of Incident is a building fire:
  - A23 = Division 1 (codes 110 to 129 inclusive)
- Landscape (bush and grass) fire incidents are where the Type of Incident is a vegetation or other outside fire:

A23 = Division 1 (Codes 160 to 179 inclusive).

#### Data source

#### Numerator

State and Territory governments. The Secretariat collects data directly from all jurisdictions. Within each jurisdiction, fire service and emergency services organisations collect and compile data.

#### Denominator

• Population: Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2)

## **Data Quality Framework dimensions**

# Institutional environment

Fire incident data are collected by fire and emergency service organisations in each State and Territory according to the AIRS.

The AIRS is a nationally agreed data standard. It takes a systematic approach to collecting, recording and reporting information about responses to incidents and emergencies attended primarily by fire services. It provides a standard for the structure, definitions and integrity of the data collected.

The AFAC Australian Incident Reporting System (AIRS) User Network is responsible for sustaining the production and currency of AIRS data and support the continued development of data requirements to ensure consistent and reliable methods of data collection, compilation and analysis can be applied throughout member agencies. For further information about the AFAC knowledge data base see the AFAC National Data and Glossary.

Not all of the contributing fire and emergency services collect all of the data because each fire service has different legislated roles and responsibilities, environments and history of reporting and therefore have developed processes relevant to their business. In addition, many land management agencies do not record their response to fires according to the AIRS.

The data are requested and submitted to the Secretariat in accordance with the authority of the terms of reference of the Review of Government Service Provision.

## Relevance

'Fire incidents' is an indicator of governments' objective to manage the risk of fires by preventing/reducing the number of structure, landscape and other fires.

Fire service organisations respond to all reported fires within emergency response areas. Fire agencies may choose to manage some landscape fires (rather than fight the fire), particularly in remote areas

A lower or decreasing number of fire incidents, adjusted for population/households, indicates a better community outcome. Higher or increasing proportions of fire incidents indicate higher emergency response workloads.

## **Timeliness**

Fire incident are published annually for the latest financial year preceding the January release of each RoGS.

#### Accuracy

Text caveats in the RoGS provide generalised advice that data are not strictly comparable and cite a number of physical, operational and data collection system factors that influence fire incident data.

Jurisdictions predominately follow the data definitions. Substantive differences to the counting procedures are summarised in table 1 and include:

- land management agencies not all jurisdictions report the number of fire incidents attended to by land management agencies that have a fire response role
- *incomplete voluntary reporting procedures* accurate identification of incidents attended by volunteer fire brigades is sometimes not possible
- merging of landscape fires jurisdictions have noted that it is common practice to
  merge landscape fire data (i.e. one fire incident that with another is then treated as
  a single event). The AIRS incident type coding requires assessment of the 'most
  serious situation arising from a landscape fire', which usually occurs after fires have
  merged and may result in some merged fires being counted as a single incident.

Coherence Each State and Territory government maintains their own systems, processes, and

training for estimation.

Any time series changes are identified with relevant footnotes.

Accessibility Fire incident data are publicly available on the Productivity Commission's website from

the time of RoGS publication.

Additional data may be available upon request through AFAC.

Interpretability Copies of the complete AFAC AIRS data standard are available upon request through

AFAC.

Text caveats and chapter footnotes provide additional commentary on data quality, as do

the footnotes in the relevant attachment tables.

## **Data Gaps/Issues Analysis**

Key data gaps/issues

The Steering Committee notes the following key data gaps/issues:

 Text caveats note the need for fire incident data to be 'interpreted with caution because the data are not strictly comparable across jurisdictions.'

A number of factors are identified as contributing to this lack of comparability, but without detailed analysis of such factors.

## Table 1 Jurisdictional practices in counting fire incidents

Jurisdiction comments

## **NSW** Included in fire incidents data are incidents recorded by:

- Fire & Rescue NSW
- NSW Rural Fire Service
- The Fire Management Unit, Parks and Wildlife Group of the Office of Environment and Heritage currently report to RoGS the number of landscape fires.

## **Land Management Agencies**

NSW includes landscape incident data.

#### Merging of fires

na

## Other significant counting practices

None

## Vic Included in fire incidents data are incidents recorded by:

- Metropolitan Fire and Emergency Services Board
- · Country Fire Authority
- Department of Environment Land Water and Planning

## Land Management Agencies

Landscape fires data include incidents from the Department of Environment and Primary Industries (formerly Department of Sustainability and Environment) from 2004-05 onwards.

## Merging of fires

na

## **Qld** Included in fire incidents data are incidents recorded by:

- Queensland Fire and Emergency Services (QFES) Urban stations. QFES Urban stations are estimated to serve 87.6 per cent of Queensland's population.
- QFES Rural brigades. Rural Fire Brigades respond to the majority of landscape fires in Queensland. In fact, they cover approximately 93 per cent of the geographical area of the State.

Prior to 2012-13, accurate identification of incidents attended by the QFES was not possible. A trial of new procedures has seen reporting completion rates rise to over 95 per cent for Rural Fire Brigade attendances logged through FireCom during 2012-13. New procedures were fully implemented from 1 July 2013 and have resulted in improvement to the rate of reporting for volunteer attendances.

## Land Management Agencies

Queensland incident data exclude responses by land management agencies.

## Merging of fires

Each fire is counted as a separate incident, whether the fires burn into each other or not.

## Other significant counting practices

Data are likely to be under-reported due to non-completion of fire reports by QFES volunteer staff.

(continued next page)

## Table 1 (continued)

#### Jurisdiction comments

## WA Included in fire incidents data are incidents recorded by:

- Department of Fire and Emergency Services (DFES)
- The Department of Parks and Wildlife (P&W).

#### **Land Management Agencies**

Data for total fire incidents includes P&W fires.

Data for *total landscape fire incidents* includes responses by land management agencies (see above). Data are reviewed and cleansed on an annual basis to remove duplications resulting from fires managed by different agencies.

## Merging of fires

WA agencies currently record all landscape fires separately, according to the number of ignitions.

## Other significant counting practices

Data are likely to be under-reported for two reasons:

- 1) Some fires are only monitored and no suppression activity takes place. P&W does not record these incidents DFES records them as monitored fires.
- 2) Local Government Bushfire Brigades may self-mobilise to small localised incidents.
   Often these are not reported and are therefore not recorded.

## **SA** Included in fire incidents data are incidents recorded by:

- SA Metropolitan Fire Service (MFS)
- SA Country Fire Service (CFS)
- Parks SA
- Forestry SA.

## **Land Management Agencies**

SA's landscape fire incident reporting has included land management agencies such as Parks SA and Forestry SA, since these agencies have brigades registered as CFS brigades and work with CFS's Group System.

## Merging of fires

SA agencies generally record merged landscape fires as a single fire. As per AIRS manual, incidents are recorded as the 'most serious' situation. In SA landscape fires are generally the highest fire intensity when fires merge and often the greatest area is burnt after merging. Therefore, the 'most serious' situation that occurred is most likely at/after merger. Further, most forest fires, due to spotting, are usually an amalgam of many thousands of ignitions.

## Other significant counting practices

Rural Prescribe Burns may be included in the AIRS database, but are later removed as a part of data quality procedures, however a small number may not get picked up.

Tas Included in fire incidents data are incidents recorded by Tasmania Fire Service (TFS).

#### Land Management Agencies

Data include all vegetation fires, regardless of size, from all fire brigades (full time and volunteer) and land management agencies.

## Merging of fires

na

## Other significant counting practices

None

(continued next page)

## Table 1 (continued)

## Jurisdiction comments

**ACT** Included in fire incidents data are incidents recorded by:

- ACT Fire and Rescue
- ACT Rural Fire Service.

## **Land Management Agencies**

na

Merging of fires

na

Other significant counting practices

None

**NT** Included in fire incidents data are incidents recorded by:

- NT Fire and Rescue Service
- · Bushfires NT.

**Land Management Agencies** 

NTFRS includes data provided by Bushfires NT.

Merging of fires

Each fire is counted as a separate incident, whether the fires burn into each other or not.

Other significant counting practices

Some duplicate counting may exist due to the amalgamation of data between NTFRS and Bushfires NT. NTFRS and Bushfires NT are currently reviewing data collection policies.

na Not available.

Source: State and Territory governments.

## Non-fire incidents: Reported road crash rescue incidents

Data quality information for this indicator has been drafted by the Emergency Management Working Group in consultation with the Australasian Fire and Emergency Service Authorities Council (AFAC) and the Australian Council of State Emergency Services (ACSES), with additional Steering Committee comments.

## Indicator definition and description

**Element** Equity/effectiveness — Prevention/mitigation

**Indicator** Fire incidents (provided as contextual information to the fire incidents indicator)

Measure incidents (computation)

'Reported road crash rescue incidents' is defined as the number of reported incidents involving a motor vehicle and the presumption that assistance is required from emergency services organisations.

It is measured by the rate of reported road crash rescue incidents per 100 000 people. It is calculated as:

Numerator: the number of road rescue incidents

Denominator: estimated resident population

According to the Australian Incident Reporting System (AIRS) classification road crash rescue incidents are where:

The Type of Incident is A23 = Division 3: 351 and 352

AND the Type of Action Taken is A24= 20–23, 29

OR: the No. of Injuries is D2>=1, Fatalities is D4>=1, Rescued is D5>=1

AND the Mobile Property Type is J1 = 10-29, 61-65, 67

Measure extractions (computation)

Reported road crash rescue extrications' is defined as an assisted release and removal of trapped people (usually casualties) from motor vehicles by specially equipped and trained emergency service crews, arising from incidents reported. It is measured by the rate of reported extrications per 100 000 people; per 100 000 registered vehicles; and per million vehicle kilometres travelled. It is calculated as:

Numerator: the number of road rescue extractions

(estimated resident population)

Denominator: (number of registered vehicles)

(number of vehicle kilometres travelled)

According to the AIRS classification road crash rescue extractions are:

The 'Type of Incident' is A23 = Division 3: 351 and 352

AND the: 'Type of Action Taken' is A24= 21-23

**AND** No. of Injuries is D2 >=1, Fatalities is D4 >=1, Rescued is D5 >=1

AND the Mobile Property Type is J1 = 10–29, 61–65, 67

### Data source Numerator

State and Territory governments. The Secretariat collects data directly from all jurisdictions. Within each jurisdiction, fire service and emergency services organisations collect and compile data.

## Denominator

- Population: Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2)
- Registered Vehicles: Motor Vehicle Census, Cat. no. 9309.0
- Vehicle kilometres travelled: Survey of Motor Vehicle Use, Cat. No. 9208.0.

#### **Data Quality Framework dimensions**

# Institutional environment

Road crash rescue data are collected by fire and emergency service organisations in each State and Territory according to the reporting requirements of their jurisdiction.

Not all of the contributing fire and emergency services collect all of the data because each fire and emergency service has different legislated roles and responsibilities, environments and history of reporting and therefore have developed processes relevant to their business.

Jurisdictions that code their road crash rescue data according to the AIRS are:

- Victoria (fire agencies only)
- Queensland
- Western Australia
- South Australia

- Tasmania
- · Australian Capital Territory
- Northern Territory

The AIRS is a nationally agreed data standard. It takes a systematic approach to collecting, recording and reporting information about responses to incidents and emergencies attended primarily by fire services. It provides a standard for the structure, definitions and integrity of the data collected.

The AFAC Australian Incident Reporting System (AIRS) User Network is responsible for managing and reviewing the AIRS data standard. For further information about the AFAC knowledge data base see the AFAC National Data and Glossary.

The data are requested and submitted to the Secretariat in accordance with the authority of the terms of reference of the Review of Government Service Provision.

#### Relevance

'Reported road crash rescue incidents' and 'Reported road crash rescue extractions' are an indicator of governments' objective to reduce the adverse effects of road incidents on the community through appropriate response activities. A lower or decreasing number of reported road crash rescue incidents and extrications, adjusted for population, indicates a better community outcome. Higher or increasing proportions of reported road crash rescue incidents and extrications indicate higher emergency response workloads.

Each State and Territory has different road crash rescue attendance policies (table 2). As a result, road crash rescue incident data may vary according to the jurisdiction's attendance policy, rather than the underlying number of road crash rescue incidents.

## **Timeliness**

Reported road crash rescues are published annually for the latest financial year preceding the January release of each RoGS.

## Accuracy

Text caveats in the RoGS provide generalised advice that data are not strictly comparable and cite a number of physical, operational and data collection system factors that influence road rescue data.

Jurisdictions predominately follow the data definitions, although jurisdictions have indicated probable over-counting in the data collection due to:

- multiple agency response where both fire and SES services attend the same road crash event, due to data collection deficiencies several jurisdiction count this as multiple incidents
- multiple SES response where multiple SES services attend the same incident
- counting of 'call-backs' as incidents in some cases SES may count events as road crash rescue 'incidents', which are outside the scope provided in the data definition (such as counting 'call-back' incidents or traffic management incidents).

In practice there are differences in the method between (and within) jurisdictions to estimate road rescue data. Each jurisdiction's approach is summarised in the Road crash rescue data quality appendix (table 3-4).

## Coherence

Each State and Territory government maintains their own systems, processes, and training for estimation.

Any time series changes are identified with relevant footnotes.

## **Accessibility**

Road crash rescue data are publicly available on the Productivity Commission's website from the time of RoGS publication.

## Interpretability

Copies of the complete AFAC AIRS data standard are available upon request through AFAC.

Text caveats and chapter footnotes provide additional commentary on data quality, as do the footnotes in the relevant attachment tables.

## **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following key data gaps/issues:

 Text caveats note the need for road crash rescue data to be 'interpreted with caution because the data are not strictly comparable across jurisdictions.'

A number of factors are identified as contributing to this lack of comparability, but without detailed analysis of such factors.

## Table 2 Road crash rescue policies

Attendance policies that influence the number of road crash rescue incidents attended to and recorded by emergency service organisations.

Jurisdiction's emergency service road crash rescue attendance policies

**NSW** Rescue units in NSW are predominantly provided by the NSW Police, Ambulance Service of NSW, Fire and Rescue NSW, State Emergency Service, NSW Volunteer Rescue Association Incorporated, Marine Rescue NSW, and Australian Volunteer Coast Guard Association Incorporated.

Under the State Emergency and Rescue Management Act 1989 and the State Rescue Policy, the NSW Police Force has a central role in coordinating rescue. Rescue services in NSW are based on a network of 'accredited' rescue units located throughout the State, managed by the Board through an accreditation process. A Primary Rescue Unit is a unit with trained crew, rescue vehicle and rescue equipment which has been accredited to respond first to rescue situations, on a 24 hour, seven day a week basis.

Vic Road rescue services are provided by 145 Road Rescue approved crews in Victoria. These crews are derived from the Country Fire Authority (CFA), Metropolitan Fire and Emergency Services Board (MFESB), Victoria State Emergency Service (VICSES), and two independent units (the Echuca-Moama and Shepparton Search and Rescue Squads.

Road Rescue crews must be called out concurrently with ambulance to all road rescue events by communications centres unless it is known that no persons are trapped.

In addition, fire service and police will also respond concurrently.

Once verified that no persons are trapped, responding crews are immediately advised.

- Qld Revised road crash rescue protocols were implemented in September 2009 to reduce unnecessary attendance by the QFES at mobile property crashes. Revised road crash rescue response protocols were again implemented on 18 October 2011, as part of ongoing service delivery review for QFES attendance at mobile property crashes.
- WA In Western Australia the Hazard Management Agency is the Western Australia Police Service. Response services are provided by career and volunteer firefighters, the State Emergency Service and St John Ambulance.
- SA The SA emergency services work to a dispatch policy that requires a fire service response as well as a rescue response for any reported vehicle accident outside the Metro Area.
- Tas The main agencies responding to road crash rescue incidents are the Tasmania Police (TasPol), Ambulance Tasmania, Tasmania Fire Service (TFS) and State Emergency Service (SES).

The agency receiving the emergency call Triple Zero (000) for a road accident must ascertain whether any persons are trapped. Information on road crashes must be passed to the TAS, TasPol, and TFS (FireComm) control rooms. TFS (FireComm) will dispatch TFS and SES road crash rescue units when it is determined necessary.

Requests for multiple unit dispatches (TFS and/or SES) can be made if extra rescue or other services are required. There are also some dual response areas where both SES and TFS road crash rescue units are dispatched at the same time.

**ACT** The ACT Fire and Rescue has the sole responsibility for road rescue in the ACT.

ACT Fire and Rescue are dispatched whenever notified of an incident. In most cases, when the ACT Ambulance Service receives a call from the general public or from ACT Policing, the ACT CAD system creates a road rescue job for both the ACT Ambulance Service and ACT Fire and Rescue.

NT na

na Not available.

Source: State and Territory governments.

## Table 3 Calculation of road crash rescue incidents

A summary of each jurisdiction's approach calculating road crash rescue data and differences to the data collection manual.

Jurisdiction's calculating road crash rescue data

NSW Rescue data reported in the RoGS are sourced from the NSW Police Force CAD. The NSW Police Force CAD has been established as the definitive list of all rescue incidents that occur in New South Wales. The State Rescue Policy defines a Rescue Incident is an event requiring the dispatch of an accredited rescue unit to effect the safe removal of persons or domestic animals from actual or threatened danger or physical harm.

Vic Fire agencies use the AIRS codes as provided in data dictionary to calculate the incident count. VICSES road rescue definitions are taken from the Road Rescue Arrangements Victoria document (RRAV).

Where the call out has been cancelled prior to arrival on scene, the incident is not counted towards rescue.

Where the SES attends the incident after cancellation, the incident is counted as what the
incident is found to be. (This might occur when the Unit was cancelled in error or the type
of incident has changed, usually to Assist Agency).

**Qld** Queensland agencies use the AIRS codes as provided in data dictionary.

WA

- Incidents where Fire and SES both attend are counted as one.
- Only incidents involving a rescue are counted (as per the dictionary), therefore if a service
  is called back prior to arrival that incident would not be counted.
- · Road crash incidents only requiring clean-up of fuel spills are not counted.

**SA** In SA, AIRS codes are used calculate the incident count. The incident types used are: (All over fields are correct)

- 322 Vehicle Accident with Injuries
- 352 Vehicle Accident no injury
- 351 Vehicle Accident Rescue

At the time of the year data are extracted for RoGS, SA has not finished data cleaning. As a result some records counted in the RoGS may been inaccurately coded.

If SES get a stop call before getting out the station gate they do not record an RCR incident attendance. If they get a stop call after getting out the station gate they record and RCR incident attendance.

Tas

- Over-counting may occur where:
  - As reporting is completed by both TFS and SES on separate databases. There may be duplication of incidents (although this would be minimal).
  - It is also possible within the SES figures where multiple SES Units attend a single incident, that each SES Unit will submit a report for the same incident. i.e. 1 report per Unit, not one report per incident.
- For Tas SES, all events attended to by a Unit is counted as an incident, irrespective of action taken (eg extrication, traffic management, called off en-route).
- · For TFS the following events are not included:
  - 'Cancelled prior to arrival on scene' events
  - 'No rescue service was required' events
  - 'Washaways events'.

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## Table 3 (continued)

**ACT** In ACT, AIRS codes are used calculate the incident count. The incident types used are:

- Type of incident (A23):
  - 322 vehicle accident with injuries
  - 351 vehicle accident rescue
  - 352 vehicle accident no injury
- AND Type of action taken (A24): 20-23, 29

OR No. of other persons injured (D2)>=1, Fatalities (D4) >=1, Rescued is (D5) >=1

## NT na

na Not available.

Source: State and Territory governments.

## Table 4 Calculation of road crash rescue extractions

Jurisdiction comments

**NSW** Rescue data reported in the RoGS are sourced from the NSW Police Force CAD. The NSW Police Force CAD has been established as the definitive list of all rescue incidents that occur in New South Wales.

**Vic** For fire services there should be no other interpretation issues associated with this data, other than those noted for incidents.

For VICSES Road Rescue Arrangements Victoria (RRAV) defines a road rescue as 'The release and extrication of trapped people from motor vehicles', which is what VICSES conforms to. As such, VICSES conforms with the data dictionary, but notes that:

- a person is trapped if they are unable to leave the vehicle by their own efforts, which could include a jammed door.
- where Victoria Police have requested SES return to extricate a deceased after the coroner has completed his investigation a separate report is completed with an incident type of Assist Police (or assist crime scene as appropriate).

Qld No further details

WΔ

- The data dictionary definition counts all rescues (extrications and releases). WA is now able to separate extrications and releases.
- · WA counts the number of incidents involving rescues not the number of persons rescued.

SA In SA the incident types used are: (All over fields are correct)

- Type of incident (A23):
  - 322 vehicle accident with injuries
  - 351 vehicle accident rescue
  - 352 vehicle accident no injury

At the time of the year data are extracted for RoGS, SA has not finished data cleaning. As a result some records counted in the RoGS may been inaccurately coded.

Tas

- For TFS, the extraction count complies strictly with the RoGS definition.
- For Tas SES:
  - There is inconsistency in the reporting of injuries, fatalities and extrications.
  - D5 Number of personnel rescued by authority definition 'Persons non-injured, injured and deceased' that were trapped, in difficulty that are subsequently released or rescued by the Reporting Authority.
  - A deceased person requiring extrication is being recorded as a fatality only. An injured person requiring extrication is being recorded as extrication only, or as an extrication and injury.

In ACT the incident types used are

- Type of incident (A23):
  - 322 vehicle accident with injuries

**ACT** 

- 351 vehicle accident rescue
- 352 vehicle accident no injury
- AND Type of action taken (A24):21-23

AND No. of other persons injured (D2)>=1, Fatalities (D4) >=1, Rescued is (D5) >=1

NT No further details

Source: State and Territory governments.

## Fire risk prevention/mitigation activities

## Accidental residential structure fires per 100 000 households

Data quality information for this indicator has been drafted by the Emergency Management Working Group in consultation with the Australasian Fire and Emergency Service Authorities Council (AFAC), with additional Steering Committee comments.

## **Indicator definition and description**

**Element** Equity/effectiveness — Prevention/mitigation

Indicator Fire risk prevention/mitigation activities

Measures Accidental residential structure fires is defined as those fires that are not deliberately lit

and with effective educational programs can be reduced and prevented from occurring in the first instance.

Management of impition footons for all atm

Measures of ignition factors for all structure fire incidents attended to by fire service organisations is provided as contextual information.

Accidental residential structure fires per 100 000 households is calculated as:

Numerator: the number of accidental residential structure fire incident

Denominator: (number of households)

Accidental residential structure fires are where the Type of Incident is a building fire:

[A23 = Division 1 (codes 110 to 129 inclusive)]

AND the Fixed property use is *residential*: [A20 = 410 to 439 inclusive]
AND Ignition factor is *accidental*: [E05 = codes 300 to 790 inclusive]
AND Area of fire origin is within a *structure*: [E01 = codes 01 to 79].

Ignition factors for structure fires is Type of Incident is a building fire:

A23 = Division 1 (codes 110 to 129 inclusive) CODED by Ignition factor: [E05 = all codes].

## **Data source** Numerator

State and Territory governments. The Secretariat collects data directly from all jurisdictions. Within each jurisdiction, fire service and emergency services organisations collect and compile data.

## Denominator

Households: Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.10).

### **Data Quality Framework dimensions**

## Institutional environment

Fire incident data are collected by fire and emergency service organisations in each State and Territory according to the Australian Incident Reporting System (AIRS).

The AIRS is a nationally agreed data standard. It takes a systematic approach to collecting, recording and reporting information about responses to incidents and emergencies attended primarily by fire services. It provides a standard for the structure, definitions and integrity of the data collected.

The AFAC Australian Incident Reporting System (AIRS) User Network is responsible for sustaining the production and currency of AIRS data and support the continued development of data requirements to ensure consistent and reliable methods of data collection, compilation and analysis can be applied throughout member agencies. For further information about the AFAC knowledge data base see the AFAC National Data and Glossary.

Not all of the contributing fire and emergency services collect all of the data because each fire service has different legislated roles and responsibilities, environments and history of reporting and therefore have developed processes relevant to their business.

In addition, many land management agencies do not record their response to fires according to the AIRS.

The data are requested and submitted to the Secretariat in accordance with the authority of the terms of reference of the Review of Government Service Provision.

#### Relevance

'Accidental residential structure fires per 100 000 households' is an indicator of governments' objective to manage the risk of fires by preventing/reducing the number of structure, landscape and other fires.

Fire service organisations respond to all reported fires within emergency response areas. Fire agencies may choose to manage some landscape fires (rather than fight the fire), particularly in remote areas

A lower or decreasing number of fire incidents, adjusted for population/households, indicates a better community outcome. Higher or increasing proportions of fire incidents indicate higher emergency response workloads.

#### **Timeliness**

Fire incidents are published annually for the latest financial year preceding the January release of each RoGS.

## Accuracy

Text caveats in the RoGS provide generalised advice that data are not strictly comparable and cite a number of physical, operational and data collection system factors that influence fire incident data.

Jurisdictions predominately follow the data definitions. Substantive differences to the counting procedures are summarised in the fire incidents DQI and include:

• *incomplete voluntary reporting procedures* — accurate identification of incidents attended by volunteer fire brigades is sometimes not possible.

#### Coherence

Each State and Territory government maintains their own systems, processes, and training for estimation.

Any time series changes are identified with relevant footnotes.

## Accessibility

Fire incident data are publicly available on the Productivity Commission's website from the time of RoGS publication.

Additional data may be available upon request through AFAC.

# Interpretability

Copies of the complete AFAC AIRS data standard are available upon request through AFAC.

Text caveats and chapter footnotes provide additional commentary on data quality, as do the footnotes in the relevant attachment tables.

## **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following key data gaps/issues:

 Text caveats note the need for fire incident data to be 'interpreted with caution because the data are not strictly comparable across jurisdictions.'

A number of factors are identified as contributing to this lack of comparability, but without detailed analysis of such factors.

#### Residential structures with smoke alarms

Data quality information for this indicator has been drafted by the Emergency Management Working Group in consultation with the Australasian Fire and Emergency Service Authorities Council (AFAC), with additional Steering Committee comments.

#### Fire risk prevention/mitigation activities

**Element** Equity/effectiveness — Prevention/mitigation

**Indicator** Residential structures with smoke alarms

Measure (computation)

'Proportion of residential structures with smoke alarms' is defined as the number of households with an smoke alarm installed, divided by the total number of households.

**Data source** State and Territory governments. Jurisdictions collect and compile data for their own jurisdiction.

Survey questions, as recommended by the Directory of National Data Items and Questions for Evaluation of Household Preparedness for Fire and Natural Disaster Emergencies, are:

Identifier Question		tion
188	Q1.	Are there any smoke alarms or smoke detectors installed in [this/your] home?
	Q2.	How many?
189		[How many are/Is it] currently in working order?
190	Q1.	[Was it/Where any of them] manually tested [in the last 12 months/since moving into [this/your] home]?
	Q2.	When [was it/where they] last tested?  • Less than 3 months ago
		6 months to less than 9 months ago
		• 9 months to 12 months ago.

#### **Data Quality Framework dimensions**

Institution	nal
environm	ent

Not all jurisdictions regularly collect data on residential structures with smoke alarms. Where they do, they measurement questionnaires and tools are not applied consistently across Australia (table 5).

#### Relevance

High or increasing numbers of households with a smoke alarm installed, increases the likelihood that the adverse effects of fire will be avoided or reduced.

### **Timeliness**

Nationally consistent data for all jurisdictions were last available for the reference period February to November 2000, from the discontinued ABS Population Survey Monitor.

Since 2000, jurisdictions have collected data for their own states and territories, with the frequency and timeliness determined by jurisdiction requirements and available resources.

#### **Accuracy**

All jurisdictions collect data from a sample of households in their state or territory. These are subject to sample and non-sample error, particular to their collection.

#### Coherence

Each State and Territory government maintains their own systems, processes, and training for estimation of residential structures with smoke alarms.

Data were sourced from jurisdictional collections that were not strictly comparable because of methodological differences.

Collection methods and time series changes for each jurisdiction are identified with relevant footnotes.

#### Accessibility

Residential structures with smoke alarms data are publicly available on the Productivity Commission's website from the time of RoGS publication.

#### Interpretability

The Directory of National Data Items and Questions for Evaluation of Household Preparedness for Fire and Natural Disaster Emergencies is available on the Australian Natural Disasters Impacts Framework Project page, hosted by NSW Fire Brigade website at:

www.fire.nsw.gov.au/page.php?id=914

#### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following key data gaps/issues:

- Residential structures with smoke alarms indicators lack a consistent, comparable and iterative data source.
- Text caveats note the need for of residential structures with smoke alarms to be 'interpreted with caution because the data are not strictly comparable across jurisdictions.'

A number of factors are identified as contributing to this lack of comparability, but without detailed analysis of such factors.

#### Table 5 Residential structures with smoke alarms calculation

Jurisdiction's method for estimating 'Residential structures with smoke alarms'.

Jurisdiction's collection and estimation method

**NSW** Data are sourced from the New South Wales Adult Population Health Survey (SAPHaPI), Centre for Epidemiology and Evidence, Ministry of Health.

Vic Data are sourced from Household Preparedness for Emergencies Survey, 2007-08 (ABS cat. no. 4818.0).

- The number of households enumerated for the survey was 1207 for Victoria.
- Relative standard error for Victorian estimate is 0.8 per cent.

The indicator includes those who have a smoke alarm or detector in their home. The question used to define the indicator was:

#### Do you have smoke alarms installed in your home?

Qld The 2013-14 result is sourced from an online survey undertaken in November 2013. The survey is conducted annually. Data are estimates for the whole population of Queensland. The indicator includes those who have a smoke alarm or detector in their home. The question used to define the indicator was:

#### Do you have smoke alarms installed in your home?

A household is deemed to have an operational smoke alarm if, in the past 12 months, any of the following apply: 'tested smoke alarm'; 'vacuumed or cleaned smoke alarm'; 'replaced smoke alarm battery'; or 'replaced smoke alarm unit'.

Note that households without an operational smoke alarm include those where a smoke alarm is not installed and those where a smoke alarm is installed but none of the above maintenance activities have been carried out in the past 12 months.

WA Data are based on market research conducted annually (most recently April 2013).

The indicator includes those who have a smoke alarm or detector in their home. The question used to define the indicator was:

#### Do you have smoke alarms installed in your home?

**SA** ..

Tas

**ACT** Data are sourced from Household Preparedness for Emergencies Survey, 2007-08 (ABS cat. no. 4818.0).

- The number of households enumerated for the survey were 1207 for the ACT.
- Relative standard error for the ACT estimate is 2.0 per cent

The indicator includes those who have a smoke alarm or detector in their home. The question used to define the indicator was:

#### Do you have smoke alarms installed in your home?

NT

.. Not applicable.

## Firefighter workforce

Data quality information for this indicator has been drafted by the Secretariat in consultation with jurisdictions, with additional Steering Committee comments.

#### Indicator definition and description

**Element** 

Equity/effectiveness — Preparedness

Indicator

Firefighter workforce

Measure (computation) There are four firefighter workforce measures:

- the number of full time equivalent (FTE) firefighter personnel per 100 000 people
- the number of fire service organisation volunteers (firefighters and support volunteers) per 100 000 people
- workforce by age group
- staff attrition

Full time equivalent (FTE) firefighter personnel per 100 000 people

Firefighter personnel is defined as the count of all paid firefighters employed on a FTE basis.

A firefighter is defined as any person employed or remunerated by the fire service organisation who delivers or manages a firefighting service directly to the community and who is formally trained and qualified to undertake firefighting duties.

FTE is a measure of the total level of staff resources used. One FTE is equivalent to a person employed full-time and engaged solely in activities that fall within the scope of fire service organisations. FTE is calculated on the basis of the proportion of time spent on activities within the scope of the data collection compared with that spent by a full time staff member.

FTE firefighter personnel per 100 000 people is calculated as:

FTE firefighter personnel FTE firefighter personnel per 100 000 people = Estimated resident population

100 000 X

Fire service organisation volunteers per 100 000 people

The number of volunteers of fire service organisations is defined as the sum of volunteer firefighters and volunteer support staff on a head count basis.

A volunteer firefighter is defined as any person who delivers or manages a firefighting service directly to the community and who are formally trained and qualified to undertake firefighting duties, but does not receive remuneration other than reimbursement of 'out of pocket expenses'

A volunteer support staff member is defined as a person whose immediate client is the firefighter, but does not receive remuneration other than reimbursement of 'out of pocket expenses'.

The head count is a count of the number of people recorded on the books of jurisdiction's fire service organisation. The count should be calculated as the average for the financial year.

Volunteers per 100 000 people = 100 000 X

Fire service organisation volunteers

Estimated resident population

Estimated resident population

Population by State and Territory and

Australian total. For more detail about the population data used in the Report see RoGS Statistical context (chapter 2, table 2A.2).

Workforce by age group

'Workforce by age group' is defined as the age profile of the workforce, measured by the proportion of the operational workforce in 10 year age brackets (under 30, 30-39, 40-49, 50-59 and 60 and over).

#### Age group

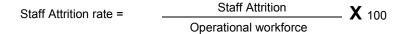
Firefighter personnel who fall into the following age groups:

- · under 30 year old,
- 30-39 year old,
- 40-49 year old,
- 50-59 year old
- 60 years old and over

#### Staff attrition

Staff attrition' is defined as the level of attrition in the operational workforce.

It is calculated as the number of FTE firefighter employees who exit the organisation as a proportion of the number of FTE employees.



#### Data source Firefighter workforce

State and Territory governments. The Secretariat collects data directly from all jurisdictions. Within each jurisdiction, fire service and emergency services organisations collect and compile data.

#### Estimated resident population

Australian Demographic Statistics, Cat. no. 3101.0

#### **Data Quality Framework dimensions**

## Institutional environment

Data are provided by the fire and emergency service organisations in each State and Territory in accordance to the RoGS Fire Services Financial and Staff Data Dictionary.

The RoGS Fire Services Financial and Staff Data Dictionary has been prepared by the Emergency Management Working Group (EMWG), with assistance from Australasian Fire Authorities Council (AFAC) members.

The data are requested and submitted to the Secretariat in accordance with the authority of the terms of reference of the Review of Government Service Provision.

#### Relevance

Firefighter workforce measures are an indicator of governments' objective to reduce the adverse effects of fire incidents on the community by providing a workforce of paid firefighter personnel and volunteers which has:

- sufficient capacity to meet community needs
- sufficient capabilities to respond to a range of fire and other emergency events
- the diversity and adaptability to respond to community needs, now and into the future.

#### **Timeliness**

Firefighter workforce data are published annually for the latest financial year preceding the January release of each RoGS.

#### **Accuracy**

Firefighter workforce data are collected from each fire service organisation in Australia according to agreed definitions.

Not all of the contributing fire service organisations collect all of the data because:

- each fire service has different legislated roles and responsibilities, environments and history of reporting and therefore have developed processes relevant to their business
- in several jurisdictions it is difficult to consolidate the workforce arrangements of the umbrella departments, fire service providers, and land management agencies.
   A summary of the scope of each jurisdiction's human resource reporting is provided in table 9A.3.

Jurisdictions have reported variations from the data dictionary with respect to:

- umbrella departments the department responsible for policy, planning, management and ensuring delivery of emergency services
- fire service providers the primary agencies involved in providing emergency management services for fire events
- land management agencies government funded agencies that have an obligation to respond in the case of structure or landscape fires and typically provide fire services within designated areas.

#### Coherence

Each State and Territory government maintains their own systems, processes, and training for estimation of firefighet workforce.

Any time series changes are identified with relevant footnotes in the attachment tables.

#### Accessibility

Fire services expenditure per person data are publicly available on the Review's website from the time of RoGS publication.

#### Interpretability

Copies of the complete Fire Services Financial and Staff Data Dictionary are available upon request through the Secretariat.

Text caveats and chapter footnotes provide additional commentary on data quality, as do the footnotes in the relevant attachment tables.

## Response times to structure fires

Data quality information for this indicator has been drafted by the Secretariat in consultation with the Australasian Fire and Emergency Service Authorities Council (AFAC), with additional Steering Committee comments.

#### **Indicator definition and description**

<u>Element</u> Equity/effectiveness — Response <u>Indicator</u> Response times to structure fires

Measure (computation)

There are two measures of structure fire response times:

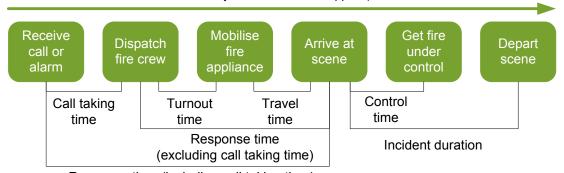
- response times to structure fires (including call taking time)
- response times to structure fires (excluding call taking time).

Response times to structure fires (including call taking time)

Response times to structure fires (including call taking time) is defined as the interval between the receipt of the call at the dispatch centre and the arrival of the first vehicle at the scene (that is, when the vehicle is stationary and handbrake is applied).

Response times to structure fires (excluding call taking time)

Response time (excluding call taking time) is defined as the interval between the dispatch of the fire crew and the arrival of the first vehicle at the scene (that is, when the vehicle is stationary and handbrake is applied).



Response time (including call taking time)

Further guidance is provided in the Fire and Emergency Services Activity Data Dictionary as follows:

- The measures of response times are for emergency calls only exclude all calls where vehicle travels 'code 3' or under normal road conditions.
- Include 'genuine' outliers and 0 response times (i.e. where passing appliance notifies the event).
- Exclude from the calculation records with incomplete time stamps.
- Exclude from the calculation records where the appliance was called off en-route to scene.
- The 50th percentile (or median) The time taken for 50 per cent of all responses to arrive at a structure fire is equal to or below the 50th percentile.
- The 90th percentile The time taken for 90 per cent of all responses to arrive at a structure fire is equal to or below the 90th percentile.
- The call handling time by the Telstra '000' triple-zero operator which occurs prior to hand over to the emergency services operator is excluded.

#### Structure fire

A structure fire is a fire inside a building or structure, whether or not there is damage to the structure. Within the Fire and Emergency Services Activity Data Dictionary, the following guidance is provided:

• Structure fires are defined as Australian Incident Reporting System (AIRS) data

element A23, type of incident codes 110-129 inclusive.

All jurisdictions conform with the definition but SA uses a limited range of codes namely 110, 111, 112, 113, 121,123 and 126.

#### Data source

State and Territory governments. The Secretariat collects data directly from all jurisdictions.

Within each jurisdiction, fire service and emergency services organisations collect and compile data. Not all jurisdictions have systems in place to capture all components of the response time continuum from time of call to arrival at the scene, as outlined in the figure above. Some agencies use manual systems to calculate response times, while others retrieve data from computer aided dispatch (CAD) systems.

#### **Data Quality Framework dimensions**

## Institutional environment

Response time data are collected by fire and emergency service organisations in each State and Territory according to the AIRS. The majority of response time data are generated by CAD systems.

Not all of the contributing fire and emergency services collect all of the data related to the various components of response time because each fire service has different legislated roles and responsibilities, environments and history of reporting and therefore have developed processes relevant to their business.

The data are requested and submitted to the Secretariat in accordance with the authority of the terms of reference of the Review of Government Service Provision.

#### Relevance

Timeliness of response and early intervention is a precursor for preventing the spread of fire and reducing its impacts on life and property. Timeliness of arrival is used to measure the effectiveness of reducing the impacts of fire, not the actions taken after arrival.

Data are available both on a state-wide basis and by remoteness area, with response times reported in minutes for the 50th and 90th percentiles in each category.

Data are presented by remoteness area in an attempt to correct for some of the physical and operational factors that are believed to adversely affect response times in areas that are relatively remote compared with the major cities.

Response times are classified according to the Remoteness Area (RA) classification maintained by the ABS (Australian Standard Geographical Classification (ASGC) (cat. no. 1216.0)), The delimitation criteria for RAs are based on the Accessibility/Remoteness Index of Australia (ARIA) developed by the Commonwealth Department of Health and Ageing and the National Key Centre For Social Applications of GIS. ARIA measures the remoteness of a point based on the physical road distance to the nearest Urban Centre in each of five size classes.

### **Timeliness**

Response time data are published annually for the latest financial year preceding the January release of each RoGS.

#### Accuracy

Text caveats in the RoGS provide generalised advice that data are not strictly comparable and cite a number of physical, operational and data collection system factors that influence response times.

Response time data are not collected for all incident responses.

Separate urban and rural fire service organisations — consisting of both volunteer and career/permanent personnel — provide fire response services within jurisdictions.

Resulting data issues include:

- whether structure fires attended by volunteer brigades are included in calculating a jurisdictional response time value
- the percentage of structure fires attended by volunteer brigades, where:
  - response times tend to be calculated manually
  - there is potential for variation in data completeness.
- In practice there are differences in the method each jurisdiction uses to estimate response time to structure fires. Each jurisdiction's approach is summarised in the Structure fire response times appendix (page 6), including their approach to:
- response time definition (table 6)

- differences data collection systems and coverage (table 7)
- data completeness (volunteer and permanent brigades) (table 8)
- extrapolation and estimation (table 9)
- percentile calculations (table 10).

#### Coherence

Each State and Territory government maintains their own systems, processes, and training for estimation of response times in accordance with AIRS.

Any time series changes are identified with relevant footnotes.

#### **Accessibility**

Structure fire and response time data are publicly available on the Productivity Commission's website from the time of publication.

Interested parties, particularly researchers, may request access to unpublished portions of the AFAC Knowledge data base's Core Data (de-identified unit record data) to undertake their own statistical analysis for particular research and/or projects. For more information about access to national data see AFAC data requests.

#### Interpretability

Copies of the complete AFAC AIRS data standard are available upon request through AFAC.

The AFAC knowledge web provides links to a range of related statistics to enable a better understanding of how interrelationships between socio-demographic, economic, geographic and environmental factors influence emergency incidents.

Text caveats and chapter footnotes provide additional commentary on data quality, as do the footnotes in the relevant attachment tables.

#### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following key data gaps/issues:

- Response times are identified on the three point comparability scale as 'not complete or not directly comparable'.
- Text caveats note the need for response times to be 'interpreted with caution because the data are not strictly comparable across jurisdictions.'

A number of factors are identified as contributing to this lack of comparability, but without detailed analysis of such factors.

The following tables are a summary of each jurisdiction's compliance in calculating the structure fires response time.

Tab	le 6 Res	ponse time definition
	Complies with definition	Jurisdiction's interpretation and/or application of definition that may impact on comparability
NSW	Yes (FRNSW) No (NSWRFS)	The NSW Rural Fire Service (NSWRFS) does not capture the 'Call taking time' data to calculate Response times to structure fires (including call taking time).
Vic	Yes	Response times are calculated from the time the Emergency Services Telecommunications Authority (ESTA) creates an event for the emergency call to arrival of the first appliance on scene.
Qld	No	<ul> <li>Response time for Queensland applies the following additional parameters:</li> <li>Exclude calls where A37 Delayed Arrival code is 71 (Severe weather conditions), 91 (Initial response by other agency).</li> <li>Incident must be within the urban levy boundary.</li> <li>Alarm time is not at the point of call pickup but at the time the incident is placed in the waiting queue (waiting assignment to a crew) and deemed an actual incident.</li> </ul>
WA	Yes	
SA	No	SA does not capture the 'Call taking time' data to calculate Response times to structure fires ( <i>including call taking time</i> ).
Tas	Yes	
ACT	Yes	Up until and including the 2009–2010 data the ACTFB's response times had been calculated from dispatch to arrival. This was an error in the data extraction programming and has been rectified for the 2010–2011 year to reflect the RoGS definition.
NT	Yes	<del></del>
Not	applicable.	

Table 7 Data collection and storage Computer Assisted Dispatch (CAD), manual or combined systems

	System	Proportion of response time data extracted from CAD systems <sup>a</sup>	Additional information
NSW	Combination of manual and CAD systems.	89 per cent	The Fire & Rescue NSW (FRNSW) collects response times using a CAD system.
			The NSWRFS collects response times using a manual system.
Vic	Combination of manual and	93 per cent	The MFB collects response times using a CAD system.
	CAD systems.		CFA collects response times according to:
			Category 1 Brigades (Full Radio Traffic) collect response times using a CAD system.
			• Other brigades collect response times using a manual system.
Qld	CAD system	100 per cent	
WA	Combination of manual and CAD systems.	100 per cent	Bush Fire Brigade data may be entered manually where volunteers have self-dispatched (<1 per cent).
			Times may also be modified manually as a consequence of data auditing where incorrect times are recorded through CAD (estimated at 1 per cent of total incidents).
SA	Combination of manual and	MFS: Metropolitan Stations (arrival times) are documented via the CAD	All incidents are despatched from CAD for Metropolitan and Country Stations.
	CAD systems	system (82 per cent). Country Stations (arrival times) are manually populated with the AIRS database (12 per cent). CFS: CAD dispatches CFS's structure	Call taking time for the MFS is the time incident is received on pagers or MCTs and is created from CAD.
		fire responses but all (100 per cent) of CFS's arrival times are manually entered in the incident record. For 2008–2009 CFS brigades attended 13 per cent of the structure fires we're reporting in RoGS 2010	Country Stations (MFS and CFS) complete hand written or electronic form for documenting mobile and arrival times (except CFS only have pagers)
Tas	CAD system	100 per cent	CAD data are automatically loaded to AIRS data system.
ACT	CAD system	100 per cent	CAD data are automatically loaded to AIRS data system.
NT	Combination of manual and CAD systems	Data are entered directly into AIRS via CAD. Percentage (estimate of <10 per cent) of data are entered manually into AIRS by remote stations.	l

a Estimates of the proportion of response time data extracted from CAD were compiled for 2008-09, unless otherwise stated.

Table	8 <b>D</b> a	ata completeness (volu	nteer and permanent brigades)
	Volunteer brigade data included?	Percentage of data relating to volunteer brigades <sup>a</sup>	Other information relating to data completeness
NSW	Yes	Approximately 13 per cent of structure fires	
Vic	Yes	Approximately 29 per cent of structure fires	MFB account for around 50 per cent of all structure fires and is fully staffed by paid crews.
			CFA account for around 50 per cent of all structure fires and comprises brigades fully staffed by paid crews, brigades fully crewed by volunteer fire fighters and brigades with a mixture of paid crews and volunteer firefighters.
			For CFA around 58 per cent of structure fires are attended to by volunteer brigades which, after taking into account MFB activity, translates to around 29 percent of Victoria's structure fires.
Qld	Yes	For 2013-14, volunteer brigade data has been included and represents approximately 7.7 per cent of incident data.	Accurate identification of incidents attended by the former Queensland Fire and Rescue Service Rural brigades prior to the 2012-13 fiscal year was not possible due to incomplete voluntary reporting procedures. Improved reporting practices have resulted in a higher rate of completion of incident reports for incidents where rural brigades are responsible. New procedures were fully implemented from 1 July 2013 in an endeavour to enhance the rate of reporting for volunteer attendances.
			QFES Urban stations are estimated to serve 87.6 per cent of Queensland's population.
WA	Yes	Approximately 21 per cent of structure fires (average over 5 years)	Response time data can only be provided if all time fields are completed. In 2014-15 approximately 24.47 per cent of total structure fires were excluded as some time fields were incomplete.
SA	Yes	Approximately 13 per cent of structure fires	MFS Stations are all paid personnel allocated to stations. Metro Stations are all full time and Country Stations are retained.
			CFS stations are all volunteer. CFS has no paid firefighters.
			Both fire services have data quality assurance processes but were not able to estimate record completeness. In any case, incomplete record numbers are expected to be smaller than record numbers with keying errors. For RoGS 2009,1353 structure fires (88 per cent of the total) were used in response time calculations i.e. had the data necessary for response time calculation.
Tas	Yes	Approximately 43 per cent of structure fires	TFS collects data from career and volunteer brigades and the data set is >98 per cent complete.
			(continued next page)

Table	e 8 (co	(continued)		
	Volunteer brigade data included?	Percentage of data relating to volunteer brigades <sup>a</sup>	Other information relating to data completeness	
ACT	No			
NT	No		Currently there are no provisions for data entry by volunteers in the NTFRS. It should be noted that Bushfires NT provides response to grassfires only outside NTFRS Emergency Response Areas and does not provide any data to RoGS	

 $<sup>^{\</sup>mathbf{a}}$  Estimates of the proportion of data relating to volunteer brigades were compiled for 2008-09, unless otherwise stated. .. Not applicable.

Table	e 9 Extrap	olation and estimation responses
	Are any response time data extrapolated	Are any response time data estimated and if so explain the rationale and method used
NSW	No	Response times collected manually from volunteer brigades are estimates. Incident information provided by volunteer fire-fighters is entered into an AIRS-compliant database. However, the information is provided post incident. There is a margin of error, in that times are very difficult to correlate from independent sources.
Vic	No	Where response time data are incomplete it is excluded from reporting.
		CFA response time data (mostly volunteer brigades) may incorporate ar estimation factor of arrival time provided by the responding operationa crews, either to the nearest minute on a wrist watch, or in the case of rura volunteer brigades, estimated after the incident.
		There is no estimation undertaken on data reported by the brigades.
Qld	No	No
WA	No	No
SA	No	If times required to calculate response time are not documented then these records are excluded from response time calculations.
Tas	No	No
ACT	No	No
NT	No	No

Table	10 Percentiles calculation	on <sup>a</sup>
	Are there any records excluded from the percentile calculations other than those recommended in the data dictionary?	Are outliers excluded? If so, how they are defined?
NSW	Records with incomplete response time	FRNSW — outliers are not excluded.
	data are excluded.	NSWRFS — outliers are excluded. The NSWRFS excludes records with response times that are deemed to be entry errors (for example, greater than 100 hours).
Vic	No	Outliers are not excluded.
		However, given the low number of remote structure fires, these data are incorporated into the outer regional figures for statistical purposes.
		If the ESTA CAD is off-line and ESTA is in manual mode and there is an observed timestamp issue with the manual data, then that information is excluded from the calculations.
Qld	Exclusions include: structure fires outside the Urban Levy Boundary; delays due to extreme weather conditions or where the initial response was by another agency or brigade.	Outliers are not excluded.
WA	No	Outliers are not excluded.
SA	No	Outliers resulting from manual keying errors are excluded.
		MFS's historic system did not use a standard data base date/time field. Rather, they used separate fields for dates and times, so the time field could not be assumed to relate to the recorded date (that is, if the dispatch occurred five minutes before midnight and the travel time was 10 minutes then the arrival time should be for the date of arrival (not the day beforehand). Therefore, we exclude records where apparent 'response time' exceeds 12 hours.
Tas	No	Outliers are not excluded.
ACT	No	Outliers are not excluded.
NT	No	Outliers are excluded.
		Where it is clear by built-rules related to response type and reasonable response time within or outside Emergency Response Areas.

<sup>&</sup>lt;sup>a</sup> There are various statistical methods implemented in different software for calculating percentiles which can result in different values being calculated.

## Fire services expenditure per person

Data quality information for this indicator has been drafted by the Secretariat in consultation with AFAC, with additional Steering Committee comments.

#### **Indicator definition and description**

**Element** 

Efficiency

Indicator

Fire services expenditure per person

Measure (computation)

'Fire services expenditure per person' is defined as the total fire service organisation expenditure per person in the population.

Fire service organisation expenditure

Fire services expenditure per person =

Estimated resident population

#### Fire service organisation expenditure

Expenditure includes all costs incurred by the fire service organisation, including:

- salaries and payments in the nature of salaries costs in relation to compensating staff (directly or indirectly) for their labour (excluding payroll tax)
- capital costs costs associated with the with the use of non-current physical
  assets, including depreciation and the user cost of capital. The rate applied for the
  user cost of capital is currently 8 per cent. Excluded are capital charges and
  interest on borrowings (to avoid double counting).
- other operating costs other costs not counted in the categories above.

A jurisdiction's fire service organisation includes:

- umbrella department the department responsible for policy, planning, management and ensuring delivery of emergency services
- fire service provider the primary agencies involved in providing emergency management services for fire events
- land management agency government funded agencies that have an obligation to respond in the case of structure or landscape fires and typically provide fire services within designated areas.

#### Estimated resident population

Population by State and Territory and Australian total. For more detail about the population data used in the Report see RoGS Statistical context (chapter 2, table 2A.2).

#### **Data source**

#### Fire service organisation expenditure

State and Territory governments. The Secretariat collects data directly from all jurisdictions. Within each jurisdiction, fire service and emergency services organisations collect and compile data.

#### **Estimated resident population**

Australian Demographic Statistics, Cat. no. 3101.0 (table 2A.2)

#### **Data Quality Framework dimensions**

## Institutional environment

Data are provided by the fire and emergency service organisations in each State and Territory in accordance to the RoGS Fire Services Financial and Staff Data Dictionary.

The RoGS Fire Services Financial and Staff Data Dictionary has been prepared by the Emergency Management Working Group (EMWG), with assistance from Australasian Fire Authorities Council (AFAC) members.

The data are requested and submitted to the Secretariat in accordance with the authority of the terms of reference of the Review of Government Service Provision.

#### Relevance

The indicator is available for all fire service organisations in Australia, by State and Territory.

All else being equal, lower expenditure per person represents greater efficiency. However, efficiency data are difficult to interpret. While high or increasing expenditure per person may reflect deteriorating efficiency, it may also reflect changes in aspects of the service (such as improved response) or the characteristics of fire events (such as more challenging fires). Similarly, low or declining expenditure per person may reflect improving efficiency or lower quality responses or less challenging fires.

Expenditure per person is employed as a proxy for efficiency. Expenditure per fire is not used as a proxy for fire service organisation efficiency because an organisation that applies more resources to the prevention and preparedness components to reduce the number of fire incidents could erroneously appear to be less efficient.

Care needs to be taken when comparing efficiency data across jurisdictions because there are differences in the reporting of a range of cost items and funding arrangements (funding policies and taxing regimes). Within Australia different jurisdictions have selected different funding models to provide resourcing to fire service organisations. For example, have a greater proportion of government funding relative to levies compared with other jurisdictions. Also, differences in geographic size, terrain, climate, and population dispersal may affect costs of infrastructure and numbers of service delivery locations per person.

#### **Timeliness**

Fire services expenditure per person are published annually for the latest financial year preceding the January release of each RoGS.

#### Accuracy

Fire service organisation financial data are collected from all each fire service organisation in Australia according to agreed definitions.

Not all of the contributing fire service organisations collect all of the data because:

- each fire service has different legislated roles and responsibilities, environments and history of reporting and therefore have developed processes relevant to their business.
- in several jurisdictions it is difficult to consolidate the financial arrangements of the umbrella departments, fire service providers, and land management agencies. A summary of the scope of each jurisdiction's financial reporting is provided in table 9A 3

Jurisdictions have reported variations from the data dictionary with respect to:

 Umbrella departments — Only one jurisdiction (WA) have indicated that their financial data covers the fire events activities of their umbrella department. This is on account of the fact that in WA the Department of Fire and Emergency Services is both the fire service provider and the umbrella department.

No jurisdiction attempts to apportion the expenditure of the umbrella department to the fire service organisation.

• Fire service providers — All jurisdictions provide data on the expenditure of their fire service provider, which is assumed to be the largest component of fire service organisation expenditure.

However, due the different roles of fire service providers in each jurisdiction, differences are apparent in what activities the financial data cover. Variations from the data definitions scope include:

- Vic: costs exclude the activities of the Emergency Services
   Telecommunications Authority (which provide dispatch and other support
   services to Victorian emergency service providers).
- Qld:
  - costs are likely to include the total costs of the Queensland Fire and Emergency Services (QFES), which provides a wide range of emergency services under an integrated management structure. Data cannot be segregated by service and will include State Emergency Service and volunteer marine services as well as fire services.
  - costs are likely to exclude the Public Safety Business Agency (PSBA), which provides support functions (business and corporate) to emergency service providers in including QFES.

- WA: the fire service provider costs includes the total costs of the DFES, which
  provides a wide range of emergency services under an integrated
  management structure. WA indicate that data cannot be segregated by
  service and includes State Emergency Service and volunteer marine services
  as well as fire services.
- SA: the fire service provider costs exclude the activities of the SA Fire and Emergency Services Commission, which provides fire support services.
- Land management agencies only three jurisdictions (NSW, Victoria and the ACT) have indicated that their financial data covers the fire events activities of their land management agencies.

#### Coherence

Each State and Territory government maintains their own systems, processes, and training for estimation.

Any time series changes are identified with relevant footnotes.

#### **Accessibility**

Fire services expenditure per person data are publicly available on the Productivity Commission's website from the time of RoGS publication.

#### Interpretability

Copies of the complete Fire Services Financial and Staff Data Dictionary are available upon request through the Secretariat.

Text caveats and chapter footnotes provide additional commentary on data quality, as do the footnotes in the relevant attachment tables.

#### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following issue:

- Expenditure per person is employed as a proxy for efficiency.
- Care needs to be taken when comparing efficiency data across jurisdictions because there are differences in the reporting of a range of cost items and funding arrangements (funding policies and taxing regimes).
- Not all of the contributing fire service organisations collect all of the data because:
  - each fire service has different legislated roles and responsibilities, environments and history of reporting and therefore have developed processes relevant to their business
  - in several jurisdictions it is difficult to consolidate the financial arrangements of the umbrella departments, fire service providers, and land management agencies. A summary of the actual scope of jurisdiction's financial reporting is provided in table 9A.3.

#### Fire death rate

#### Annual fire death rate

Data quality information for this indicator has been drafted by the Secretariat in consultation with the ABS, with additional Steering Committee comments.

#### **Indicator definition and description**

Element Outcomes
Indicator Fire death rate

Measure (computation)

This indicator is defined as the number of deaths from fire:

<u>Numerator</u>

The following International Classification of Diseases (ICD) codes are aggregated to define the data set:

- Exposure to smoke, fire and flames (ICD X00 X09) as follows:
  - ICD X00 Exposure to uncontrolled fire in building or structure
  - ICD X01 Exposure to uncontrolled fire, not in building or structure
  - ICD X02 Exposure to controlled fire in building or structure
  - ICD X03 Exposure to controlled fire, not in building or structure
  - ICD X04 Exposure to ignition of highly flammable material
  - ICD X05 Exposure to ignition or melting of nightwear
  - ICD X06 Exposure to ignition or melting of other clothing and apparel
  - ICD X08 Exposure to other specified smoke, fire and flames
  - ICD X09 Exposure to unspecified smoke, fire and flames
- Intentional self-harm by smoke, fire and flames (ICD X76)
- Assault by smoke, fire and flames (ICD X97)
- Exposure to smoke, fire and flames, undetermined intent (ICD Y26)

### **Denominator**

Population by State and Territory and Australian total

The measure is expressed by State and Territory and Australian total, by ICD code detail and total, as an annual, and a three year rolling weighted average rate per million people.

#### Data source

#### **Numerator**

ABS Causes of Death, Australia, Cat. no. 3303.0 (Underlying causes of death, State and Territory tables, published and unpublished data).

#### **Denominator**

ABS Estimated Residential Population, Cat. no. 3101.0 (for more detail about the population data used in the Report see RoGS Statistical context (chapter 2, table 2A.2).

#### **Data Quality Framework dimensions**

## Institutional environment

The Causes of Death collection is published by the Australian Bureau of Statistics (ABS), with data sourced from deaths registrations administered by the various State and Territory Registrars of Births, Deaths and Marriages. It is a legal requirement of each State and Territory that all deaths are registered.

The ABS operates within a framework of the Census and Statistics Act 1905 and the Australian Bureau of Statistics Act 1975. These Acts ensure the confidentiality of respondents and ABS' independence and impartiality from political influence. For more information on the institutional environment of the ABS, including the legislative obligations of the ABS, financing and governance arrangements, and mechanisms for scrutiny of ABS operations, please see ABS Institutional Environment.

#### Relevance

The ABS Causes of Death collection includes all deaths that occurred and were registered in Australia, including deaths of persons whose usual residence is overseas. Deaths of Australian residents that occurred outside Australia may be registered by individual Registrars, but are not included in ABS deaths or causes of death statistics.

Data in the Causes of Death collection include demographic items, as well as Causes of Death information coded according to the ICD. The ICD is the international standard classification for epidemiological purposes and is designed to promote international comparability in the collection, processing, classification, and presentation of cause of death statistics. The classification is used to classify diseases and causes of disease or injury as recorded on many types of medical records as well as death records. The ICD has been revised periodically to incorporate changes in the medical field. The 10th revision of ICD (ICD-10) has been used since 1997.

#### **Timeliness**

Causes of Death data are published on an annual basis.

Death records are provided electronically to the ABS by individual Registrars on a monthly basis for compilation into aggregate statistics on a quarterly and annual basis. One dimension of timeliness in death registrations data is the interval between the occurrence and registration of a death. As a result, a small number of deaths occurring in one year are not registered until the following year or later.

Preliminary Estimated Residential Population (ERP) data are compiled and published quarterly and are generally made available five to six months after the end of each reference quarter. Commencing with data for September quarter 2006, revised estimates are released annually and made available 21 months after the end of the reference period for the previous financial year, once more accurate births, deaths and net overseas migration data becomes available. In the case of births and deaths, the revised data are compiled on a date of occurrence basis. In the case of net overseas migration, final data are based on actual traveller behaviour. Final estimates are made available every 5 years after a census and revisions are made to the previous inter-censal period. ERP data are not changed once finalised. Releasing preliminary, revised and final ERP involves a balance between timeliness and accuracy.

#### **Accuracy**

All ERP data sources are subject to non-sampling error. Non-sampling error can arise from inaccuracies in collecting, recording and processing the data. In the case of Census and Post Enumeration Survey (PES) data, every effort is made to minimise reporting error by the careful design of questionnaires, intensive training and supervision of interviewers, and efficient data processing procedures.

For the Causes of Death collection, which constitutes a complete census of the population, non-sample errors are most likely to influence accuracy. Non-sample error arises from inaccuracies in collecting, recording and processing the data. The most significant of these errors are: misreported data items; deficiencies in coverage; incomplete records; and processing errors. Every effort is made to minimise non-sample error by working closely with data providers, running quality checks throughout the data processing cycle, training of processing staff, and efficient data processing procedures.

The ABS has implemented a new revisions process that applies to all coroner certified deaths registered after 1 January 2006. This is a change from previous years where all ABS processing of causes of death data for a particular reference period was finalised approximately 13 months after the end of the reference period. The revisions process enables the use of additional information relating to coroner certified deaths as it becomes available over time, resulting in increased specificity of the assigned ICD-10 codes. See Explanatory Notes 29-33 and Technical Notes, Causes of Death Revisions, 2006 in *Causes of Death, Australia*, 2010 (cat. no. 3303.0) and Causes of Death Revisions, 2010 and 2011 in *Causes of Death, Australia*, 2012 (cat. no. 3303.0), for further information on the revision process.

Some rates are unreliable due to small numbers of deaths over the reference period. All rates in this indicator must be used with caution.

#### Coherence

The ABS provide source data for the numerator and denominator for this indicator.

#### Accessibility

Causes of Death data are available in a variety of formats on the ABS website, www.abs.gov.au, under Causes of Death, Australia (Cat. no 3303.0).

ERP data are available in a variety of formats on the ABS website, www.abs.gov.au, under the 3101.0 and 3201.0 product families.

Further information on deaths and mortality may be available on request. The ABS observes strict confidentiality protocols as required by the Census and Statistics Act (1905). This may restrict access to data at a very detailed level.

#### Interpretability

Data for this indicator are presented as crude rates, per million estimated resident population, and as three year rolling averages due to volatility of the small numbers involved.

Information on how to interpret and use the cause of death data is available from the Explanatory Notes in Causes of Death, Australia (Cat. no 3303.0).

Small value data are randomly adjusted to avoid the release of confidential data.

Causes of death statistics for states and territories have been compiled in respect of the state or territory of usual residence of the deceased, regardless of where in Australia the death occurred and was registered.

The ERP is Australia's population reported by state and territory and by place of usual residence.

#### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following key data gaps/issues:

- Timeliness data available for the Report on Government Services are delayed by one reference year. This is due to a trade-off between accuracy and timeliness.
- Volatility due to the small numbers of fire deaths annually, there is a high level
  of volatility in reported indicator rates. It is important therefore to assess longer
  term trends where data are available.
- · Completeness
  - Due to the impact of registration lags, processing lags and duplicate records.
  - Extent of coverage of the population (while all deaths are legally required to be registered some cases may not be registered for an extended time, if at all).
- Accuracy
  - Some lack of consistency in the application of questions or forms used by administrative data providers.
  - The level of specificity and completeness in coronial reports or doctor's findings on the Medical Certificate of Cause of Death.
  - Errors in the coding of the causes of a death to ICD-10. The majority of cause of death coding is undertaken through an automated coding process, which is estimated to have a very high level of accuracy. Human coding can be subject to error, however the ABS mitigates this risk through rigorous coder training, detailed documentation and instructions for coding complex or difficult cases, and extensive data quality checks.
  - Cases where coronial proceedings remain open at the end of ABS processing for a reference period are potentially assigned a less specific ICD-10 cause of death code.
  - Where coroner certified deaths become closed during the revisions process, additional information is often made available, making more specific coding possible.

### Landscape fire death rate

Data quality information for this indicator has been drafted by the Secretariat in consultation with AFAC, with additional Steering Committee comments.

#### **Indicator definition and description**

**Element** Outcomes Indicator Fire death rate

Measure (computation)

<u>Numerator</u>

The number of people killed by landscape fires in the jurisdiction during the defined period times one million.

Denominator:

The estimated resident population for the jurisdiction on 31 December during the

defined period.

Data source Numerator

AFAC Landscape Fire Deaths Database [Dated] that contains data sourced from media

reports, agency reports, PerilAus from Risk Frontiers and NCIS records.

**Denominator** 

ABS Estimated Residential Population (ERP) 3101.0 (for more detail about the population data used in the Report see RoGS Statistical context (chapter 2, table 2A.2).

#### **Data Quality Framework dimensions**

## Institutional environment

AFAC maintains the Landscape Fire Deaths database on behalf of its members. It has a formal data access agreement with the Victorian Institute of Forensic Medicine to use records in the National Coroners Information System. Data sharing arrangements are in place with the Bushfire CRC that first compiled the data from the PerilAus data held by Risk Frontiers. The original data has been modified for Bushfire CRC research objectives and more recently for the Landscape Fire Performance Measures project. There is no legislative framework for the existence of the data.

The estimated resident data are from the ABS that operates within a framework of the Census and Statistics Act 1905 and the Australian Bureau of Statistics Act 1975. These ensure the independence and impartiality from political influence of the ABS, and the confidentiality of respondents.

#### Relevance

The Landscape Fire Deaths Database contains records of every death that has been attributed to a landscape fire.

Landscape fires include all planned and unplanned fires burning outside in vegetation fuels. They exclude campfires and receptacle fires.

A death that is attributed to a landscape fire as confirmed by a coroner or inquest or provisionally by the incident controller. Unconfirmed deaths are recorded as provisional until an inquest or finding is completed. Included are deaths travelling to and from fires and the full range of causes not just heat, fire and smoke. Unborn babies are excluded as are intentional self-harm, assault or murder.

The data contain other data elements that allow for analysis of the reasons, background and activities associated with the incident.

The data contains all known records back to July 2003 and all known civilian deaths back to 1900.

The indicator is titled Landscape fire death rate because although the term bushfire is more recognisable than Landscape fire the former has the correct technical meaning. Bushfires are an entire sub set of Landscape fires which also includes planned fires. Deaths from planned fires are included in the deaths data.

#### **Timeliness**

The data are added periodically and continually. The NCIS is interrogated annually to find any additional records and to confirm the status of any provisional records.

Historic records are periodically reviewed to add known firefighter deaths.

Releasing preliminary, revised and final ERP involves a balance between timeliness and accuracy.

#### Accuracy

The deaths data are considered accurate although it has many sources and contains both provisional and confirmed records. The number of deaths from landscape fires is well known within the industry and each record can be confirmed from multiple sources.

All ERP data sources are subject to non-sampling error. Non-sampling error can arise from inaccuracies in collecting, recording and processing the data. In the case of Census and Post Enumeration Survey (PES) data, every effort is made to minimise reporting error by the careful design of questionnaires, intensive training and supervision of interviewers, and efficient data processing procedures.

The records will change over time as there can be a two year delay between the death and the coronial finding. Provisional records may be later eliminated and new records added for deaths that were unknown to incident controllers.

The actual numbers can be reported and there is no requirement to randomise small numbers.

The data back to 2003 has been thoroughly researched and most records are confirmed from multiple sources.

The same data for civilian deaths from a previous source was submitted as evidence to the Victorian Bushfire Royal Commission.

#### Coherence

The management of the database by AFAC on behalf of 29 contributing agencies provides coherence.

The ABS provides the denominator for this indicator with reliable coherence.

#### Accessibility

The Landscape Fire Deaths Database contains personal identification information. This is essential in being able to eliminate potential duplicate records from different sources for the same death. There are privacy issues in being able to access the NCIS and all reported uses of the data must be de-identified. The privacy concerns are managed by restricting access to the data with the identities retained. Analysed and de-identified data can be freely accessed although its uses must be reported to the Victorian Institute of Forensic Medicine.

ERP data are available in a variety of formats on the ABS website, www.abs.gov.au, under the 3101.0 and 3201.0 product families.

#### Interpretability

Data for this indicator are controlled by a comprehensive Data Dictionary. Every element is defined as fully as possible. There are still some interpretations required to record a death. The degree to which the fire contributed to the death is interpreted by the coroner and then again at the time of data entry.

Data are reported by jurisdiction of the incident irrespective of the home location of the deceased.

#### Data Gaps/Issues Analysis

# Key data gaps/issues

The Steering Committee notes the following key data gaps/issues:

Volatility — due to the small numbers of fire deaths annually, there is a high level
of volatility in reported indicator rates. It is important therefore to assess longer
term trends where data are available. A five year rolling average will be
investigated. The impact of the Black Saturday fires will remain as a spike in the
data for a number of years. Spikes in the trends have occurred on about a 30 year
cycle. Longer term trends can also be investigated. Recent research has indicated
that the 1939 fires killed more people per population than Black Saturday 2009 so
there may be a long term downward trend.

## Fire injury rate

#### Annual fire hospitalisation rate

Data quality information for this indicator has been sourced from the AIHW with additional Steering Committee comments.

#### **Indicator definition and description**

**Element** Outcomes

Indicator Annual fire hospitalisation rate

Measures (computation)

The *numerator* is the number of hospital separations for people who sustained injuries from smoke, fire or flames.

The following International Classification of Diseases (ICD) codes are aggregated to define the data set:

- Exposure to smoke, fire and flames (ICD X00 X09) as follows:
  - ICD X00 Exposure to uncontrolled fire in building or structure
  - ICD X01 Exposure to uncontrolled fire, not in building or structure
  - ICD X02 Exposure to controlled fire in building or structure
  - ICD X03 Exposure to controlled fire, not in building or structure
  - ICD X04 Exposure to ignition of highly flammable material
  - ICD X05 Exposure to ignition or melting of nightwear
  - ICD X06 Exposure to ignition or melting of other clothing and apparel
  - ICD X08 Exposure to other specified smoke, fire and flames
  - ICD X09 Exposure to unspecified smoke, fire and flames

Intentional self-harm by smoke, fire and flames (ICD X76)

- Assault by smoke, fire and flames (ICD X97)
- Exposure to smoke, fire and flames, undetermined intent (ICD Y26)

The *denominator* is the Estimated Resident Population.

A separation is an episode of care for an admitted patient, which can be a total hospital stay (from admission to discharge, transfer or death), or a portion of a hospital stay beginning or ending in a change of type of care (for example, from acute care to rehabilitation).

Calculation is 100 000  $\times$  (Numerator  $\div$  Denominator), presented as a number per 100 000.

#### Data source

<u>Numerator</u>: This indicator is calculated using data from the NHMD, based on the National Minimum Data Set for Admitted Patient Care.

#### <u>Denominator</u>:

For total population: Australian Bureau of Statistics (ABS) Estimated Resident Population (ERP) as at 31 December as a midpoint of the reference period.

#### Computation:

1000 × (Numerator ÷ Denominator), presented as a rate.

#### **Data Quality Framework dimensions**

# Institutional environment

The Australian Institute of Health and Welfare (AIHW) has calculated this indicator.

The Institute is an independent statutory authority within the Health and Ageing portfolio, which is accountable to the Parliament of Australia through the Minister for Health. For further information see the AIHW website.

The data were supplied to the Institute by state and territory health authorities. The state and territory health authorities received these data from public hospitals. States and territories use these data for service planning, monitoring and internal and public reporting. Hospitals may be required to provide data to states and territories through

a variety of administrative arrangements, contractual requirements or legislation.

States and territories supplied these data under the terms of the National Health Information Agreement, available online at:

www.aihw.gov.au/WorkArea/DownloadAsset.aspx?id=6442472807&libID =6442472788

#### Relevance

The purpose of the NMDS for Admitted patient care is to collect information about care provided to admitted patients in Australian hospitals. The scope of the NMDS is episodes of care for admitted patients in essentially all hospitals in Australia, including public and private acute and psychiatric hospitals, free-standing day hospital facilities, alcohol and drug treatment hospitals and dental hospitals. Hospitals operated by the Australian Defence Force, corrections authorities and in Australia's off-shore territories are not included. Hospitals specialising in ophthalmic aids and other specialised acute medical or surgical care are included.

The hospital separations data do not include episodes of non-admitted patient care provided in outpatient clinics or emergency departments.

There are a range of other burn related injuries excluded from the fire injuries data. These include:

- Contact with heat and hot substances.
- Injuries due to Explosion and rupture of boilers, Explosion and rupture of gas cylinder, Discharge of fireworks, Explosion of other materials (for example, munitions, blasting material), Exposure to electric current, Exposure to excessive heat of man-made origin, Exposure to sunlight, or Exposure to lightning, Intentional self-harm by steam, hot vapours and hot objects, Assault by means of explosive material, Assault by steam, hot vapours and hot objects.

#### **Timeliness**

The reference periods for this data set are 2003-04 to 2012-13.

### Accuracy

For most years the coverage of the NHMD is essentially complete. Data are not available for some years for a few small public hospitals in some jurisdictions. For 2012-13, all public hospitals were included except for a small mothercraft hospital in the Australian Capital Territory. Private hospital data were not provided for private free-standing day hospital facilities in the Australian Capital Territory, the Northern Territory and a private free-standing day hospital in Victoria. (Information on the coverage of the NHMD in other years is available online at www.aihw.gov.au/hospitals-data/national-hospital-morbidity-database/ for details).

Variations in admission practices and policies lead to variation among providers in the number of admissions for some conditions.

Cells have been suppressed to protect confidentiality (where the presentation could identify a patient or a single service provider) or where rates are likely to be highly volatile (for example, the denominator is very small).

#### Coherence

For 2010-11, NT data are not available and are excluded from the Australian total. With this exception, data for this indicator are comparable over time.

#### Accessibility

The AIHW provides a variety of products that draw upon the NHMD. Published products available on the AIHW website are:

- Australian hospital statistics with associated Excel tables.
- Interactive data cube for Admitted patient care (for Principal diagnoses, Procedures and Diagnosis Related Groups).

Some data are also included on the MyHospitals website.

## Interpretability

Supporting information on the quality and use of the NHMD are published annually in *Australian hospital statistics* (technical appendixes), available in hard copy or on the AIHW website. Readers are advised to read caveat information to ensure appropriate interpretation of the performance indicator. Supporting information includes discussion of coverage, completeness of coding, the quality of Indigenous data, and changes in service delivery that might affect interpretation of the published data. Metadata information for the NMDS for Admitted patient care are published in the AIHW's online metadata repository — METeOR, and the National health data dictionary.

## **Data Gaps/Issues Analysis**

# Key data gaps /issues

The Steering Committee notes the following issues:

The hospital separations data do not include episodes of non-admitted patient care provided in outpatient clinics or emergency departments.

## Confinement to room/object of origin

Data quality information for this indicator has been drafted by the Emergency Management Working Group in consultation with the Australasian Fire and Emergency Service Authorities Council (AFAC), with additional Steering Committee comments.

#### **Indicator definition and description**

**Element** Outcomes

Indicator Confinement to room/object of origin

Measure (computation)

There are two measures of Confinement to room/object of origin:

- · confinement of building fires to room of origin
- confinement of building and other structure fires to room/object of origin.

#### (1) Confinement of building fires to room of origin

Confinement of building fires to room of origin is a measure of the proportion of building fires confined to the room in which the fire originated, calculated as:

Numerator: the number of building fires\* confined to the object, part room and room of origin

Denominator: the number of building fires attributed to confinement

\*A building fire is a fire that has caused some damage to a building structure (such as a house).

According to the Australian Incident Reporting System (AIRS) classification this is:

A23 Type of Incident 110 – 119

where K20 Extent of Flame Damage is (1,2,3)

A23 Type of Incident 110 – 119

where K20 Extent of Flame Damage is (1 to 7)

\* 100

#### (2) Confinement of building and other structure fires to room/object of origin

Confinement of building and other structure fires to room/object of origin is a measure of the both the proportion of building fires and other structure fires\* confined to the room/object from which the fire originated, calculated as:

Numerator: the number of building and other structure fires\* confined to the object, part room and room of origin

Denominator: the number of building fires attributed to confinement

\*Other structure fires are fires within a building structure (such as fires confined to rubbish bins, burnt foodstuffs and fires confined to cooking equipment) that requires a fire service response.

According to the AIRS classification this is:

A23 Type of Incident 110 – 129

where K20 Extent of Flame Damage is (1,2,3)

A23 Type of Incident 110 – 129

where K20 Extent of Flame Damage is (1 to 7)

\* 100

Data source

State and Territory governments. The Secretariat collects data directly from all jurisdictions.

Within each jurisdiction, fire service and emergency services organisations collect and compile data.

#### **Data Quality Framework dimensions**

## Institutional environment

Confinement data are collected by fire and emergency service organisations in each State and Territory according to the AIRS.

The AIRS is a nationally agreed data standard. It takes a systematic approach to collecting, recording and reporting information about responses to incidents and emergencies attended primarily by fire services. It provides a standard for the structure, definitions and integrity of the data collected.

The AFAC Australian Incident Reporting System (AIRS) User Network is responsible for sustaining the production and currency of AIRS data and support the continued development of data requirements to ensure consistent and reliable methods of data collection, compilation and analysis can be applied throughout member agencies. For further information about the AFAC knowledge data base see the AFAC National Data and Glossary.

Not all of the contributing fire and emergency services collect all of the data because each fire service has different legislated roles and responsibilities, environments and history of reporting and therefore have developed processes relevant to their business.

The data are requested and submitted to the Secretariat in accordance with the authority of the terms of reference of the Review of Government Service Provision.

#### Relevance

Confinement of building fires to room of origin is reflective of the response strategies of the fire services to extinguish structure fires before they cause extensive building damage. It also reflective of the community's overall mitigation and preparedness strategies such as constructing buildings that are fire resistant, installing and maintaining operational smoke alarms, and other fire safety practises.

Other structure fires confined to object of origin is reflective of the community's overall mitigation and preparedness strategies such as constructing 'objects' (such as electronic appliances, cooking equipment, and chimneys) that are fire resistant. It is also reflective of the community's response abilities to contain a fire by having working fire alarms, fire extinguishers and/or fire blankets.

#### **Timeliness**

Confinement to room/object of origin data are published annually for the latest financial year preceding the January release of each RoGS.

#### **Accuracy**

Text caveats in the RoGS provide generalised advice that data are not strictly comparable and cite a number of physical, operational and data collection system factors that influence confinement data:

- Confinement data are not collected for all incident responses and excludes records where the extent of flame damage is not recorded or zero.
- The calculation of this measure has been amended over time and therefore the results are not fully comparable between years.
- Confinement data a collected separately by most jurisdictions' urban and rural fire service organisations — which also consist of volunteer and career/permanent personnel.
- Confinement data from rural/volunteer fire services are not available in all jurisdictions.

In practice there are differences in the method between (and within) jurisdictions to estimate confinement of structure fire data. Each jurisdiction's approach is summarised in the confinement of structure fire appendix, including approaches to:

- confinement rate calculation (table 11)
- data completeness (table 12)
- extrapolation and estimation (table 13).

#### Coherence

Each State and Territory government maintains their own systems, processes, and training for estimation of confinement to room/object of origin in accordance with AIRS. Any time series changes are identified with relevant footnotes.

#### Accessibility

Structure fire confinement rate data are publicly available on the Productivity Commission's website from the time of RoGS publication.

Interested parties, particularly researchers, may request access to unpublished portions of the AFAC Knowledge data base's Core Data (de-identified unit record data) to undertake their own statistical analysis for particular research and/or projects. For more information about access to national data see AFAC data requests.

# Interpretability

Copies of the complete AFAC AIRS data standard, 1997, are available upon request through AFAC.

The AFAC knowledge web provides links to a range of related statistics to enable a better understanding of how interrelationships between socio-demographic, economic, geographic and environmental factors influence emergency incidents.

Text caveats and chapter footnotes provide additional commentary on data quality, as do the footnotes in the relevant attachment tables.

#### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following key data gaps/issues:

- Confinement of structure fires to room/object of origin is identified on the three point comparability scale as 'not complete or not directly comparable'.
- Text caveats note the need for of confinement to room/object of origin to be interpreted with caution because the data are not strictly comparable across jurisdictions.'

A number of factors are identified as contributing to this lack of comparability, but without detailed analysis of such factors.

The following tables are a summary of each jurisdiction's compliance in calculating the of confinement of structure fires to room/object of origin.

Table 11 Confinement rate calculation			
	Complies with definition	Jurisdiction's interpretation and/or application of definition that may impac on comparability	
NSW	Yes	No further information.	
Vic	Yes	No further information.	
Qld	Yes	Structure fires within the Urban Levy Boundary are included.	
		Excluded are non-emergency calls and those where QFES experience delays due to either extreme weather conditions or where the initial response was by another agency or brigade.	
WA	Yes	Blanks in both the numerator and denominator are excluded. Only structure fires originating inside a building are included in the calculation.	
SA	na	na	
Tas	Yes	All fires coded as a 'building fire' (AIRS code A23 Type of Incident 110 – 119)	
		are included.	
		Blanks in both the numerator and denominator are excluded.	
ACT	Yes	Blanks in both the numerator and denominator are excluded.	
NT	na	na	

Table	12	Data co	ompleteness	
	Voluntee data incl	r brigade uded?	Urban and rural areas included	Other information relating to data completeness
NSW	Yes		Yes	No further information.
Vic	na		na	
Qld	Partial — voluntee Urban Le Boundar	rs enter an	Yes — where Urban Levy Boundaries are in rural areas.	Accurate identification by QFES Rural brigades (volunteers) is not possible at this stage due to incomplete voluntary reporting procedures.
WA	Yes		Yes	Incidents where there are blanks or zeros are excluded from calculation in both the numerator and denominator.
SA	na		na	
Tas	Yes		Yes	No further information.
ACT			Yes	Volunteer data are not applicable in the ACT
NT	na		na	
na Not	available.	Not applic	cable.	
Source	: State and	l Territory g	overnments.	

Table 13 Extrapola		Extrapola	ation and estimation responses	
		confinement timated/ lated	If so explain the rationale and method used	
NSW	No		When reporting on incidents coded as 'other building fire' (A23 Type of Incident 120 – 129), it is assumed that where fires are confined to non-combustible containers, such as foodstuffs burnt or cooking equipment, there is no flame damage or damage is confined to the object of origin.	
Vic	na		na	
Qld	No		When reporting on incidents coded as 'other building fire' (A23 Type of Incident 120 – 129), it is assumed that there is either no flame damage or damage confined to the object of origin.	
WA	Yes / N	0	When reporting on incidents coded as 'other building fire' (A23 Type of Incident 120 – 129), it is assumed that there is either no flame damage or damage confined to the object of origin.	
SA	na		na	
Tas	No		When reporting on incidents coded as 'other building fire' (A23 Type of Incident $120-129$ ), it is assumed that there is either no flame damage or damage confined to the object of origin.	
ACT	No		No further information.	
NT	na		na	

na Not available.

#### Value of asset losses from fire events

#### Value of insurance claims from fire events

Data quality information for this indicator has been drafted by the Secretariat in consultation with EMWG, with additional Steering Committee comments.

#### **Indicator definition and description**

**Element** Outcomes

Indicator Value of asset losses from fire events

Measure (computation)

(1) Average domestic insurance claim from fire events

Numerator: Incurred cost of domestic claims

Denominator: Total number of domestic claims

(2) Total commercial/domestic insurance claims from fire events per person

Numerator: Incurred cost of domestic/commercial claims

Denominator: Population of a state and territory.

Data source Insurance claims

ISA Database (2014), unpublished

Population of state of territory

Australian Bureau of Statistics (ABS) 2014 and previous years, *Australian Demographic Statistics*, *December 2014* (Cat. no. 3101.0). (for more detail about the population data used in the Report see RoGS Statistical context (chapter 2, table 2A.2).

#### **Data Quality Framework dimensions**

## Institutional environment

Insurance Statistics Australia (ISA) was established in 1988 by Australian insurance companies to produce management information of relevance to the pricing and profitability of selected classes of insurance business. ISA manages data on behalf of the ISA and Insurance Council of Australia.

ISA is managed by a board of directors drawn from participating insurance companies. Finity Consulting acts as the Manager of ISA.

#### Relevance

The data collected by ISA provide a measurable impact of selected emergency events on the community. The data also allow for estimates of assets lost against several classes of emergencies.

ISA data relate to those members of the community that have household and/or commercial insurance. ISA insurance data are available for:

- Domestic Household relates to building and/or contents cover for householders or house owners. For strata units, contents cover is included but building cover is excluded.
- Commercial Property cover for commercial property premises, which can cover loss and/or damage to buildings, contents, machinery, stock and loss of profits.

For each class of insurance the following data may be available: Incurred cost of claims; Domestic Total Number of Policies; Domestic Total Number of Claims; Average Premium; Average Sum Insured; Claim Frequency; Average Claim Size; Cost per Policy; and Loss Ratio.

ISA data are available for the following geographic dissections:

- Domestic Household state and territory
- Commercial Property Australia total, but not by state and territory.

#### **Timeliness**

Data are available for financial year and calendar year.

- Domestic Household data are submitted by direct insurers within three weeks following the end of March, June, September, and December each year. Reports are also produced quarterly
- Commercial Property data are submitted by insurers within 4 weeks following the end of June and December each year. Reports are produced biannually.

Reports are available approximately four months after the reference period.

#### **Accuracy**

The ISA data are the actual cost to insurers. As administrative data they are not subject to sampling error. Total claims incurred will misstate the total value of assets lost due to:

- under insurance under insurance will lead to the value of asset loss data to be
  under stated. Insurance payouts are limited by the estimated value of assets a
  policy holder provides when taking out insurance. Where they have
  under-estimated their assets the cost to the insurer will be below total losses to
  the policy holder
- ISA market share ISA data are incomplete, in that they only cover ISA members that submit insurance data returns. The ISA estimates that their data cover approximately 80 per cent of the Domestic Household market and 60 per cent of the Commercial Property market.
- new for old new for old policies will lead to the value of asset loss data to be
  over stated. New for old policies replace a lost 'old' asset for a 'new' equivalent
  asset. Given that most assets depreciate, the replacement item would ordinarily
  have a greater value than the item it replaces
- excess policy excess policies will lead to the value of asset loss data to be under stated. To avoid having to process too many small claims, most insurance policies require policy holders to pay an 'excess'. This will mean that most small incidents will not be recorded in the insurance data.

#### Coherence

Insurance companies must adhere to common accounting practices for insurance companies, and provide data to the ISA according to an agreed classification system.

The ISA data should relate to the published emergency event series already published in the Emergency management sector overview, however further work is required to validate their coherence.

### Accessibility

Information supplied by ISA is generally free of charge for government organisations. However, data requests are subject to approval by the Board of ISA. Before ISA can provide data, details must be provided of what the data will be used for. ISA's written permission is required for anything that will be circulated externally.

#### Interpretability

The ISA publishes an *Operations Guidebook*, which documents the key collection processes, standards and classifications. The guidebook is available at: http://www.insurancestats.com.au/objectives.html

### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following key data gaps/issues:

• Data need to be interpreted with caution as actual asset losses may differ from incurred claims due to: under insurance, market share, new for old, and excess policy (see accuracy dimension).

## **Emergency services for ambulance events**

## **Response Locations**

Data quality information for this indicator has been drafted by the Secretariat in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

### Indicator definition and description

**Element** Equity — Access

**Indicator** 'Response locations' is defined as the number of paid (or salaried), mixed and volunteer

response locations per 100 000 people.

Measure (computation)

Numerator: Number of ambulance response locations

The total number of separate sites or response locations operated (either owned, leased or occupied) by the ambulance service and serviced by either an ambulance general purpose, special operations vehicles, salaried ambulance operatives or volunteer ambulance operatives.

Response locations excludes both ambulance community and third party first responder locations.

Denominator: Estimated resident population

Source: Australian Demographic Statistics (ABS Cat. no. 3101.0). For further information

see Statistical context (chapter 2, table 2A.2).

**Data source** Consolidated Returns, Council of Ambulance Authorities (CAA)

#### **Data Quality Framework dimensions**

## Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission use in the RoGS.

#### Relevance

The indicator is available for all statutory ambulance services in Australia, by State and Territory.

The CAA Consolidated Returns collects data for:

- Ambulance response locations
  - Ambulance response locations with paid staff only
  - Ambulance response locations with mix of paid staff and volunteer staff
  - Ambulance response locations with volunteer staff only
- Communication centres
- Other Locations
  - Educational centres
  - Administrative centres
  - Fleet management centres

This indicator complements the 'availability of paramedics' indicator, as some jurisdictions' ambulance workforce comprises a large proportion of volunteers, particularly in rural and remote locations.

#### **Timeliness**

Response location data are published annually for the latest financial year preceding the January release of each RoGS.

#### **Accuracy**

The CAA Consolidated Returns compile administrative data from all statutory providers

of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

#### Coherence

All data (numerators and denominators) are sourced from the CAA Consolidated Returns.

Estimates from the CAA Consolidated Returns are comparable over time and between

jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the CAA and are the same for all state and territory services.

#### **Accessibility**

The response locations data are made publicly available annually as part of the CAA Annual Report on the CAA website (www.caa.net.au).

# Interpretability

The response locations data are publicly available and includes definitions of the collected data.

#### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following issues:

- Some jurisdictions do not satisfy the criteria for all the staffing categories.
- The data definition for response locations are collected under a revised data definition to exclude first responder locations.

## Availability of ambulance officers/paramedics

Data quality information for this indicator has been drafted by the Secretariat in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

#### Indicator definition and description

**Element** Equity — Access

**Indicator** Availability of ambulance officers/paramedics

Measure (computation)

Availability of ambulance officers/paramedics is defined as the number of fulltime equivalent ambulance (FTE) officers/paramedics per 100 000 people. Ambulance officers/paramedics include student and base level ambulance officers and qualified

ambulance officers but excludes patient transport officers.

Data source Consolidated Returns, Council of Ambulance Authorities (CAA)

#### **Data Quality Framework Dimensions**

Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission for use in the RoGS.

Relevance

The indicator is available for all statutory ambulance services in Australia, by State

and Territory.

The CAA Consolidated Returns collects data for each of the availability of ambulance officers/paramedics categories, as defined in the measure.

The availability of ambulance officers/paramedics represents one aspect of equity — indicating equal access of the population to essential/lifesaving government services.

**Timeliness** 

The availability of ambulance officers/paramedics data are published annually for the latest financial year preceding the January release of each RoGS.

**Accuracy** 

The CAA Consolidated Returns compile administrative data from all statutory providers of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

Coherence

All data (numerators and denominators) are sourced from the CAA Consolidated Returns

Estimates from the CAA *Consolidated Returns* are comparable over time and between jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the CAA and are the same for all state and territory services.

Accessibility

The availability of ambulance officers/paramedics data are made publicly available annually as part of the CAA Annual Report on the CAA website (www.caa.net.au).

Interpretability

The ambulance officers/paramedics data are publicly available and including definitions of the collected data.

#### **Data Gaps/Issues Analysis**

Key data gaps/issues

The Steering Committee notes that in jurisdictions that utilise a higher number of volunteers, the number of paid FTE ambulance officers may be lower — suggesting a lower level of access according to the indicator. However, volunteers are often utilised to provide ambulance access to small rural areas which have low frequency of medical emergencies. Providing paid paramedics in these locations is costly and raises issues with skills maintenance for paramedics whose caseload is low. This

indicator is complemented by the response locations indicator, which identifies jurisdictions that provide an ambulance response utilising volunteers.

# **Urban centre response times**

Data quality information for this indicator has been drafted by the Secretariat in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

# Indicator definition and description

**Element** Equity — Access

**Indicator** Urban centre response times

Measure (computation)

Response times is defined as the time taken between the arrival of the first responding ambulance resource at the scene of an emergency in code 1 incidents and the initial receipt of the call for an emergency ambulance at the communications centre.

Urban centre response times are response times applied for each jurisdiction's capital city — boundaries are based on the ABS Urban Centres Localities structure.

- Capital cities Sydney, Melbourne, Brisbane, Perth, Adelaide, Hobart, Canberra and Darwin.
- Code 1 incident incident requiring at least one immediate response under lights and sirens.

Measures are provided for:

- The 50th percentile (or median) the time taken for 50 per cent of the first responding ambulance resources to arrive at the scene of an emergency is equal to or below the 50th percentile.
- The 90th percentile the time taken for 90 per cent of the first responding ambulance resources to arrive at the scene of an emergency is equal to or below the 90th percentile.

Data source

Consolidated Returns, Council of Ambulance Authorities (CAA)

### **Data Quality Framework Dimensions**

# Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission for use in the RoGS.

### Relevance

The indicator is available for all statutory ambulance services in Australia, by State and Territory.

The CAA Consolidated Returns collects data for each of the urban centre response times categories, as defined in the measure.

The Urban centre response times represents one aspect of equity — indicating the equal opportunities of access to essential government services to the population of the capital cities.

#### **Timeliness**

Urban centre response times data are published annually for the latest financial year preceding the January release of each RoGS.

# Accuracy

The CAA Consolidated Returns compile administrative data from all statutory providers of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

# Coherence

All data (numerators and denominators) are sourced from the CAA Consolidated Returns.

Estimates from the CAA *Consolidated Returns* are comparable over time and between jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the CAA and are the same for all state and territory services.

**Accessibility** 

Urban centre response times data are made publicly available annually as part of the CAA Annual Report on the CAA website (www.caa.net.au).

Interpretability

Urban centre response times data are publicly available including definitions of the collected data.

### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes that differences across jurisdictions in the geography and personnel mix can affect capital city response times data. Factors that can impact on capital city response time performance include:

- land area, and population size and density, which varies considerably across Australian capital cities
- capital city topography, road/transport infrastructure and traffic densities
- crewing configurations, response systems and processes, and travel distances.

# State-wide response times

Data quality information for this indicator has been drafted by the Secretariat in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

### **Indicator definition and description**

Element Effectiveness — Access
Indicator State-wide response times

Measure (computation)

Response times is defined as the time taken between the arrival of the first responding ambulance resource at the scene of an emergency in code 1 incidents and the initial receipt of the call for an emergency ambulance at the communications centre.

State-wide response times are response times applied for state-wide ambulance

service responses.

Code 1 incident - incident requiring at least one immediate response under lights and

sirens.

Measures are provided for:

 the 50th percentile (or median) – the time (in minutes) within which 50 per cent of the first responding ambulance resources arrive at the scene of an emergency

• the 90th percentile – the time (in minutes) within which 90 per cent of the first responding ambulance resources arrive at the scene of an emergency.

Data source

Consolidated Returns, Council of Ambulance Authorities (CAA)

#### **Data Quality Framework Dimensions**

Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission for use in the RoGS.

Relevance

The indicator is available for all statutory ambulance services in Australia, by State and Territory.

The CAA Consolidated Returns collects data for each of the state-wide response times categories, as defined in the measure.

State-wide response times represents one aspect of effectiveness — indicating access of the population to essential/lifesaving government provided services.

**Timeliness** 

State-wide response times data are published annually for the latest financial year preceding the January release of each RoGS.

Accuracy

The CAA Consolidated Returns compile administrative data from all statutory providers of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

Coherence

All data (numerators and denominators) are sourced from the CAA Consolidated

Estimates from the CAA *Consolidated Returns* are comparable over time and between jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the CAA and are the same for all state and territory services.

Accessibility

State-wide response times data are made publicly available annually as part of the CAA Annual Report on the CAA website (www.caa.net.au).

Interpretability

State-wide response times data are publicly available including definitions of the collected data.

Returns.

### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes that differences across jurisdictions in the geography, personnel mix, and system type for capturing data, affect state wide response times data. Factors that can impact on state wide response time performance include:

- the dispersion of the population (particularly rural/urban population proportions), topography, road/transport infrastructure and traffic densities
- crewing configurations, response systems and processes, and travel distances —
  for example, some jurisdictions include responses from volunteer stations (often in
  rural areas) where turnout times are generally longer because volunteers are on
  call as distinct from being on duty
- land area, and population size and density for example, data calculated on a state wide basis for some jurisdictions represent responses to urban, rural and remote areas, while others include urban centres only.

# Triple zero (000) call answer time

Data quality information for this indicator has been drafted by the Secretariat in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

### **Indicator definition and description**

Element Effectiveness — Access

Indicator Triple Zero (000) Call Answer Time

Measure (computation)

Ambulance Service triple zero (000) call answering time is defined as the time interval commencing when the Telstra Emergency Call Person (ECP) has answered the 000 call and selected the desired Emergency Service Organisation (ESO) to when the ESO has answered the call.

*Note:* data sourced from Telstra may include additional time as the Telstra Emergency Call Person ensures the call has been answered which may involve some three way conversation.

The indicator measures percentage of triple zero calls that were answered by the ambulance service communication centre staff in equal or less than 10 seconds.

- Numerator total number of triple zero (000) calls received by the ambulance service in a given financial year
- Denominator number of triple zero (000) calls answered in equal or less than 10 seconds

**Data source** 

Consolidated Returns, Council of Ambulance Authorities (CAA)

#### **Data Quality Framework Dimensions**

# Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission for use in the RoGS.

### Relevance

The indicator is available for all statutory ambulance services in Australia, by State and Territory.

The CAA Consolidated Returns collects data for each of segments – total number of 000 calls and number of calls answered in equal or less that 10 seconds.

The triple zero (000) call answer time of the ambulance service represents one aspect of effectiveness — indicating access of the population to the essential/lifesaving government services.

#### **Timeliness**

The Triple zero (000) call answer time data are published annually for the latest financial year preceding the January release of each RoGS.

### **Accuracy**

The CAA Consolidated Returns compile administrative data from all statutory providers of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

### Coherence

All data (numerators and denominators) are sourced from the CAA *Consolidated Returns*.

Estimates from the CAA *Consolidated Returns* are comparable over time and between jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the CAA and are the same for all state and territory services.

### Accessibility

The Triple zero (000) call answer time data are made publicly available annually as part of the CAA Annual Report on the CAA website (www.caa.net.au).

# Interpretability

The Triple zero (000) call answer time data are publicly available including definitions of the collected data.

# **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes that data sourced from Telstra may include additional time as the Emergency Call Person (Telstra) ensures the call has been answered which may involve some three way conversation. Some services subtract a fixed time from the Telstra reported times to allow for the time after the call is answered until the Telstra agent disconnects from the call.

# Workforce by Age Group

Data quality information for this indicator has been drafted by the Emergency Management Working Group in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

#### **Indicator definition and description**

**Element** Effectiveness — sustainability

Indicator Workforce by age group

# Measure (computation)

Workforce by age group' is defined as the age profile of the workforce, measured by the proportion of the operational workforce in 10 year age brackets (under 30, 30–39, 40–49, 50–59 and 60 and over).

#### Operational workforce

Number of ambulance services personnel who fall into the following categories.

- · Patient transport officers
- Student ambulance officers
- · Qualified ambulance officers
- Clinical other
- Communication operatives (paramedic)
- Management operational managers (paramedic) and clinical support (paramedic)

## Age group

Ambulance services personnel who fall into the following age groups:

Consolidated Returns, Council of Ambulance Authorities (CAA)

- under 30 year old,
- 30-39 year old,
- 40-49 year old,
- 50-59 year old
- 60 and over year old.

**Data Quality Framework dimensions** 

# Institutional environment

Data source

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission use in the RoGS.

### Relevance

The indicator is available for all statutory ambulance services in Australia, by State and Territory.

The CAA Consolidated Returns collects data for each of the operational workforce categories and age group, as defined in the measure.

The age profile of the ambulance service workforce represents one aspect of sustainability — indicating the proportion of the workforce closer to retirement.

#### **Timeliness**

Workforce by age group data are published annually for the latest financial year preceding the January release of each RoGS.

#### **Accuracy**

The CAA Consolidated Returns compile administrative data from all statutory providers of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

### Coherence

All data (numerators and denominators) are sourced from the CAA Consolidated Returns.

Estimates from the CAA *Consolidated Returns* are comparable over time and between jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the CAA and are the same for all state and territory services.

# Accessibility

The workforce by age group data are made publicly available annually as part of the CAA Annual Report on the CAA website (www.caa.net.au).

### Interpretability

The workforce by age group data are publicly available and includes definitions of the collected data.

# **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following issue:

 The age profile is only one aspect of workforce sustainability. Further research into understanding and measuring the profile of the ambulance workforce is required.

# Staff attrition

Data quality information for this indicator has been drafted by the Emergency Management Working Group in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

#### **Indicator definition and description**

**Element** Effectiveness — sustainability

Indicator Staff attrition

Measure (computation)

Staff attrition' is defined as the level of attrition in the operational workforce.

It is calculated as the number of FTE employees who exit the organisation as a proportion of the number of FTE employees. It is based on staff FTE defined as operational positions where paramedic qualifications are either essential or desirable to the role.

#### Operational workforce

Number of ambulance services personnel who fall into the following categories.

- · Patient transport officers
- Student ambulance officers
- Qualified ambulance officers
- · Clinical other
- Communication operatives (paramedic)
- Management operational managers (paramedic) and clinical support (paramedic)

### **Staff Attrition**

All FTE that exit the organisation during the specified financial year including resignation and retirement who fall within the categories (staff with paramedic background being either essential or desirable to the position): Patient transport officers, Student ambulance officers, Qualified ambulance officers, Clinical other, Communication operatives, and Management – operational managers and Clinical support.

**Excludes**: Staff who transfer from operational positions into non-operational positions.

**Data source** 

Consolidated Returns, Council of Ambulance Authorities (CAA)

#### **Data Quality Framework dimensions**

Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission use in the RoGS.

Relevance

The indicator is available for all statutory ambulance services in Australia, by State and Territory.

The CAA Consolidated Returns collects data for each of the operational workforce categories and staff attrition, as defined in the measure.

The ambulance service workforce staff attrition represents one aspect of sustainability — indicating the proportion of the workforce that have recently left the operational ambulance workforce. Low or decreasing levels of staff attrition are desirable.

Timeliness Staff attrition data are published annually for the latest financial year preceding the

January release of each RoGS.

Accuracy The CAA Consolidated Returns compile administrative data from all statutory providers

of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

Coherence All data (numerators and denominators) are sourced from the CAA Consolidated

Returns.

Estimates from the CAA Consolidated Returns are comparable over time and between

jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the

CAA and are the same for all state and territory services.

Accessibility The staff attrition data are made publicly available annually as part of the CAA Annual

Report on the CAA website (www.caa.net.au).

Interpretability The staff attrition data are publicly available and includes definitions of the collected

data.

# **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following issue:

- The staff attrition is only one aspect of workforce sustainability. Further research into understanding and measuring the profile of the ambulance workforce is required.
- Analysis of staff attrition should be done in conjunction with other measures including workforce by age group and the number of paramedics being trained.

# **Enrolments in accredited paramedic training courses**

Data quality information for this indicator has been drafted by the Emergency Management Working Group in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

#### **Indicator definition and description**

Element Effectiveness — sustainability

**Indicator** Enrolments in accredited paramedic training courses

Measure (computation)

'Enrolments in accredited paramedic training courses' is defined as the number of students enrolled in paramedic training courses accredited by the Paramedic Education Programs Accreditation Scheme per 100 000 people.

The indicator presents total number of students enrolled in accredited paramedic training courses.

The indicator also presents number of students enrolled in last year of accredited paramedic training courses. This segment is reported to show the number of potential new trained paramedics who will enter the workforce in the coming year.

Data source Council of Ambulance Authorities (CAA)

# **Data Quality Framework dimensions**

# Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from tertiary institutions participating in the Paramedic Education Programs Accreditation Scheme (PEPAS).

The Accreditation of entry-level paramedic education programs has 3 stages:

- Preliminary approval Preliminary approval of a new entry-level paramedic education program is sought prior to the commencement of teaching the course and approval is normally granted prior to, or commensurate with, the entry of the first cohort into the program.
- Provisional accreditation A new program that has been granted preliminary
  approval will be eligible for provisional accreditation after the first year of teaching,
  subject to successful annual review. Provisional accreditation may also be
  granted where conditions are attached following assessment for full accreditation.
- Full accreditation A program is eligible for full accreditation for a period of 5 years after the first cohorts of graduates have at least 12 months of practice experience following graduation. In 2011---12 the Accreditation project Site Evaluation Team (SET) completed 8 (eight) visits.

Sixteen universities are involved in Paramedic Education Programs Accreditation Scheme, each at various stages of accreditation or evaluation of their program/s.

The following Universities (programs) hold provisional/full accreditation:

- Monash University: Bachelor of Emergency Health (Paramedic); Bachelor of Nursing / Emergency Health (Paramedic)
- Flinders University: Bachelor of Paramedic Science
- Victoria University: Bachelor of Health Science (Paramedic)
- Queensland University of Technology: Bachelor of Health Science (Paramedic)
- Edith Cowan University: Bachelor of Science (Paramedical Science)
- Charles Sturt University: Bachelor of Clinical Practice (Paramedic)/ Bachelor of Nursing / Bachelor of Clinical Practice (Paramedic)
- Australian Catholic University: Bachelor of Nursing / Bachelor Paramedicine; Bachelor Paramedicine
- Central Queensland University: Bachelor of Paramedic Science
- University of Tasmania: Bachelor of Paramedic Practice
- University of Queensland: Bachelor of Paramedic Science.

Relevance The indicator is available for tertiary institutions participating in the Paramedic

Education Programs Accreditation Scheme, by State and Territory.

Enrolments in accredited training courses represents one aspect of sustainability.

High or increasing enrolments are desirable.

Timeliness Enrolment data are published annually for the latest calendar year preceding the

January release of each RoGS.

Data are counted as the number of students enrolled as at 31 December for the

forthcoming course year.

Accuracy The CAA compile administrative data from all accredited tertiary training providers in

Australia.

Data are collected according to agreed definitions provided in the CAA data dictionary.

**Coherence** All data are sourced from the CAA.

Estimates are comparable over time and between jurisdictions, subject to caveats

provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the

CAA and are the same for all tertiary institutions.

Accessibility Enrolments in accredited paramedic training courses data are publicly available in the

CAA Annual Report on the CAA website annually (www.caa.net.au).

Interpretability The Enrolments in accredited paramedic training courses data are publicly available

and includes definitions of the collected data.

### **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following issues:

- The enrolments in accredited paramedic training courses is only one aspect of workforce sustainability.
- Analysis of Enrolments in accredited paramedic training courses should be done
  in conjunction with other measures including workforce by age group and staff
  attrition.
- PEPAS is a voluntary program and as such might not represent all students enrolled in paramedic courses around Australia, it only represents those enrolled in CAA PEPAS accredited courses.

# Ambulance service expenditure per person

Data quality information for this indicator has been drafted by the Secretariat in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

# Indicator definition and description

**Element** Efficiency

**Indicator** Ambulance service expenditure per person

Measure (computatio Ambulance service organisations expenditure per person' is defined as total

ambulance service organisation expenditure per person in the population.

Ambulance service expenditure includes salaries and payments in the nature of salaries, capital costs and other operating costs that are essential to providing

ambulance services. For more detail refer to the CAA Data Dictionary.

Data source Consolidated Returns, Council of Ambulance Authorities (CAA)

#### **Data Quality Framework Dimensions**

# Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission use in the RoGS.

### Relevance

The indicator is available for all statutory ambulance services in Australia, by State and Territory.

The CAA Consolidated Returns collects data for each of the ambulance service organisations expenditures categories, as defined in the measure.

All else being equal, lower expenditure per person represents greater efficiency. However, efficiency data are difficult to interpret. While high or increasing expenditure per person may reflect deteriorating efficiency, it may also reflect changes in aspects of the service (such as improved response) or the characteristics of events requiring ambulance service response (such as more serious para medical challenges). Similarly, low or declining expenditure per person may reflect improving efficiency or lower quality responses or less challenging cases.

Expenditure per person is employed as a proxy for efficiency. Expenditure per ambulance event is not used as a proxy for ambulance service organisation efficiency because an organisation that applies more resources to the prevention and preparedness components of community safety to reduce the demand for ambulance services could erroneously appear to be less efficient.

#### **Timeliness**

The Ambulance service expenditure per person data are published annually for the latest financial year preceding the January release of each RoGS.

### Accuracy

The CAA Consolidated Returns compile administrative data from all statutory providers of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

#### Coherence

All data (numerators and denominators) are sourced from the CAA Consolidated Returns.

Estimates from the CAA *Consolidated Returns* are comparable over time and between jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the CAA and are the same for all state and territory services.

### Accessibility

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Ambulance service expenditure per person data are made publicly available annually as part of the CAA Annual Report on the CAA website (www.caa.net.au).

# Interpretabili

Ambulance service expenditure per person data are publicly available including definitions of the collected data.

# **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes that:

- Expenditure per person is employed as a proxy for efficiency. All else being equal, lower expenditure per person represents greater efficiency. However, efficiency data are difficult to interpret (see relevance dimension).
- Care needs to be taken when comparing efficiency data across jurisdictions because there are differences in the reporting of a range of cost items and funding arrangements (funding policies and taxing regimes). Some jurisdictions, for example, have a greater proportion of government funding relative to levies compared with other jurisdictions. Also, differences in geographic size, terrain, climate, and population dispersal may affect costs of infrastructure and numbers of service delivery locations per person.

# Cardiac arrest survived event

Data quality information for this indicator has been drafted by the Secretariat in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

# **Indicator definition and description**

**Element** Outcomes

Indicator Cardiac Arrest Survived Event

Measure (computation)

'Cardiac arrest survived event rate' is defined by the percentage of patients, aged 16 years and over, who were in out-of-hospital cardiac arrest and had a return to spontaneous circulation (that is, the patient having a pulse) until administration and transfer of care to the medical staff at the receiving hospital (Jacobs, et al. 2004).

Three measures are provided as the percentage of patients aged 16 years and over who had a return to spontaneous circulation in the following circumstances:

Adult cardiac arrest where resuscitation attempted — where: (1) a person
was in out-of-hospital cardiac arrest (which was not witnessed by a paramedic);
and (2) chest compressions and/or defibrillation was undertaken by ambulance
or emergency medical services personnel.

#### Inclusion criteria:

- Adult 16 years and over
- Resuscitation was started and continued
- Cardiac aetiology is confirmed
- ROSC at arrival to hospital (5 sec or more sustainable ROSC)

#### Exclusion criteria:

- Paramedic witnessed events
- Do not attempt resuscitation orders
- Dead on arrival
- Adult VF/VT cardiac arrests where: (1) a person was in out-of-hospital
  cardiac arrest (which was not witnessed by a paramedic); and (2) the arrest
  rhythm on the first ECG assessment was either Ventricular Fibrillation or
  Ventricular Tachycardia (VF/VT) (irregular and/or fast heartbeat).

# Inclusion criteria:

- Adult 16 years and over
- Resuscitation was started and continued
- Cardiac aetiology is confirmed
- ROSC at arrival to hospital Utstein (20 min or more sustainable ROSC)
- Shockable rhythm (VT/VF)

### Exclusion criteria:

- Paramedic witnessed events
- Do not attempt resuscitation orders
- Dead on arrival
- Paramedic witnessed cardiac arrest where a person was in out-of-hospital cardiac arrest that occurred in the presence of ambulance paramedic or officer.

### Inclusion criteria:

- Adult 16 years and over
- Resuscitation was started and continued
- Cardiac aetiology is confirmed
- ROSC at arrival to hospital (5 sec or more sustainable ROSC)
- Cardiac arrest occurred in the presence of a paramedic officer

### Exclusion criteria:

- Do not attempt resuscitation orders

- Dead on arrival

#### Data source Counc

Council of Ambulance Authorities (CAA)

#### **Data Quality Framework Dimensions**

# Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission use in the RoGS.

#### Relevance

The indicator is available for all statutory ambulance services in Australia, by State and Territory.

The CAA Consolidated Returns collects data for each of the cardiac arrest survived event categories, as defined in the measure.

The Cardiac arrest survived event represents one aspect of effectiveness - indicating governments' objective of providing pre-hospital and out-of-hospital care and patient transport services, that are high quality, timely, and meet clients' needs through delivery of coordinated and responsive health care.

#### **Timeliness**

Cardiac arrest survived event data are published annually for the latest financial year preceding the January release of each RoGS.

#### **Accuracy**

The CAA Consolidated Returns compile administrative data from all statutory providers of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

# Coherence

All data (numerators and denominators) are sourced from the CAA Consolidated Returns

Estimates from the CAA *Consolidated Returns* are comparable over time and between jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by the CAA and are the same for all state and territory services.

### Accessibility

Cardiac arrest survived event data are publicly available in the CAA Annual Report on the CAA website annually (www.caa.net.au).

# Interpretabilit v

Cardiac arrest survived event data are publicly available including definitions of the collected data.

# **Data Gaps/Issues Analysis**

# Key data gaps/issues

The Steering Committee notes the following issues:

- Cardiac arrest survived event is only one measure of ambulance effectiveness and ambulance quality.
- Other indicators are being prepared which will together with Cardiac arrest survived event form a clearer and more complete picture of ambulance effectiveness and quality.
- Cardiac arrest data are at this stage not fully comparable between States and Territories, but progress is being made to resolve issues which relate to comparability of recording and reporting cardiac data. All services are committed to setting up cardiac arrest registries which provide a detailed recording and analysis of cardiac data.
- Data are not comparable between years for services as noted in caveats due to changes in systems and recording and reporting practices during the years.

# Pain management

Data quality information for this indicator has been drafted by the Secretariat in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

# **Indicator definition and description**

**Element** Outcomes

Indicator Pain Management

Measure (computation)

'Pain management' is defined as the percentage of patients who report a clinically meaningful pain reduction.

Numerator

In scope patients (see denominator) who reported a minimum 2 point reduction in pain score from first to final recorded measurement.

Denominator

Patients who:

- are aged 16 years and over and received care from the ambulance service
- recorded at least 2 pain scores (pre- and post-treatment) on a Numeric Rating Scale
- recorded an initial pain score of 7 or above on the Numeric Rating Scale of 1–
   10

Excluded are patients who refuse pain medication for whatever reason.

- Numerator total number of patients where at least two pain values were recorded.
- Denominator number of patients with a higher/lower/same last pain value as first pain value.

**Data source** 

Consolidated Returns, Council of Ambulance Authorities (CAA)

# **Data Quality Framework Dimensions**

Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA collects administrative data annually from all statutory ambulance services, using the same core questionnaire and instructions — the CAA Consolidated Returns.

The ambulance service organisations send their data to the CAA. The CAA then collates all data to be provided to the Productivity Commission use in the RoGS.

Relevance

The indicator is available for all statutory ambulance services in Australia, by State and Territory.

The CAA Consolidated Returns collects data for all paint management categories, as defined in the measure.

The pain management indicator represents one aspect of effectiveness — indicating the proportion of patients with relieved/same/worse pain value on completion of ambulance service involvement compared to the start of ambulance service involvement.

**Timeliness** 

The pain management data are published annually for the latest financial year preceding the January release of each RoGS.

**Accuracy** 

The CAA Consolidated Returns compile administrative data from all statutory providers of ambulance services in Australia.

They are collected according to agreed definitions provided in the CAA data dictionary.

Coherence

All data (numerators and denominators) are sourced from the CAA Consolidated Returns.

Estimates from the CAA Consolidated Returns are comparable over time and

between jurisdictions, subject to caveats provided by services.

The collection, instructions, definitions and analysis are prepared and overseen by

the CAA and are the same for all state and territory services.

Accessibility The pain management data are made publicly available annually as part of the CAA

Annual Report on the CAA website (www.caa.net.au).

Interpretability 
The pain management data are publicly available including definitions of the

collected data.

# **Data Gaps/Issues Analysis**

Key data gaps/issues

# Level of patient satisfaction

Data quality information for this indicator has been drafted by the Emergency Management Working Group in consultation with the Council of Ambulance Authorities (CAA), with additional Steering Committee comments.

#### **Indicator definition and description**

Element

Outcomes

Indicator

Proportion of ambulance users who were satisfied or very satisfied with the ambulance

# Measure (computation)

Level of Patient Satisfaction definition

The total number of patients who were either 'satisfied' or 'very satisfied' with ambulance services they had received divided by the total number of patients.

- Patients people who were transported under an emergency event classified as
  code 1 (an emergency event requiring one or more immediate ambulance
  responses under light and sirens where the incident is potentially life threatening)
  or code 2 (urgent incidents requiring an undelayed response by one or more
  ambulances without warning devices, with arrival desirable within thirty minutes).
- Satisfaction descriptive statistics were used to uncover the proportion of people who were very dissatisfied or dissatisfied, neither satisfied nor dissatisfied, and satisfied or very satisfied for the various satisfaction and service quality attributes. Unsure and not applicable responses are not included as the number of these responses is generally low.

Data source

Patient Satisfaction Survey, Council of Ambulance Authorities (CAA)

# **Data Quality Framework dimensions**

# Institutional environment

The CAA is the peak body representing the principal statutory providers of ambulance services in Australia.

The CAA provides the survey and instructions. The data are collected by each ambulance service, using the same core questionnaire. The individual service providers then send the data to the CAA.

The Ehrenberg-Bass Institute, as an independent research body then prepares the analysis and final report of the survey. The report is sent to member services for review and sign off.

The key purpose of the *Patient Satisfaction Survey* is to track perceived service quality and customer satisfaction across Australian states and territories.

### Relevance

The indicator is available for all ambulance services in Australia.

The sample population represents the total population that used ambulance services in the last year.

The Patient Satisfaction Survey collects the level of patient satisfaction against three service areas:

- Call response time the time taken to answer their emergency call.
- Communication staff assistance the operator they spoke to when their emergency phone call was answered.
- Ambulance response time the time the ambulance took to arrive.

They survey collects the level of patient satisfaction against five paramedic satisfaction areas:

- Paramedics care the care the ambulance paramedics took when attending them
- Treatment satisfaction the standard of treatment they received from the ambulance paramedics.
- Ambulance paramedics explanations given by the ambulance paramedics about what was happening to them and why.

- Trip/ride satisfaction the conditions of the trip when being transported by an ambulance.
- Overall satisfaction their overall satisfaction using the ambulance service

#### **Timeliness**

Level of Patient Satisfaction data are published annually for the latest financial year preceding the January release of each RoGS.

#### Accuracy

The data are collected by survey form, which is mailed to a randomly selected sample of ambulance services users in the past year. The sample size is 1300 users with an average 35 per cent return rate.

The standard errors for 95 per cent confidence interval for each member service are included in the RoGS.

In some cases differences in scores between states/territories are not statistically significant (ie they arose from random sampling fluctuation) which means that all states/territories can be considered equal in performance.

There are also demographic factors that could drive the differences in proportions. For example, patients are more likely to provide higher scores for call response time and ambulance arrival time than carers or relatives (when they complete the questionnaire on behalf of patients). This pattern is because many patients are unable to judge the response time accurately when they need urgent medical help.

#### Coherence

All data (numerators and denominators) are sourced from the CAA *Patient Satisfaction Survey*.

Estimates from the CAA *Patient Satisfaction Survey* are comparable over time and between jurisdictions, subject to sampling variability. Over time the sample sizes have increased in smaller jurisdictions to reduce sampling error.

The survey questionnaire, instructions, definitions and analysis are prepared and overseen by the CAA and are the same for all state and territory services.

# **Accessibility**

The CAA *Patient Satisfaction Survey* report is publicly available and includes information to thoroughly explain the methods, definitions and results of the data collection.

## Interpretability

The CAA *Patient Satisfaction Survey* report is made publicly available on the CAA website annually (www.caa.net.au).

# **Data Gaps/Issues Analysis**

# Key data gaps/issues

The measurement of the current structure is not sensitive enough to readily identify improvements and declines in ambulance performance. For instance, for 'communication staff assistance', Tasmania scored 100 per cent of satisfied or very satisfied respondents in 2011. This is an indication that the measurement has reached the ceiling.