2022 Emergency Preparedness Report

GOVERNMENT OF WESTERN AUSTRALIA

SEMC
STATE EMERGENCY MANAGEMENT COMMITTEE

Acknowledgement of Country

The State Emergency Management Committee (SEMC) acknowledges the traditional custodians throughout Western Australia (WA) and their continuing connection to the land, waters and community. We pay our respects to all members of the Aboriginal communities, their cultures and to Elders past, present and emerging. Aboriginal people should be aware this publication may contain images or names of deceased persons in photographs or printed material.

Contents

From the Chair

In the summer of 2021-22 Western Australia (WA) experienced record heatwaves, four concurrent Level 3 bushfires, cyclones tracking further south than usual, lightning storms that sparked dozens of fires, and flooding in Tom Price, Broome, and across the Dampier Peninsula. These events, and many smaller incidents, were managed during an extended state of emergency declared due to the COVID-19 pandemic.

The 2021-22 high threat period encapsulated the new reality for our State: emergency events that are more intense, more frequent, and increasingly overlapping. As a result, the emergency management sector can expect less time available between events to recover, undertake mitigation and prepare for the next incident. The evolving challenge confronting the emergency management sector is that the surge resource capacity required to deal with concurrent and cascading emergencies will need to become business as usual.

For the community, an emergency such as COVID-19, or the impact of climate change as seen in more intense bushfires and weather events, is no longer something that happens to others. We all share in the experience of emergencies, and this will continue to be the case.

Climate change is a significant factor in our State's increasing experience of natural hazards. The State Emergency Management Committee (SEMC) is expanding its focus on climate change adaptation to ensure the sector is prepared and responsive to the impact of climate change on emergency management. Work is underway to adapt current approaches and develop new strategies to complement the WA Climate Policy. This work is progressing in partnership with service providers and the health care, infrastructure, planning, and environment sectors.

The SEMC also continues to direct grant programs towards building capability for risk reduction, emergency preparedness and recovery, ensuring targeted, timely support is provided to resilience focused activities across the sector.

The 2022 Emergency Preparedness Report demonstrates the continuing dedication and commitment of the emergency management sector in keeping Western Australians safe. It highlights the significant challenges and the capability across our vast State to manage disaster risk.

The SEMC thanks the emergency management sector for its contribution to this year's Emergency Preparedness Report.

Dr Ron F Edwards
Chair, State Emergency Management Committee

Executive summary

The 2022 Emergency Preparedness Report provides a snapshot of WA's preparedness to prevent, respond to, and recover from significant hazardous events.

It does this by presenting data collected from 152 organisations with various roles in emergency management. These organisations were asked to respond to survey questions about their ability to deliver outcomes across the 33 core capabilities in the seven capability areas of the State Emergency Management Capability Framework.

The broad representation of organisations with different functions, of different sizes, and from locations across the State allows us to build a comprehensive account of WA's ability to achieve the six core objectives of the State Emergency Management Framework.

The SEMC continues to work with the emergency management sector throughout WA to develop greater capability where it is needed and to build on the State's areas of strength.

Analysis of the survey responses revealed:

WA's most developed core capabilities in 2022 are:

- Impact assessment
- Public information
- Evacuation and welfare
- Business continuity planning
- Situational assessment
- Finance and administration

Core capabilities with the most opportunity for improvement are:

- Infrastructure protection
- Equipment and critical resources
- Recovery resources
- Sector information sharing
- Recovery skills

01 Introduction

1. Introduction

The 2022 Emergency Preparedness Report is provided to meet the SEMC's responsibility to advise the Minister for Emergency Services of WA's preparedness to manage emergencies. The 2022 report is the tenth Emergency Preparedness Report published by the SEMC.

The 2022 Emergency Preparedness Report was developed using self-reported information gathered from across the emergency management sector, including from state government agencies, local governments, not-for-profit organisations, and essential services operators. The report considers WA's emergency management capability against the SEMC Emergency Management Capability Framework. It highlights the emergency management sector's strengths, as well as opportunities for improvement. The information presented supports efforts to continually improve WA's resilience to emergencies.

COVID-19 continued to have a significant effect on the emergency management sector throughout 2021-22. Across the sector, organisations carefully managed staff and volunteers to ensure compliance with vaccination mandates and public health protocols while continuing to deliver essential emergency services. Meanwhile, increased domestic tourism necessitated enhanced preparation and response activities across the State, particularly in the Kimberley and South West of WA.

District and Local Emergency Management Committees were instrumental in assisting with arrangements to manage the impacts of COVID-19 as well as helping coordinate community-based vaccination clinics to meet vaccination targets.

The year also saw several major incidents occur. There were activations of Operational Area Support Groups under the State Emergency Management Policy in response to Tropical Cyclones Anika and Charlotte, the Tom Price bushfires, severe weather across the Pilbara, the Shackleton bushfire complex, the Bayview Rise bushfire, and the Calgardup bushfire. There were also monthly Operational Area Support Group meetings held in response to COVID-19 across the Goldfields-Esperance and Wheatbelt Regions. Recovery became a key focus for the Great Southern Region, with Local Recovery Coordination Groups established in several local government areas following bushfires across the region.

Several WA districts conducted targeted emergency management exercises, including some focused on the impacts of COVID-19 outbreaks in isolated Aboriginal communities. Exercises concentrating on local welfare, bushfires, and maritime incidents were held across the Great Southern Region.

Through data, qualitative responses, and case studies, the 2022 Emergency Preparedness Report reflects a unique and challenging year for the emergency management sector in WA.

1. Introduction

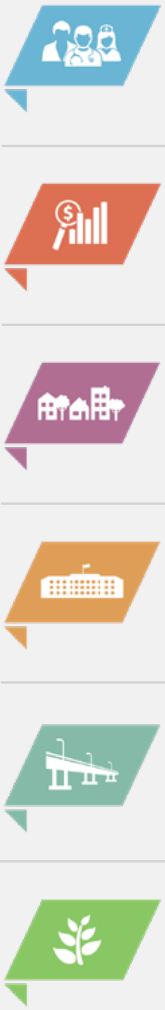
1.1 The State Emergency Management Framework

The SEMC is the peak emergency management body in Western Australia. The functions of the SEMC include providing direction, advice, and support to public authorities, industry, commerce, and the community to enable an efficient emergency management capability in Western Australia.

The functions of the SEMC are largely delivered via the State Emergency Management Framework (Figure 2). The State Emergency Management Framework consists of legislation, policy, plans, procedures, guidelines, and a governance structure for emergency management in Western Australia. Together these framework elements provide a coordinated approach to emergency management and community safety incorporating the principle of shared responsibility.

The State Emergency Management Framework identifies six core objectives that are fundamental to the wellbeing of all Western Australians.

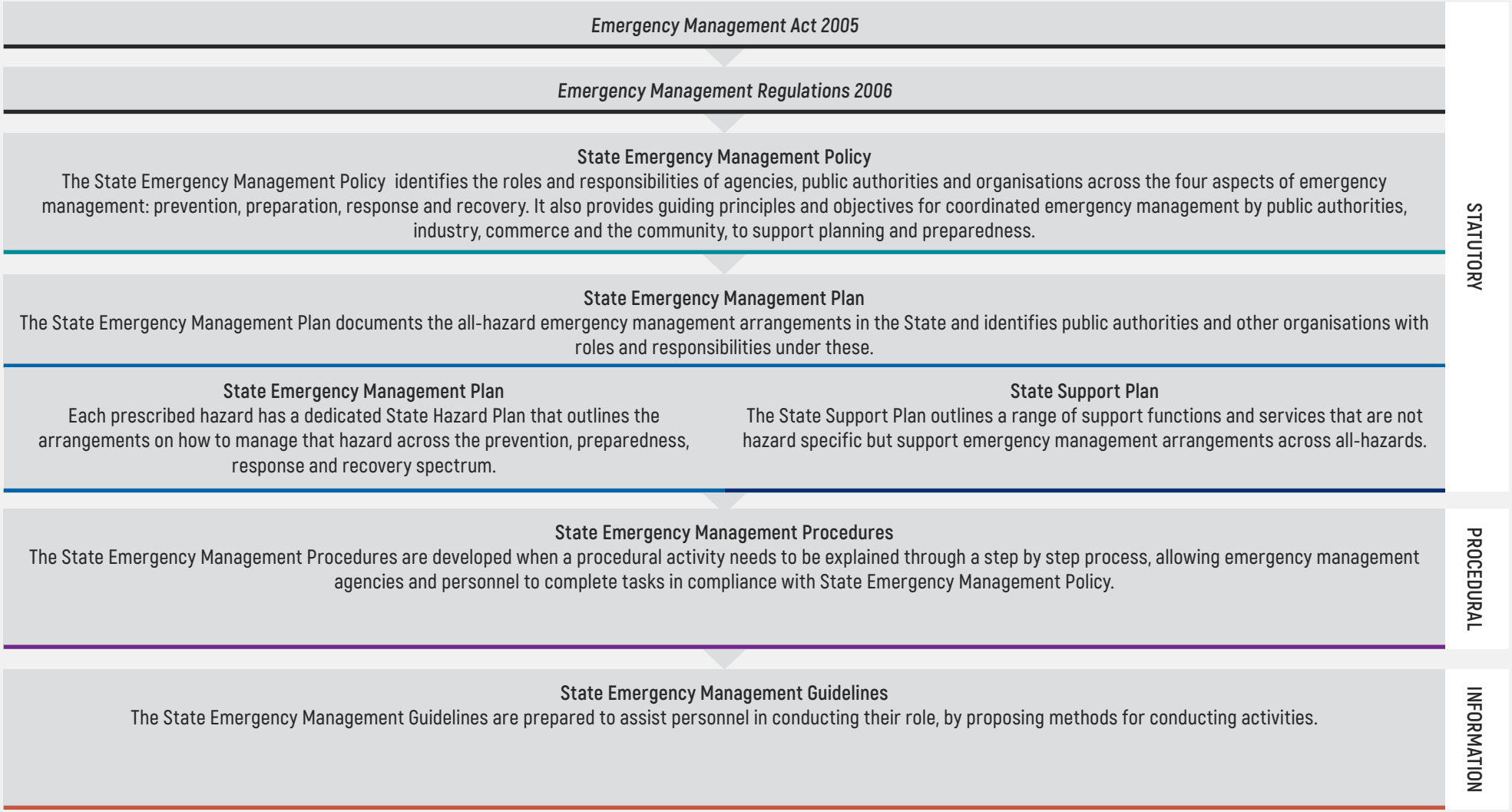
Figure 1 State core objectives.



People	Protect the lives and wellbeing of people
Economy	Maintain and grow the State's productive capacity, employment and government revenue
Social Setting	Ensure that there is public order, that people are housed and fed in a safe and sanitary manner and have access to social amenities including education and health services, and that things of cultural importance are preserved
Governance	Ensure that there is, at all times, an effective and functioning system of government and societal respect for the rule of law
Infrastructure	Maintain the functionality of infrastructure, particularly key transport infrastructure and utilities required for community health, economic production and effective management of emergencies
Environment	Protect the State's ecosystems and biodiversity

1. Introduction

Figure 2 The State Emergency Management Framework.



1. Introduction

1.2 Emergency preparedness

Preparedness is defined in the *Emergency Management Act 2005* (the Act) as 'preparation for response to an emergency'. The Emergency Preparedness Report provides information about contributing organisations' preparedness to respond to emergencies, but also about their preparedness to undertake emergency prevention and recovery. As such, the broader definition of preparedness adopted by the United Nations Office of Disaster Risk Reduction should be considered when reading this report.

The United Nations describes preparedness as having the knowledge and capacity to effectively anticipate, respond to and recover from the impacts of emergencies. Preparedness aims to build the capacity needed to efficiently manage all types of emergencies and achieve orderly transitions from response to sustained recovery [1].

Effective emergency management prioritises prevention of emergencies. Prevention is defined in the Act as 'the mitigation or prevention of the probability of the occurrence of, and the potential adverse effect of, an emergency'. Preventing emergencies reduces the need for response, which is a more costly, dangerous, and disruptive way to manage hazards [2].

Prevention and response cannot entirely protect communities from the impact of hazards. Emergency preparedness therefore also includes the capacity to support communities to recover. In the Act, recovery is defined as the support of emergency affected communities in the reconstruction and restoration of physical infrastructure, the environment and community, psychosocial and economic wellbeing.

1.3 Hazards

A hazard is a process, phenomenon, or human activity that may cause loss of life, injury or other health impacts, property damage, social and economic disruption, or environmental degradation. The nature and magnitude of a hazard's consequences are a function of the characteristics of the hazard, the degree of exposure someone or something has to it, and the extent to which the exposed entity is vulnerable to the hazard's effects [3].

WA's large size, diverse climate, geologic activity, and dependence on supply chain connectivity and primary industry expose the State to many natural and man-made hazards. The Act and the *Emergency Management Regulations 2006* prescribe 28 hazards of significance to Western Australia (Figure 3).

> **An emergency is the occurrence or imminent occurrence of a hazard which is of such a nature or magnitude that it requires a significant and coordinated response.**
>
> *Emergency Management Act 2005*

[1] United Nations Office of Disaster Risk Reduction. PreventionWeb. https://www.preventionweb.net/terminology/preparedness. Accessed 25 October 2022.

[2] United Nations Department for Humanitarian Affairs. 1994. Yokohoma Strategy and Plan of Action for a Safer World. Guidelines for Natural Disaster Prevention, Preparedness and Mitigation. World Conference on Natural Disaster Risk Reduction. Yokohoma, Japan 23-27 May, 1994.

[3] United Nations Office of Disaster Risk Reduction. PreventionWeb. https://www.preventionweb.net/terminology/preparedness. Accessed 25 October 2022.

1. Introduction

Figure 3 The 28 prescribed hazards in Western Australia.

Air crash	Gas supply disruption sufficient to cause potential risk to life	Marine search
Animal or plant pests or diseases	HAZMAT[4]: release of chemical, radiological or other hazardous materials capable of causing harm to persons, property, or the environment	Marine transport emergency
Biological substance: release of biological substance capable of causing harm to persons, property, or the environment		Radiation escape from a nuclear-powered warship
Collapse	Heatwave	Rail crash
Cyclone	Hostile act	Road crash
Earthquake	Human epidemic	Space re-entry debris
Electricity supply disruption sufficient to cause potential risk to life	Land search	Storm
Fire	Liquid fuel supply disruption with potential to cause risk to life	Terrorist act
Flood	Marine oil pollution: release of substance capable of causing harm to persons or the marine environment	Tsunami

[4] Release of chemical radiological and other hazardous materials are separate hazards in the Emergency Management Framework but are commonly grouped as 'HAZMAT'.

1. Introduction

1.4 Who manages the hazards?

The State Emergency Management Framework assigns responsibilities to various agencies and people to prevent, prepare for, respond to, and recover from the prescribed hazards. These agencies and people are categorised according to their role and functions as either hazard management agencies, combat agencies, support organisations or emergency support services. Roles and functions are assigned to agencies and people because of their legislated functions and specialised knowledge, expertise, and resources.

Hazard management agencies

Hazard management agencies are responsible for the emergency management of their prescribed hazard, including leading one or more aspects of prevention, preparedness, response and recovery. A hazard management agency can also declare an emergency in relation to its managed hazards. There are eight hazard management agencies in Western Australia (Table 1).

Table 1 Hazard management agencies prescribed in the *Emergency Management Regulations 2006.*

HAZARD MANAGEMENT AGENCY	HAZARDS MANAGED		
Arc Infrastructure Pty Ltd	Rail crash (Arc Infrastructure)		
Chief Executive Officer, Department of Health	Biological substance	Heatwave	Human epidemic
Chief Executive Officer, Department of Transport	Marine oil pollution	Marine transport emergency	
Fire and Emergency Services Commissioner	Collapse Cyclone Earthquake	Fire Chemical, radiological, or other substance (HAZMAT)	Flood Storm Tsunami
Commissioner of Police	Air crash Hostile act Land search	Marine search Road crash Space re-entry debris	Radiation escape from a nuclear-powered warship Terrorist act
Coordinator of Energy	Electricity supply disruption	Gas supply disruption	Liquid fuel supply disruption
Director General, Department of Primary Industries and Regional Development	Animal or plant pests or diseases		
Public Transport Authority	Rail crash (Public Transport Authority)		

1. Introduction

Combat agencies

Combat agencies are responsible for performing specific emergency management activities and working alongside, or at the direction of, a hazard management agency. There are six combat agencies prescribed by the State Emergency Management Framework (Table 2).

Table 2 Combat agencies prescribed by the *Emergency Management Regulations 2006.*

COMBAT AGENCIES	ACTIVITY
Local governments Department of Fire and Emergency Services Department of Biodiversity, Conservation and Attractions	Fire suppression
Department of Health St John Ambulance	Providing health services
Western Australia Police Force	Disaster victim identity management

Support organisations

Support organisations are responsible for providing support functions in relation to an emergency.

The only agency currently prescribed as a support organisation by the State Emergency Management Framework is the Department of Communities. That department is prescribed as a support organisation for the provision of welfare services.

Emergency support services

Emergency support services provide specialised knowledge and expertise, manage critical infrastructure, or provide other assistance during emergencies. The State Emergency Management Plan recognises the following emergency support services:

- Bureau of Meteorology
- Department of Defence
- Department of Water and Environmental Regulation
- Department of the Premier and Cabinet
- Main Roads WA
- ATCO Gas Australia
- Dampier to Bunbury Natural Gas Pipeline
- Horizon Power
- Media outlets
- NBN Co
- Telstra
- Water Corporation
- Western Power.

Local government

Local governments have many roles in emergency management. As well as their responsibilities as a combat agency for the emergency management activity of fire suppression, local governments also:

- prepare and maintain Local Emergency Management Arrangements, and a Local Recovery Plan
- manage community recovery following an emergency and establish a Local Recovery Coordination Group, when appropriate
- establish their Local Emergency Management Committee
- participate in emergency risk management planning
- conduct capability analysis and lead or participate in an annual emergency management exercise
- manage local Bush Fire Brigades under the *Bush Fires Act 1954.*

1. Introduction

1.5 Capability

Capability is our collective ability to undertake prevention, preparedness, response and recovery activities to reduce the impact of emergencies and to create a better prepared, more resilient and safer State. Capability includes having the people, equipment, skills, knowledge, relationships, systems, processes, governance, and other necessary resources to address emergency risk before, during, and after hazard events.

The SEMC Emergency Management Capability Framework[5] identifies seven capability areas comprising 33 core capabilities (Figure 4). Collectively, the 33 core capabilities describe the WA emergency management sector's ability to prevent, prepare for, respond to, and recover from emergencies.

The 2022 Emergency Preparedness Report considers the core capabilities to assess the collective ability of the State's emergency management sector to fulfill its emergency management roles and responsibilities.

Figure 4 The State Emergency Management Capability Framework.

[5] https://www.wa.gov.au/government/publications/emergency-management-capability-framework

1. Introduction

Figure 4 (Cont.) The State Emergency Management Capability Framework.

CAPABILITY AREA	CORE CAPABILITY
Emergency response	Command, control, and coordination Situational assessment Evacuation Public protection Agency interoperability Mass casualty management
Resources	People Volunteering Finance and administration Equipment and critical resources
Community involvement	Alerts and warnings Shared ownership Risk awareness and understanding Public information Sector information sharing

CAPABILITY AREA	CORE CAPABILITY
Planning and mitigation	Land use planning Ecosystem management Infrastructure protection Essential services protection Minimise single points of failure Remoteness planning Business continuity planning Community activities
Impact management and recovery	Mass fatality management Welfare Impact assessment Recovery coordination
Governance	Legislation Policies EM Plans
Analysis and continuous improvement	Risk assessment Horizon scanning Lessons management

02
Report methodology

2. Report methodology

2.1 Overview

In April 2022, the Annual and Preparedness Report Capability Survey (survey) asked participating organisations to self-assess their capability against the SEMC Emergency Management Capability Framework. Survey participants responded to questions about the 33 core capabilities and in relation to the 28 prescribed hazards. Responses were provided in the context of the organisation's roles as a hazard management agency, combat agency, support organisation or emergency support services provider before, during and after emergencies.

2.2 Survey participation

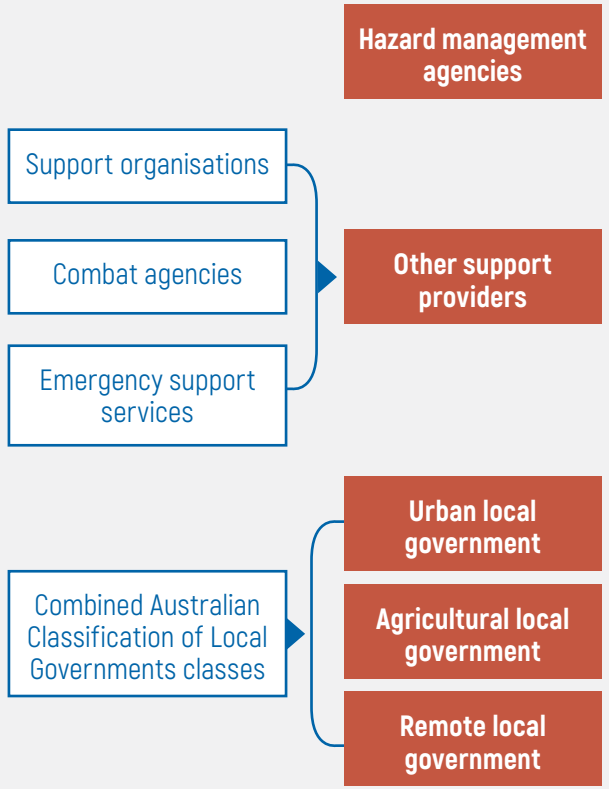
In 2022, 152 of 166 invited organisations completed the survey, representing a 92 percent response rate. This compares to a 94 percent response rate in 2021. The ten local governments most impacted by Tropical Cyclone Seroja were exempt from the 2021 survey but were invited to respond in 2022. A full list of organisations participating in the 2022 survey is provided at Appendix A.

2.3 Survey analysis

Survey questions allowed for either a 'yes/no', or a scaled response depending on the nature of the topic. Scaled responses meant the respondent could indicate on a qualitative scale how comprehensive their organisation's arrangements are in relation to the capability. Qualitative categories were then converted to a score between 0 and 100 to facilitate statistical analysis and reporting, with higher scores representing greater capability.

Survey respondents were grouped into categories to facilitate data analysis and reporting. Responses from all hazard management agencies were analysed and reported together. Combat agencies, support organisations, and emergency support services were grouped for analysis and reporting and are described in the 2022 Emergency Preparedness Report as 'other support providers'. Finally, local governments were divided into categories of urban, agricultural, and remote according to descriptions used in the Australian Classification of Local Governments (Figure 5).

Figure 5 Grouping of respondents used to report findings in the 2022 Emergency Preparedness Report.



03
Results

3. Results

The following sections describe responses to the 2022 Annual and Preparedness Report Capability Survey relating to core capabilities in each of the seven capability areas of the State Emergency Management Framework.

3.1 Emergency response

The emergency response capability area summarises the WA emergency management sector's collective ability to manage incidents in a way that minimises the extent and magnitude of consequences. The emergency response capability arises from having effective plans and arrangements in place to manage emergencies and the capacity to execute these when required.

Relationships and procedures that support a coordinated response to emergencies are central to the emergency response capability. The ability to provide support to people and communities that are threatened or affected by emergencies also contributes.

Examples of support during emergencies are:

- facilitating community evacuation
- providing for the physical and mental welfare of evacuees and those remaining within an incident area
- managing the incident area to make it secure
- managing casualties, especially for mass casualty events.

Local governments are essential to many of the functions that contribute to the emergency response capability area.

> **The City's Local Emergency Management Arrangements Emergency Management Handbook sub-plan has been tested in response to several small-scale events. These have provided a great opportunity to test pre-emergency planning procedures. The emergency management handbook procedures for evacuation and welfare activation proved reliable and effective.**
>
> Urban Local Government

3. Results

Situational assessment

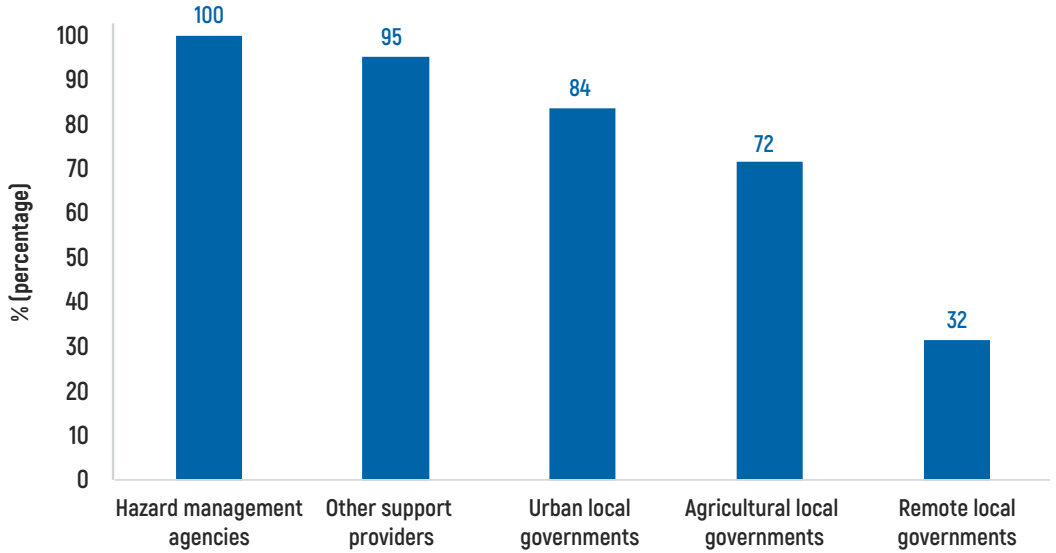
Developing and maintaining situational awareness is important to ensure that incidents are managed appropriately, and potential impacts understood. Situational awareness includes developing an understanding of the nature and potential extent of the hazard, areas of vulnerability, and resources that are required to manage the event[6].

From the survey, all hazard management agencies and 95 percent of other support providers affirmed that they developed situational awareness assessments during emergencies (Figure 6). Likewise, from the local government sector, 84 percent of urban local governments and 72 percent of agricultural local governments confirmed maintaining situational awareness during incidents. Remote local governments appear to have the lowest capability in this area, with only 32 percent of remote respondents reporting developing situational awareness assessments during emergencies.

Hazard management agencies and other support providers considered their situational awareness assessments to be substantially effective. Local governments, on average, described them as somewhat effective.

> **Situational awareness is a person or organisation's awareness of what is happening in the vicinity, to understand how information, events, and one's own actions will impact objectives, now and in the near future.**
>
> Australian Disaster Resilience Glossary

Figure 6 Percentage of survey respondents reporting developing situational awareness assessments during emergencies.



[6] Australasian Fire and Emergency Services Authorities Council. 2017. The Australasian Inter-Service Incident Management System. AFAC Ltd.

3. Results

Agency interoperability

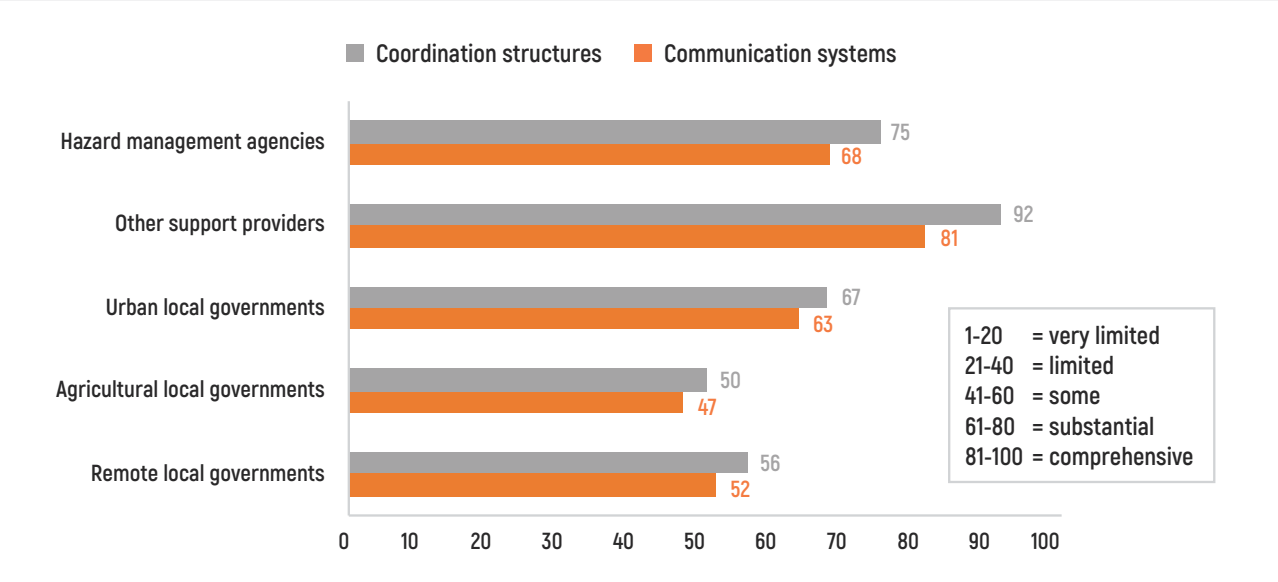
The committee structure established by the State Emergency Management Plan helps to ensure a coordinated response to, and recovery from, emergencies. Committees operate at State, district and local levels to assist in the development and implementation of the State emergency management arrangements. Committees with key roles during and after emergencies include the:

- State Emergency Coordination Group
- Operational Area Support Group
- Incident Support Group
- State Recovery Coordination Group
- Local Recovery Coordination Group.

These groups address requirements that are broader in scope or jurisdiction than the immediate incident response, and that are important to the coordination and proper prioritisation of incident management effort and recovery.

Effective incident control also relies on the organisations involved being able to communicate effectively with one another at an incident.

Figure 7 Reported level of effectiveness of coordination structures and interoperability of communication systems during emergencies.



Survey responses identified that hazard management agencies, other support providers and urban local governments consider WA's coordination structures to be substantially or comprehensively effective. These groups also reported the communication systems they use during emergencies to have substantial or comprehensive interoperability with other agencies.

Interoperability of communications systems was identified as a potential area for improvement for other local governments though, with agricultural and remote local governments considering their communication systems to have only some interoperability with other organisations (Figure 7).

3. Results

Evacuations and public protection

Evacuation involves the movement of people threatened by a hazard to a safer location and their eventual safe and timely return. It is a risk management strategy that may be used to reduce loss of life or lessen the effects of an emergency on a community. For an evacuation to be as effective as possible, it must be appropriately planned and implemented [7].

Under the State Emergency Management Framework, hazard management agencies have responsibility for managing evacuation during an emergency. The Western Australia Community Evacuation in Emergencies Guideline notes, however, that local governments are best placed to develop emergency evacuation plans due to their local knowledge, experience, community understanding and existing community relationships. This includes identifying suitable locations to use as evacuation and welfare centres.

The survey results show that the preparation of evacuation and welfare centres is done consistently well. More than 95 percent of all local governments described identifying and preparing suitable evacuation and welfare facilities. Around 80 percent of all local governments have also identified alternate shelters if their primary evacuation centre is inaccessible.

> **The local government would assist with evacuation where possible, but it would be dependent on the nature of the emergency and number of evacuated people. We would initially set up the evacuation centre but would rely on Department of Communities support for larger scale evacuations.**
>
> Agricultural Local Government

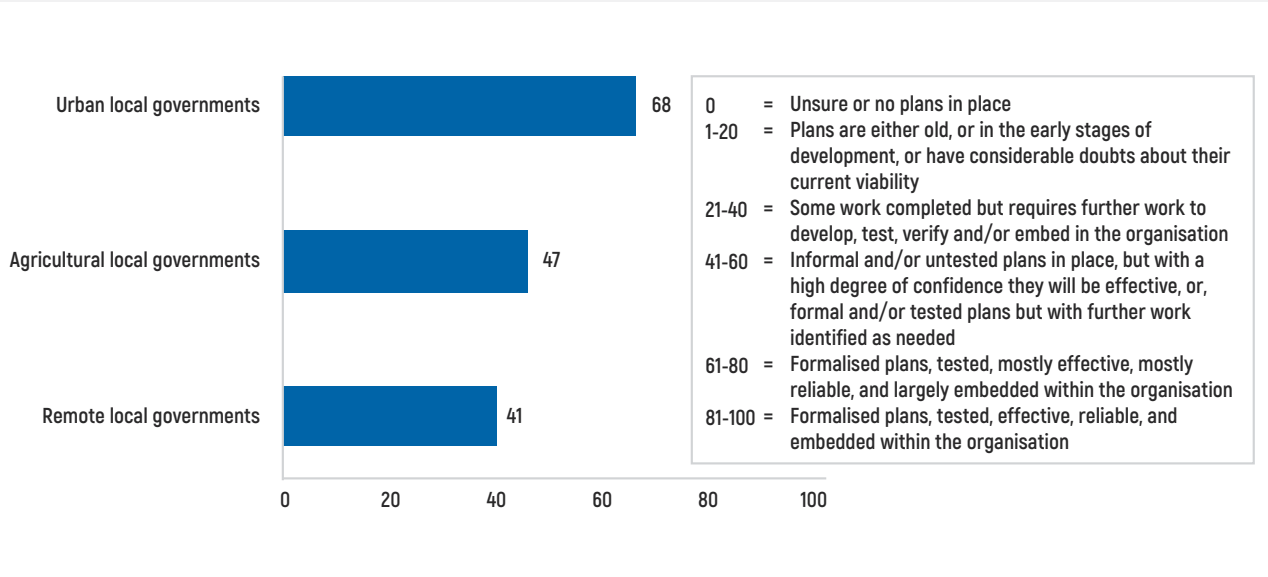
[7] Australian Institute for Disaster Resilience. 2017. Australian Disaster Resilience Handbook 4: Evacuation Planning. AIDR.

3. Results

Access to redundant supplies of power, water, and food for evacuation and welfare centres is important in case the usual sources of these resources become unavailable during emergencies. Between 70 and 78 percent of urban local governments indicated they have access to alternative sources of power, water, and food for their evacuation and welfare centres. About 60 percent of agricultural local governments and 75 percent of remote local governments reported they have access to a redundant power supply for evacuation and welfare centres. Between 50 and 60 percent of agricultural and remote local governments reported having redundant supplies of food and water for these centres.

Urban local governments consider pre-emergency evacuation planning to be mostly effective and largely embedded in their Local Emergency Management Arrangements. On average, agricultural and remote local governments said that they either have informal evacuation plans in place that they believe are effective, or formal evacuation plans that need further work to be improved (Figure 8).

Figure 8 Extent to which pre-emergency evacuation planning is embedded into Local Emergency Management Arrangements.



3. Results

3.2 Resources

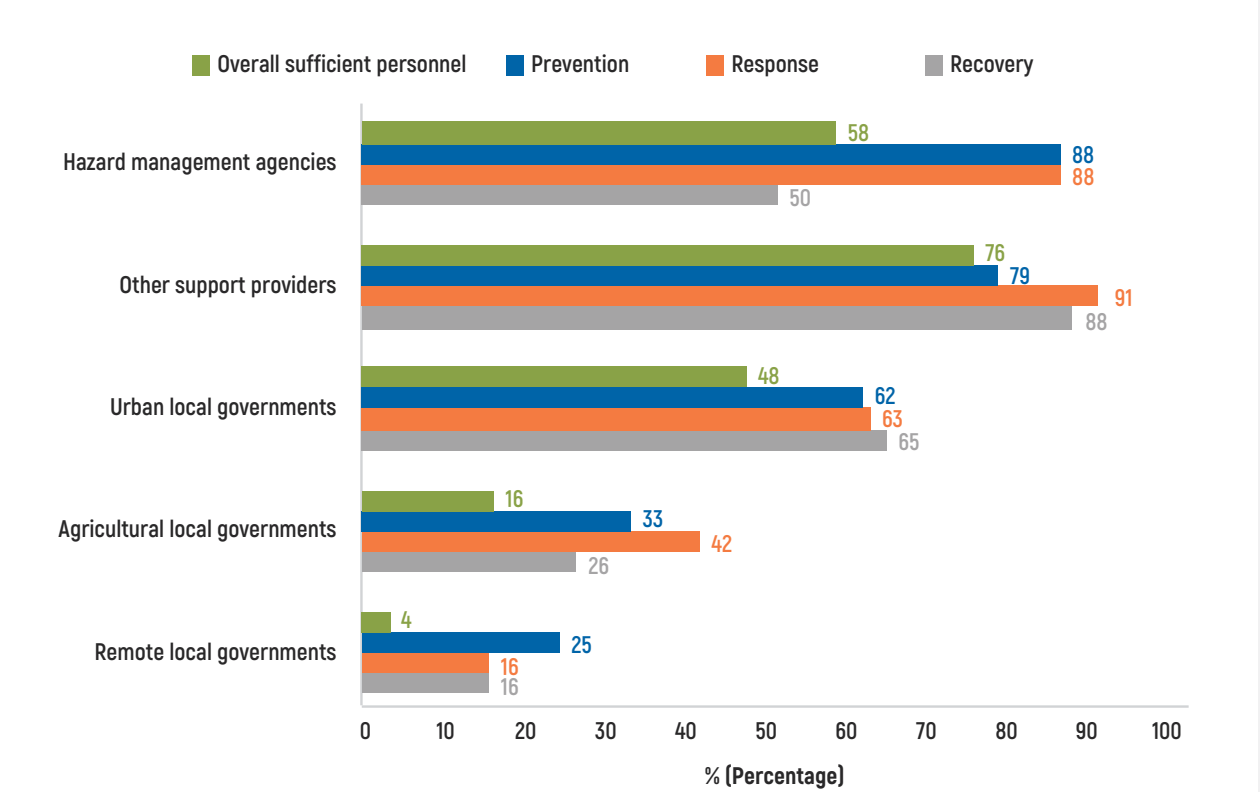
The resources capability is based on organisations having the people, money, and equipment needed to manage emergencies. Respondents were asked to consider the adequacy of their resources to accomplish the necessary tasks to prevent, respond to, and recover from, emergencies.

People

In 2022, urban local governments reported higher confidence in the adequacy of their human resources to manage emergencies effectively than agricultural or remote local governments (Figure 9). Forty-eight percent of urban local governments stated they have access to sufficient or substantial numbers of personnel to manage emergencies, compared to 16 percent of agricultural local governments and 4 percent of remote local governments.

Urban local governments reported consistent resourcing capacity for prevention, response and recovery activities.

Figure 9 Percentage of organisations reporting that they have substantial or sufficient emergency management personnel and that those personnel are substantially or comprehensively trained, capable and supported to conduct prevention, response and recovery activities.



3. Results

Other support providers fared well in the people core capability, with more than three-quarters of these organisations reporting they have enough personnel available for emergency management. About 80 to 90 percent of other support providers also said their personnel is appropriately trained, supported, and capable of prevention, response, and recovery activities.

Just over half of hazard management agencies consider they have adequate numbers of personnel for emergency management. While almost 90 percent of hazard management agencies reported their personnel is substantially trained, capable, and supported for prevention and response activities, only half of these organisations stated their personnel is similarly prepared for recovery activities.

Local governments appear well prepared to assist one another during emergencies. About 90 percent of urban local governments and over half of agricultural and remote local governments have memorandums of understanding in place with neighbouring local governments to provide mutual aid during emergencies. Similarly, 80 percent of other support providers have intrastate agreements, and more than two-thirds have interstate arrangements in place, to receive assistance from other organisations during emergencies.

Of the hazard management agencies that responded to this question, two thirds reported having intrastate, interstate and national memoranda of understanding for mutual aid during emergencies.

Equipment and critical resources

Access to equipment was identified as a challenge for some local governments. About one third of remote local governments and one fifth of agricultural local governments can mobilise sufficient equipment to respond to concurrent emergencies. Urban local governments, other support providers and hazard management agencies all noted they had better access to equipment, with over 80 percent of these organisations reporting they can mobilise adequate equipment to respond to concurrent emergencies.

> **Continuing to develop joint Local Emergency Management Arrangements offers the real potential to develop and grow a broader team, collective and individual knowledge, and it further provides opportunity for mutual consistent support in times of need.**
>
> Agricultural Local Government

Case Study

Regional Climate Alliances – A pilot program to support regional scale climate action

The Regional Climate Alliance program is a commitment under the Western Australian Climate Policy aimed at supporting regional scale action to reduce emissions and strengthen climate resilience. The program responds to barriers to climate action in regional and remote areas, including resourcing, expertise and access to information and guidance.

Climate alliances have been successfully implemented in other jurisdictions nationally where they have increased knowledge sharing and collaborative action at a regional scale. In Victoria eight 'Greenhouse Alliances' are now operating, covering over 70 local government areas across the state.

The Regional Climate Alliance program commenced in June 2021 with the establishment of two alliances involving 13 local governments across the Great Southern and Goldfields regions.

The first two alliances are:

- **South Coast Alliance** – including the City of Albany and the Shires of Denmark, Jerramungup and Plantagenet
- **Goldfields Voluntary Regional Organisation of Councils** – including the City of Kalgoorlie-Boulder and the Shires of Coolgardie, Dundas, Esperance, Laverton, Leonora, Menzies, Ngaanyatjarraku and Wiluna.

A $500,000 State Government program supports employment of Regional Climate Alliance Coordinators, and the delivery of emissions reduction and climate resilience projects.

Projects funded under the Regional Climate Alliance Program include an analysis of local government assets to identify cost-effective emission reduction and adaptation measures, and a carbon emissions baseline study that will enable prioritisation of future investment in local government projects.

The Departments of Water and Environmental Regulation and Local Government, Sport and Cultural Industries oversee the Regional Climate Alliance program and the Western Australian Local Government Association helps to administer the fund and provide advice and support.

The program will be evaluated and considered for possible expansion in mid-2023.

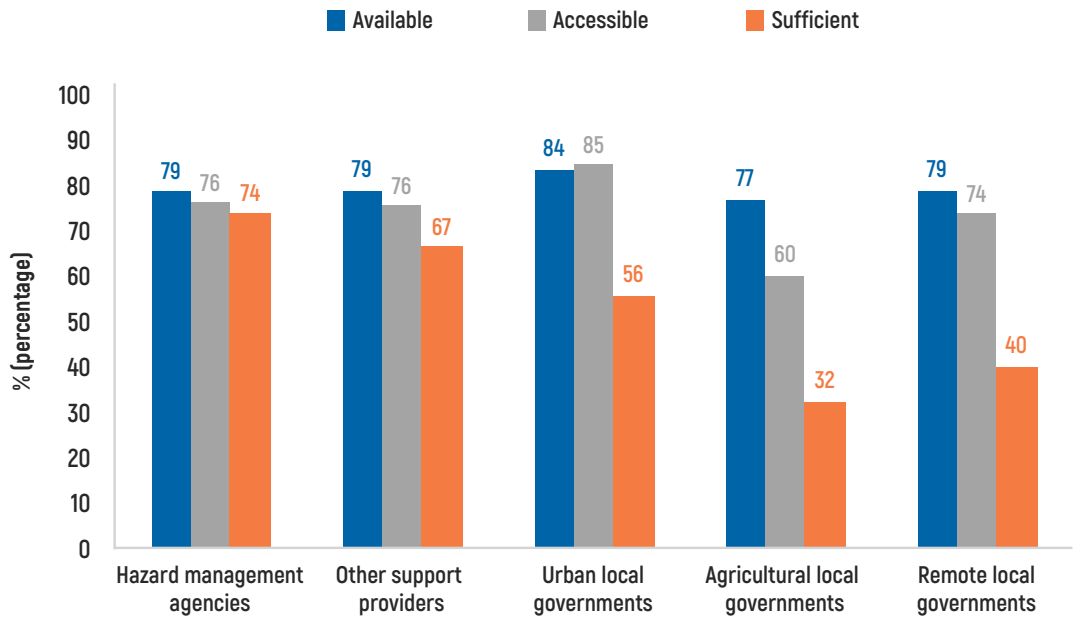
3. Results

Finance and administration

Most local governments indicated that funding is available and accessible for prevention, response, and recovery emergency management activities (Figure 10). Confidence in funding was highest among urban local governments, with 84 percent of these respondents reporting that emergency management funding is available and 85 percent that funding is accessible. Remote local government responses were similar to their urban counterparts, with 79 percent stating that funding for emergency activities is available and 74 percent saying funding is accessible. Agricultural local government responded somewhat differently from other local government types. While 77 percent of agricultural local governments responded that emergency management funding is available, only 60 percent indicated such funding is accessible.

Local governments were less certain of the sufficiency of funding for emergency management. Just 56 percent of urban local governments, 32 percent of agricultural local governments, and 40 percent of remote local governments responded that funding for emergency management activities is sufficient.

Figure 10 Percentage of organisations that consider funding for prevention, response and recovery activities to be available, accessible and sufficient.



Hazard management agencies and other support providers mostly responded that funding for emergency management activities is available, accessible, and sufficient. Across both respondent types, 79 percent of organisations responded that such funding is available and 76 percent said that funding is accessible. Seventy-four percent of hazard management agencies and 67 percent of other support providers indicated that emergency management funding is sufficient.

3. Results

3.3 Community involvement

The community involvement capability area is an assessment of the effectiveness of sharing emergency information with the community. This includes providing timely and accurate information about how to prepare for an emergency, what to do during the event, and how to recover afterward. Members of the community with access to such information are at less risk of harm during emergencies and their communities are more resilient to hazards.

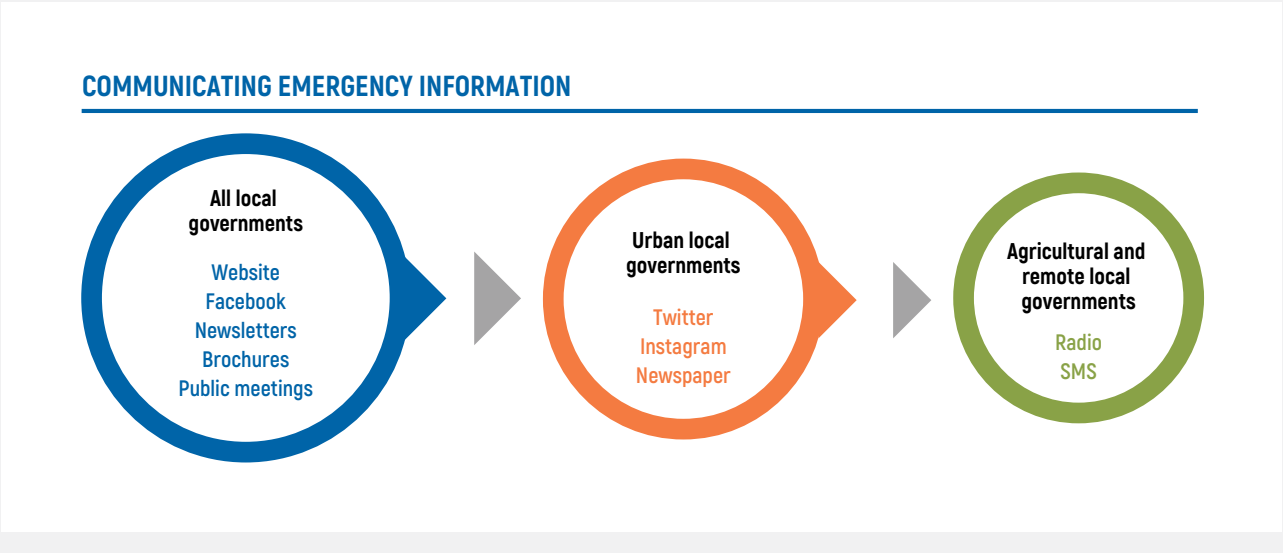
Communicating emergency information

Local governments reported using a variety of media to disseminate information to the community with some regional differences in the preferred method (Figure 11).

The information provided to the community is of high quality across the State, with between about 70 and 95 percent of all local government types describing their emergency information as being well coordinated, timely, reliable, actionable, clear, consistent, and accessible.

> **The Shire sends harvest and vehicle movement ban notifications through to ABC radio for announcement. It has also recently introduced SMS notifications for total fire bans etc.**
>
> Agricultural Local Government

Figure 11 Methods of communication predominantly used by local governments to communicate emergency management information to their communities.



3. Results

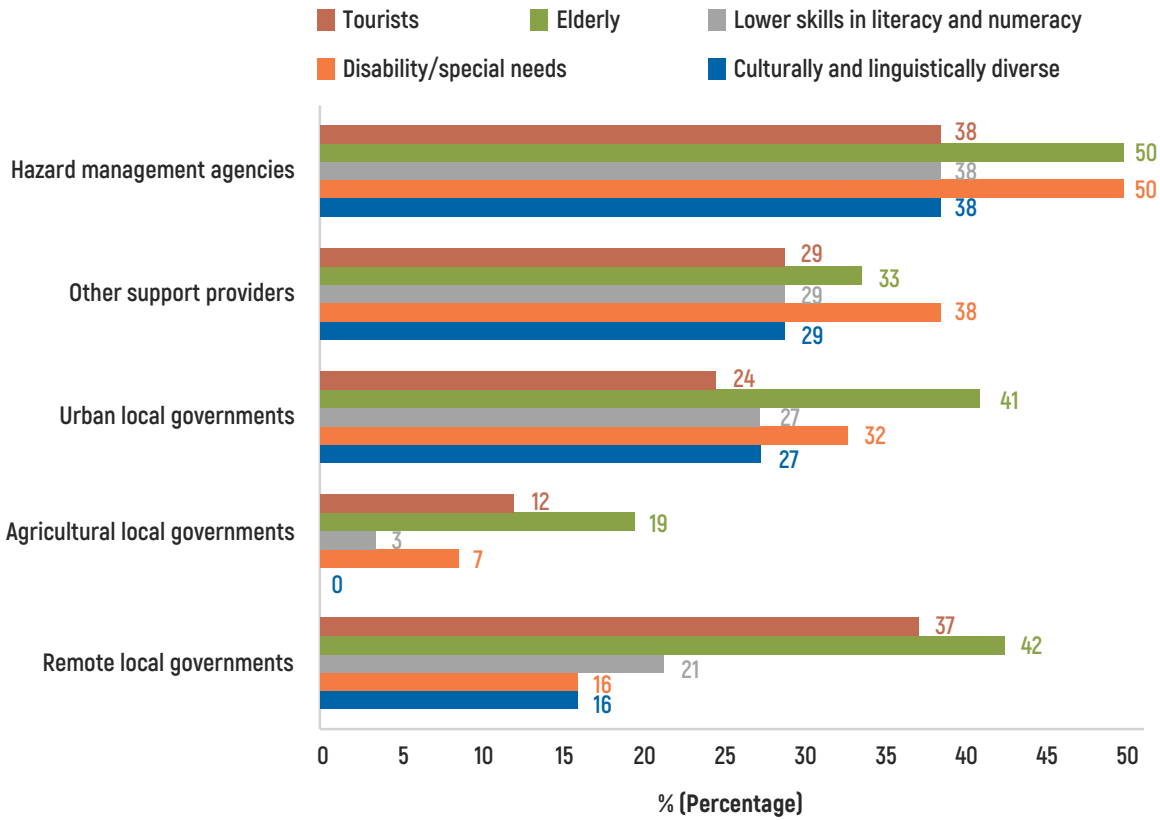
Communicating with at-risk groups

Culturally and linguistically diverse populations, people living with a disability or special needs, people with low literacy or numeracy, the elderly and tourists may all benefit from having communications better tailored to them. Across most respondent groups, a minority of organisations believe their emergency management communications are adequately accessible to these at-risk groups (Figure 12).

Hazard management agencies reported the greatest capability in communicating with at-risk groups, with 50 percent of these respondents indicating most or all of their emergency and hazard communications cater to the elderly and people living with a disability or special needs and 38 percent reporting their communications were similarly tailored to tourists, people with low levels of literacy and numeracy, or culturally and linguistically diverse communities.

Other support providers and urban local governments responded to this capability alike. Between about one-quarter and one-third of these organisations reported that most or all their emergency and hazard communications cater to at-risk groups.

Figure 12 Percentage of organisations reporting that most or all of their emergency and hazard information caters to at-risk groups.



3. Results

Few agricultural local governments indicated their communications are accessible to at-risk groups. None of these respondents reported that most or all their communications cater to culturally and linguistically diverse communities and less than 10 percent cater communications to community members with a disability, special needs, or lower level of literacy and numeracy. Remote local governments also reported low rates of catering to culturally and linguistically diverse communities and those with a disability or special needs.

Across all respondent groups, the elderly are best accommodated in communications and culturally and linguistically diverse groups are least well accounted for.

Risk awareness and understanding

Although most local governments reported high quality information is routinely provided to their communities, only about half of all local government respondents consider such information is widely understood or acted on by the community during emergencies.

The adoption of preparatory information by the community was particularly questioned by survey respondents, with 5 percent of urban local governments, 10 percent of agricultural local governments, and 16 percent of remote local governments believing that most households in their district have an emergency action plan.

Remote household	Agricultural household	Urban household
Most likely to have an emergency action plan	Most likely to monitor emergency messaging	Most likely to act on emergency messaging

Despite being most likely to have an emergency action plan, residents of remote local government areas were reported as being least likely to monitor and act on emergency messaging. Agricultural local governments considered their residents are most likely to monitor emergency messaging, but their urban counterparts were reported as being most likely to act after receiving a message.

Sharing risk information

Sharing information about risks and the plans to manage them is important to the principle of shared responsibility for emergency management. Risk and treatment information is particularly needed by the community to help people take personal responsibility for their safety during emergencies and develop greater resilience.

Hazard management agencies and local governments both reported being more likely to share risk information with state government agencies than with other local governments, industry, or the community. Sharing risk information was reported to be substantially more common in urban areas than agricultural or remote areas.

Survey results showed urban local governments are the most likely to share information with the community about risks, vulnerabilities, and treatment options, but less than a third do so routinely. Only about 15 percent of agricultural and remote local governments described sharing such information with the community.

3. Results

3.4 Planning and mitigation

Hazard planning and mitigation are essential for reducing the risks associated with emergencies. Planning involves formalising arrangements in advance of an emergency to ensure individuals, communities and organisations know their roles and responsibilities. Mitigation refers to the range of activities that can be undertaken in advance of an emergency to reduce its impact on people, communities, the economy and the environment.

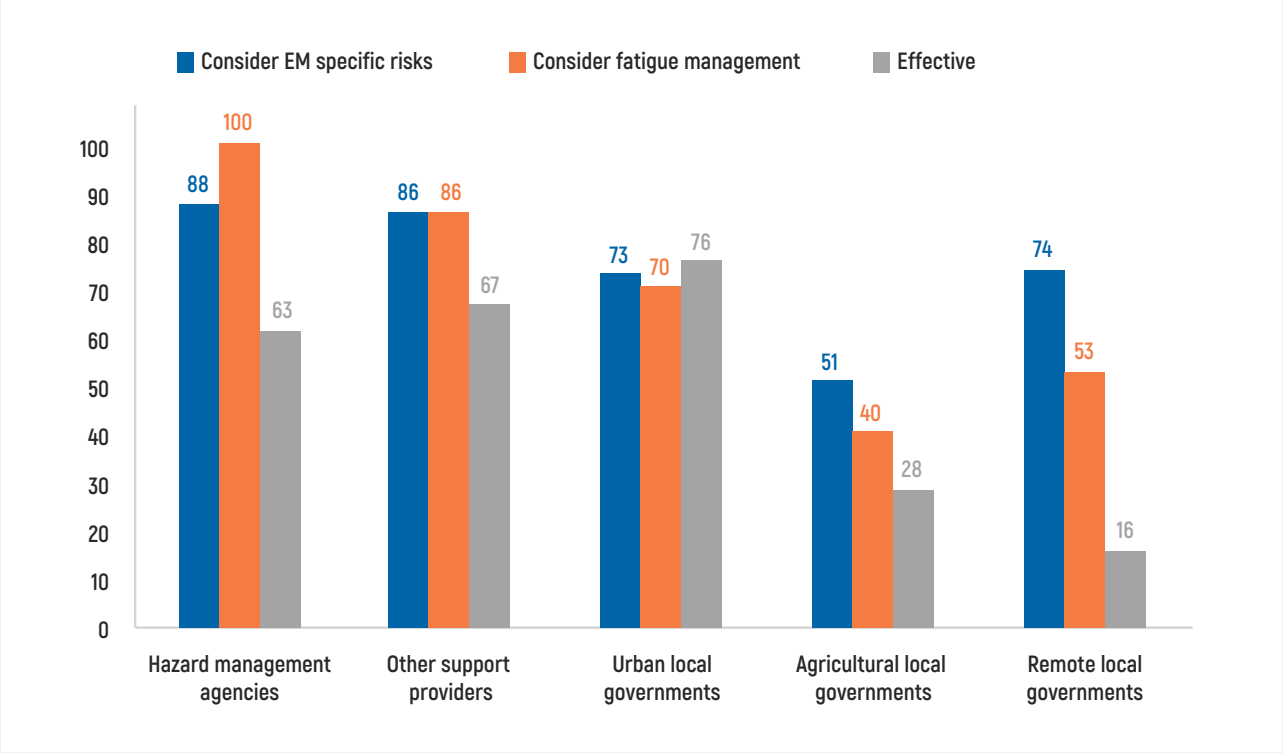
Business continuity planning

Ninety-one percent of all survey respondents confirmed having a business continuity plan. Of those, about three-quarters of urban local governments consider their business continuity plans to be effective, as do about two-thirds of hazard management agencies and other support providers (Figure 13). This means those organisations have formalised, tested, effective and reliable plans that are embedded within their organisation.

Many agricultural and remote local governments identified room for improvement in their business continuity plans, with just 28 percent and 16 percent of these respondents respectively describing their plans as effective.

Most organisations noted that their business continuity plans have considered emergency management-specific risks and strategies for fatigue management. Agricultural local governments were the exception to this, with 51 percent of these respondents reporting their business continuity plan considers emergency management-specific risks and 40 percent saying their plan considers fatigue management.

Figure 13 Percentage of organisations reporting business continuity plans consider emergency management specific risks, consider fatigue management and are effective.



Case Study

Cultural Burn Trial Completed in Denmark

An initiative merging cultural burning practice with contemporary fuel management took place in Denmark in May 2022.

The Shire of Denmark held a trial cultural burn near the shores of Wilson Inlet. The burn was held following a consultation process involving:

- seven Noongar families
- local Noongar Elders
- Binalup rangers
- the Shire of Denmark
- the Department of Fire and Emergency Services
- the University of Western Australia
- local Bush Fire Brigades.

The area for the demonstration trial was only small, but the significance of the event was large. It represented a step towards further collaboration between traditional custodians and emergency management authorities. An important precedent was also set in the Shire of Denmark's efforts to mitigate bushfire risk in a challenging landscape.

The Denmark community has a deep respect for the Minang and Bibbulmun Noongar people who cared for the land for many tens of thousands of years. Noongar Elder Carol Petterson was at the burn to make sure that cultural knowledge was incorporated. The trial was a valuable opportunity for two-way learning: listening to the old cultural ways, while also acknowledging the western science of today.

The continuing tradition of caring for country is a top priority in the Shire of Denmark, as is protecting the community from bushfire.
The success of this cultural burn trial is a key step in reducing fuel loads in close collaboration with traditional custodians.

Noongar Elder Carol Pettersen, Ocean Beach Bush Fire Brigade Fire Control Officer Hank Alberts and Deputy Chief Bush Fire Control Officer Nigel Marsh

3. Results

Infrastructure protection

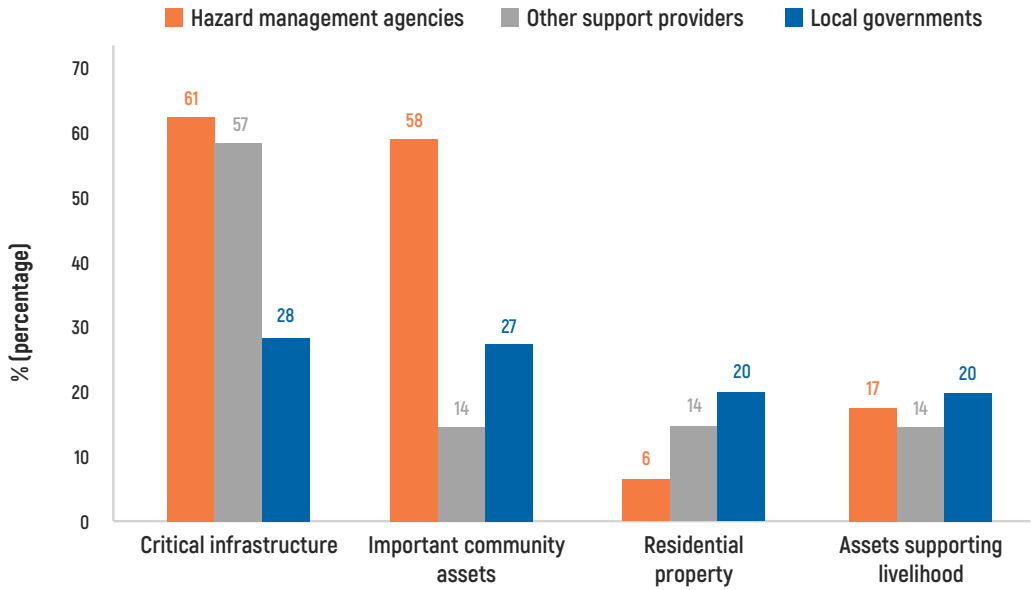
In 2022, over 90 percent of all survey respondents reported that they identify the likely impacts of hazards on critical infrastructure. Furthermore, 75 percent of all hazard management agencies and other support providers, and 93 percent of all local governments identify the likely impacts of hazards on important community assets.

The survey indicates an opportunity to improve planning to protect these assets. Organisations were asked about the status of their plans to protect critical infrastructure, important community assets, residential property and assets supporting individuals' livelihoods. Plans to protect critical infrastructure were reported to be formalised, tested and mostly or entirely effective, reliable and embedded by about 60 percent of hazard management agencies and other support providers. About 60 percent of hazard management agencies also reported having formalised plans to protect important community assets.

The State Emergency Management Framework doesn't require local governments to develop plans to protect critical infrastructure, important community assets, residential property or assets supporting individuals' livelihoods.

Despite this, between about 20 and 30 percent of local governments have developed, plans that are formalised, tested and mostly or entirely effective, reliable and embedded in their organisation (Figure 14).

Figure 14 Percentage of organisations reporting having plans to protect various asset types where plans are formalised, tested and mostly or entirely effective, reliable, and embedded within the organisation.



Case Study

Shire of Serpentine Jarrahdale increases the resilience of critical infrastructure to prepare for emergencies

Jarrahdale sits within the hills of the Darling Scarp, in the Shire of Serpentine Jarrahdale. The town is in a bushfire prone area and the Shire frequently undertakes work to manage the threat of bushfire to the community.

The Shire of Serpentine Jarrahdale identified a prolonged power outage due to bushfire as a major risk to Jarrahdale and surrounding communities. One impact of a prolonged power outage would be the loss of radio communications, as the radio tower that services the area relied on mains power to operate.

Recognising that the continued operation of the radio tower is essential to firefighting efforts, a study was conducted into ensuring the tower had a reliable supply of power. The study identified the most suitable option would be to install a backup generator with the ability to be remotely activated in the event of a power outage. The study also found that the site required a hazard separation zone to reduce the potential exposure of infrastructure to bushfire.

In collaboration with DFES and supported by the Mitigation Activity Fund Grant Program, the Shire of Serpentine Jarrahdale completed the following works to ensure the resilience of this piece of critical infrastructure:

1. The installation of a new backup generator that powers up when the radio tower loses mains power.
2. Clearing to create an asset protection zone around the radio tower, reducing the exposure of infrastructure to radiant heat from a bushfire and improving access to maintain diesel fuel supply if there is a long-term power outage.

These works were successfully completed prior to the 2021-22 bushfire season. Together, they have significantly enhanced the preparedness for bushfire of Jarrahdale and surrounding areas.

3. Results

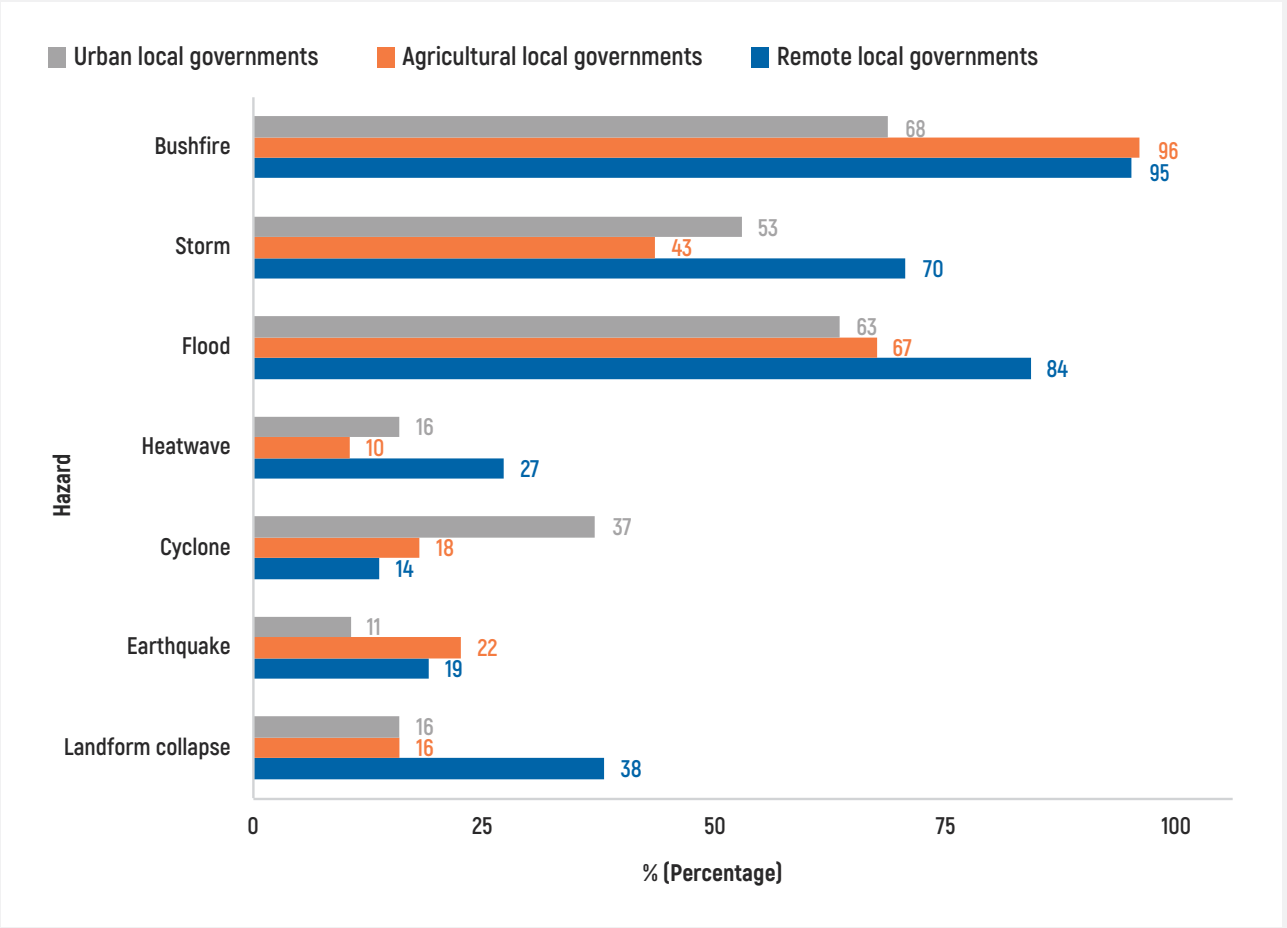
Land use planning

Land use planning is utilised by state government agencies and local governments to reduce the potential exposure of communities to hazards. In 2022, at least 95 percent of remote and agricultural local governments reported using land use planning to minimise the impacts of bushfire on the community (Figure 15). Fewer urban local governments reported considering bushfire in their land use planning decision making, noting not all urban local government areas feature significant areas of bushfire prone vegetation.

Flood was the next most frequently considered hazard in land use planning, with about two-thirds of urban and agricultural local governments and 84 percent of remote local governments indicating they account for this hazard in their land use planning decisions. Storm was also reported by 70 percent of remote local governments as a consideration for land use planning, while around half of urban and agricultural local governments planned around this hazard.

Relatively few local governments described using land use planning to minimise impacts associated with landform collapse, earthquake, cyclone, and heatwave, noting the relatively lower likelihood of these hazards occurring in any given local government area.

Figure 15 Percentage of local governments reporting using land use planning to minimise the impacts of hazards.



3. Results

3.5 Impact management and recovery

The impact management and recovery capability area relates to the emergency management sector's ability to:

- understand the effects of an emergency
- support affected people and communities during the event
- facilitate effective recovery afterward.

The impact management and recovery capability is underpinned by impact and recovery planning and enabled by having the skills and resources available to sustain the required recovery activities.

As the State Emergency Management Framework allocates responsibility for recovery to local government, most of the questions in this capability area were only posed to local government respondents. Recent events such as Tropical Cyclone Seroja and the Wooroloo bushfire have shown, however, that state government agencies have an important role to play when the magnitude or duration of the recovery effort overwhelms local capacity. This was supported by responses to the survey frequently citing the need for state government support.

> **The City would have the resources to support the recovery process in a lower-level emergency. In a major event, our resources may be overwhelmed, so we would require other assistance.**
>
> Urban local government

3. Results

Impact assessment

The agency controlling an emergency is responsible for coordinating the development of an impact statement assessing the impacts of the event on the social, built, economic and natural environments. The impact statement is provided to the local government at the conclusion of the response phase to guide recovery.

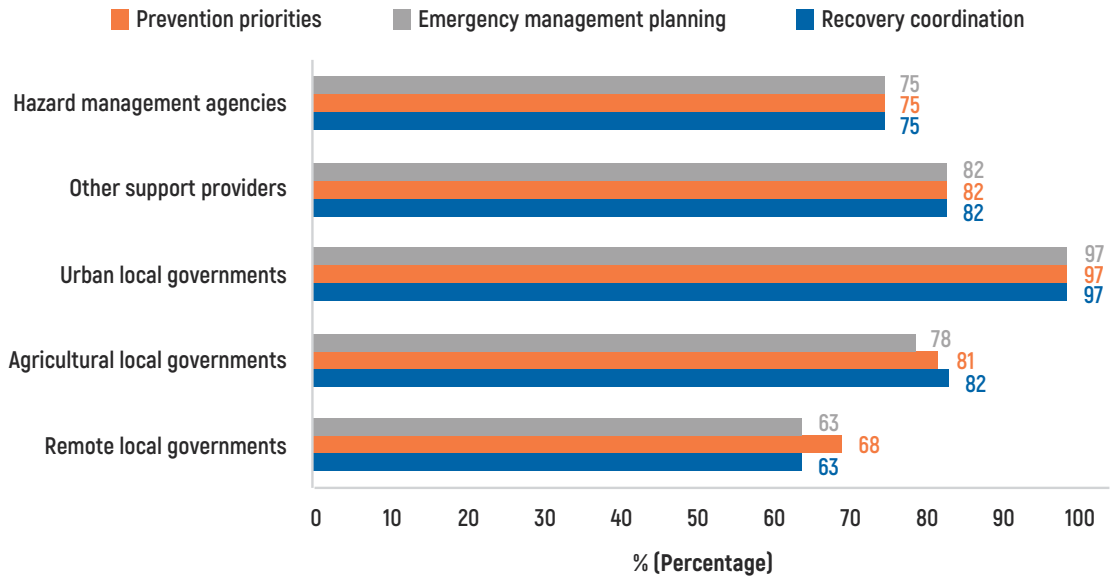
Responses to the 2022 survey suggest strong capability in impact assessment. Three quarters of hazard management agencies confirmed their ability to coordinate a comprehensive impact assessment, while 95 percent of urban local governments, 80 percent of agricultural local governments, and 57 percent of remote local governments affirmed their ability to contribute to a comprehensive impact assessment.

Survey responses also suggest the effectiveness of these impact assessments is high, with 97 percent of urban local governments, 82 percent of other service providers, and 75 percent of hazard management agencies reporting the findings of impact assessments are used to inform recovery coordination, emergency management planning, and prevention priorities (Figure 16).

About two-thirds of remote local governments used impact assessments to inform these emergency management activities.

> **An impact statement is used to collect information about all known and emerging impacts from a level 2 or level 3 incident, the current and future management actions and responsible agencies.**
>
> *State Emergency Recovery Procedure Impact Statement Guide (2021)*

Figure 16 Percentage of organisations reporting the findings of comprehensive impact assessments are used to inform emergency management activities.



3. Results

Recovery coordination

Under the Act, it is a function of local government to manage recovery following an emergency affecting the community in its district. To facilitate this, the State Emergency Management Policy requires local governments to develop a Local Recovery Plan and identify a Local Recovery Coordinator to manage recovery activities after an emergency.

If the requirements of recovery from an emergency exceed local capacity, the local government may request assistance from the State. The local government and the State Recovery Coordinator jointly decide an appropriate level of State involvement in recovery based on the capacity of the local governments involved to manage the recovery, the number of local governments affected and the complexity and duration of the recovery.

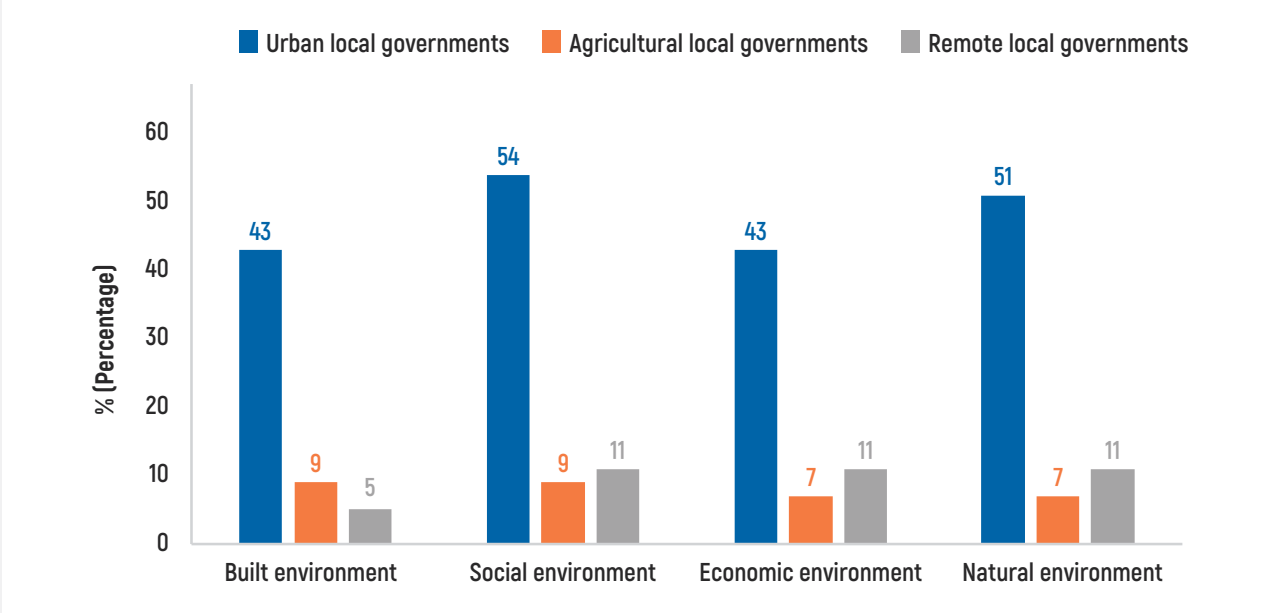
> **A protracted recovery response would be challenging for a small local government with limited resources to manage in conjunction with business as usual. We would require significant support, particularly in terms of personnel.**
>
> Agricultural local government

3. Results

In their survey responses, local governments reported challenges with resourcing recovery activities. Between about 5 and 10 percent of agricultural and remote local governments indicated they have comprehensive or substantial resources to support the restoration of built, social, economic and natural environments. Urban local governments expressed greater recovery capability, with between about 40 and 55 percent of these respondents reporting having substantial or comprehensive resources for restoration activities (Figure 17).

Sustaining recovery activities is also a challenge for local governments. About half of urban local governments reported having sufficient resources and skills to undertake recovery activities for three months, compared to about 10 percent of agricultural and remote local governments. About a third of urban local governments expressed they could sustain recovery activities for 12 months compared to only 1 percent of agricultural local governments and 5 percent of remote local governments.

Figure 17 Percentage of local governments reporting comprehensive or substantial resources to support restoration of built, social, economic and natural environments after an emergency.



3. Results

3.6 Governance

The governance capability area reflects the effectiveness of the legislation, policies and plans that support the State Emergency Management Framework. The SEMC, together with the sector, is continuously working to review and improve these documents to ensure they remain contemporary and fit for purpose.

Some of the activities the SEMC supported in 2021-22 to enhance the State's emergency management governance were:

- A review of the State Emergency Management Framework. Emergency management agencies, public authorities and entities with roles and responsibilities within the framework participated in a workshop and survey to identify key issues with the State emergency management documents.
- A review of the State emergency management incident level criteria descriptors and incident declaration process within the State Emergency Management Plan and Procedure. The descriptors guide agencies to determine the appropriate incident level; this review ensured the incident level criteria remain contemporary and fit for purpose.
- Completion of the Westplan rationalisation project. This project developed unified plans for hazards that have similar requirements in preparedness and response, with the following plans approved:
  - State Hazard Plan Maritime Environmental Emergencies
  - State Hazard Plan Severe Weather (interim).
- Further development of State Hazard Plans:
  - Endorsement of the State Hazard Plan Hostile Act following the addition of the hazard 'hostile act' to the EM Regulations in March 2020
  - Approval of the State Hazard Plans for Animal and Plant Biosecurity, and Tsunami following comprehensive review and accessibility redesign
  - Approval of the State Hazard Plan Energy Supply Disruptions and State Hazard Plan HAZMAT Annex B Space Re-entry Debris following redesign to improve accessibility and inclusivity.

Work to complete the accessibility and inclusivity redesign of the remaining State Emergency Management Framework documents will continue to progress throughout 2022-23.

> **The EM Act is currently an enabling legislation that has served the State well during the COVID-19 pandemic.**
>
> Other support provider

> **The suite of emergency management documents is a useful resource and ensures a consistent approach to emergency management across the local government sector.**
>
> Urban local government

3. Results

Responses to the survey

Responses to survey questions about the State Emergency Management Framework were largely positive. Less than one-quarter of all respondents reported issues or barriers that impact the effectiveness of the *Emergency Management Act 2005.* Urban local governments were slightly more likely to report such issues than other organisations (Figure 18).

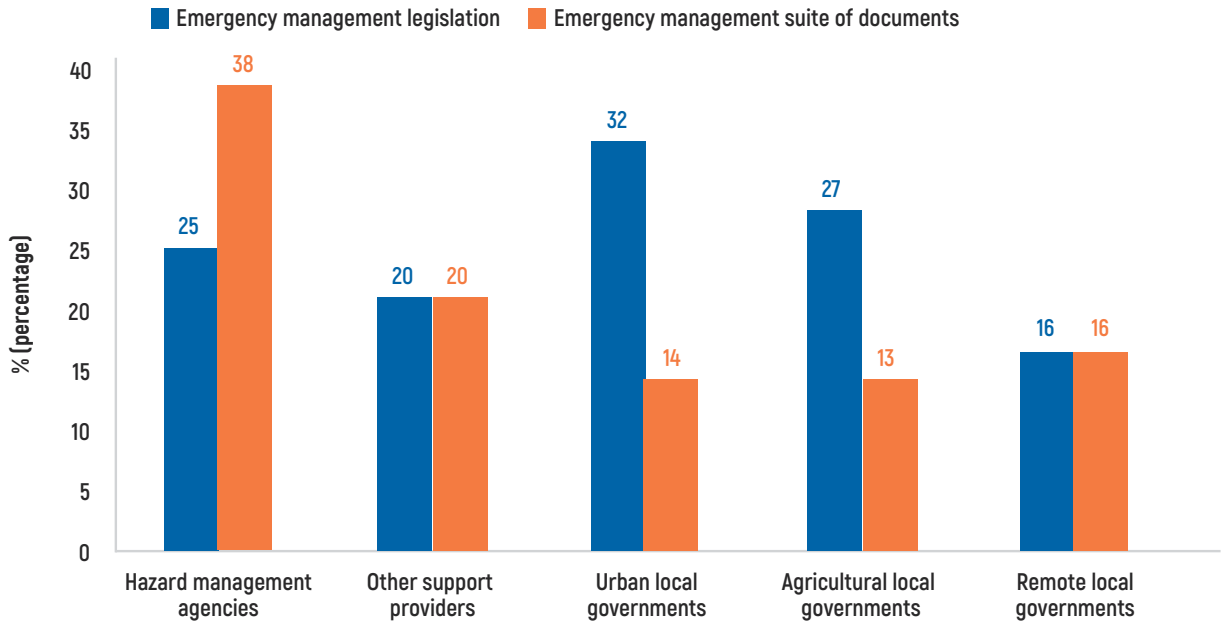
The issue most frequently cited by respondents that commented on the legislation was that the *Emergency Management Act 2005* is due for review. Lessons learned from the COVID-19 pandemic, a review of the recovery framework, climate change, and contemporary issues including cybersecurity were cited by respondents as warranting greater consideration in the emergency management legislation.

Issues with the suite of emergency management documents were reported by about 15 percent of all survey respondents. The documents considered when responding to this question were the State Emergency Management Policy and Plan, State Hazard Plans and Emergency Management Procedures, Guidelines, and Glossary.

Hazard management agencies were most likely to report issues with these documents, though only 38 percent of those organisations did so.

All hazard management agencies, and more than 85 percent of other service providers, confirmed in the survey they have processes and procedures in place to review, monitor, and amend their emergency management arrangements to ensure they are consistent with the emergency management legislation and the suite of emergency management documents.

Figure 18 Percentage of organisations that identified issues with the emergency management legislation or the emergency management suite of documents.



3. Results

3.7 Analysis and continuous improvement

WA's emergency management context is constantly evolving. Changes in the State's climate, demographics and land use patterns, and developments in best practice necessitate continuous improvement in the approach to emergency management. Accessing contemporary research helps the sector to better understand the ever-changing environment and associated changes in hazards. Incident reviews contribute to understanding the effectiveness of hazard interventions and improving approaches to incident management. The ability to use these tools to learn and adapt is essential to the State's resilience and the welfare of WA communities.

> **Disasters and disruptions provide an opportunity to learn. Distilling the causes and sharing experiences of what contributed to each disaster, providing evidence or unpicking what happened, all provide important opportunities to learn so that measures can be taken to reduce the chance of the same thing happening again.**
>
> Profiling Australia's Vulnerability (2018)

> **Debriefs and post incidents analysis processes are completed to evaluate possible improvements options to update policies, plans and standing operating procedures.**
>
> Agricultural Local Government

3. Results

Risk assessment

In WA, the analysis and continuous improvement capability is underpinned by a risk assessment process that considers multiple aspects of exposure and vulnerability to hazards.

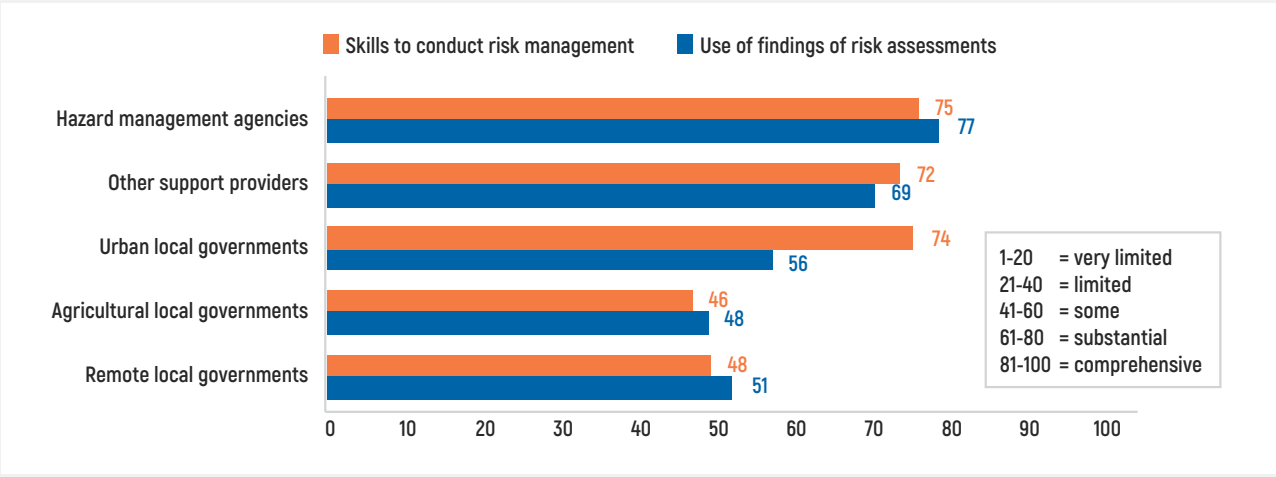
In the 2022 survey, hazard management agencies and other support providers described having substantial skills to conduct emergency management risk assessments. Further, these organisations said the findings of risk assessments to be of substantial use in improving processes or implementing treatments.

On average, urban local governments reported substantial skills in conducting risk assessments, and agricultural and remote local governments said they had some skills. All local government types, however, reported making only some use of the findings of risk assessments to improve processes or implement treatments (Figure 19).

Comments from local governments largely focused on resources to manage the risk assessment process, with consultants often engaged to complete this work.

The maintenance of risk registers appears to be well supported, with more than three quarters of all local governments reporting having Western Australia Emergency Risk Management Guide compliant risk registers in progress or complete for their local government areas.

Figure 19 Reported level of skill to undertake risk assessments, and value of the findings of risk assessments to improve processes or implement treatments.



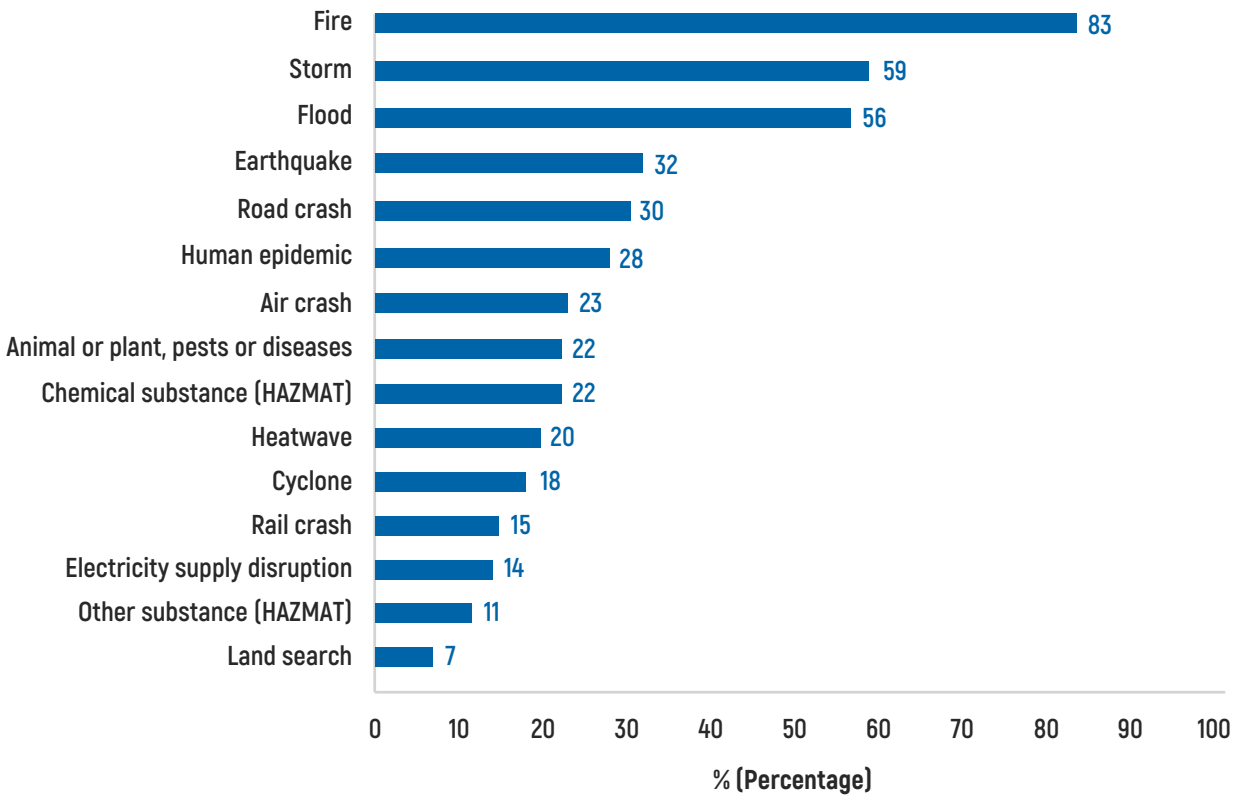
3. Results

Local governments conduct risk assessments for their five highest priority hazards. The hazards most frequently identified by local governments as high priority are bushfire, storm, flood, earthquake and road crash. Almost 85 percent of all local governments reported they had completed a risk assessment for bushfire, almost 60 percent for each of storm and flood and about 30 percent for earthquake and road crash.

Human and animal diseases had a high profile during 2021-22. About 28 percent of all local governments reported having conducted a risk assessment for human epidemic and 30 percent of agricultural local governments and 15 percent of remote local governments have conducted a risk assessment for animal or plant diseases or pests (Figure 20).

Historically heatwave is the deadliest natural hazard in Australia, a hazard which is growing in significance due to climate change[8]. The percentage of risk assessments by local governments for heatwave was 20.

Figure 20 Percentage of local governments with risk assessments for different hazards. Risk assessments are required for a local government's five highest priority hazards.



[8] Coates, L., van Leeuwen, J., Browning, S., Gissing, A., Bratchell, J., & Avci, A. (2022). Heatwave fatalities in Australia, 2001–2018: An analysis of coronial records. International Journal of Disaster Risk Reduction, 67, 102671.

3. Results

Lessons management

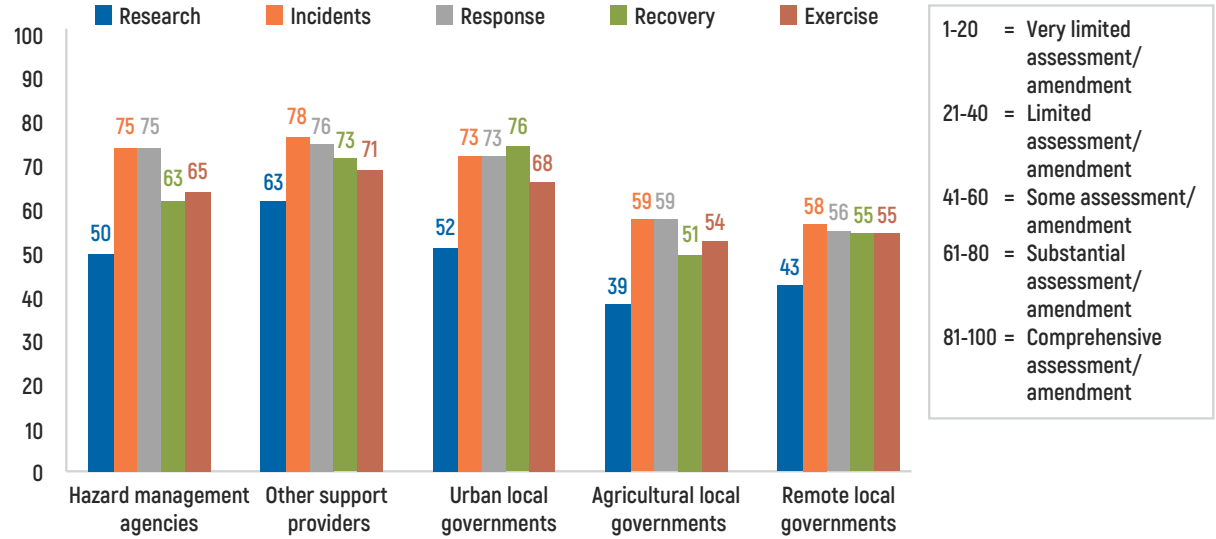
Lessons management refers to an organisation's ability to review its performance, identify and learn lessons, and implement the required changes to continually improve. Doing this consistently requires the organisation to have an effective lessons management process in place.

Urban local governments identified good capability in lessons management, reporting on average substantial evaluation of their performance following an incident, emergency response, emergency recovery, or exercise. Agricultural and remote local governments reported undertaking some evaluation of their performance, while hazard management agencies and other support providers indicate they undertake comprehensive evaluation, following an incident, emergency response, emergency recovery, or exercise.

The extent to which organisations assess or amend their plans, processes, or procedures in response to the conducted reviews varies. On average, hazard management agencies, other support providers, and urban local governments reported making substantial changes in response to reviews (Figure 21). Agricultural and remote local governments are reported making some changes to their plans, processes, or procedures following reviews.

Research, journal articles, and reports were reported as being least used as the basis to assess or amend plans, processes, or procedures across all organisation types.

Figure 21 The extent to which organisations assess and amend plans, processes or procedures in response to various sources of hazard information.



Case Study

Implementation of recommendations from the Wooroloo Independent Operational Review

Burning over 10,000 hectares in the Perth Hills in February 2021, the Wooroloo bushfire had a devastating impact on affected communities.

The State Government requested the Australasian Fire and Emergency Services Authorities Council (AFAC) undertake an independent operational review of the fire. Released in March 2022, the AFAC Interdependent Operational Review made 13 recommendations to improve bushfire prevention, preparedness, response, and recovery in WA.

The State Government accepted 10 of the recommendations in full, one was accepted in principle and two were noted.

Leading the response to the review, the Department of Fire and Emergency Services established the Wooroloo Implementation Coordination Group in May 2022.

The group's purpose is to coordinate and oversee the implementation of projects to address the recommendations.

To date, the Wooroloo Implementation Coordination Group has appointed project leads for each recommendation, established governance processes, and is engaging with stakeholders to make sure recommendation responses are clear and considered.

The Wooroloo Implementation Coordination Group has retained links with the AFAC Review panel members, ensuring that the Group fully understands the intent of the panel's recommendations and regularly assesses whether the implementation action is meeting that intent.

Case Study (cont.)

The Wooroloo Implementation Coordination Group is proving a highly effective model. The benefits of this approach include:

- Reporting is streamlined
- Project leads have direct accountability for the individual recommendations, which will occur over multiple years
- The Group is a one stop shop for enquiries broadly related to the Wooroloo review, reducing duplication of requests for information
- Relevant information can be collated and tailored for a range of different audiences, underpinned by consistent and appropriate key messages
- Risks can be identified across the portfolio, rather than just for individual recommendations
- Continuity of personnel has enhanced knowledge transfer and understanding of operational requirements, lessons learned and opportunities for improvement
- Project leads can focus on responding to their allocated recommendations as portfolio-level risks, requests and reporting are managed by the coordination group.

Future Considerations

Initial observations from the response to the Wooroloo review have highlighted the importance of good governance and adequate resourcing to allow lessons identified by reviews to become lessons learned by the emergency management sector. This includes the establishment of coordination groups and investigating how to best facilitate oversight and coordination of multiple reviews and enquiries.

3. Results

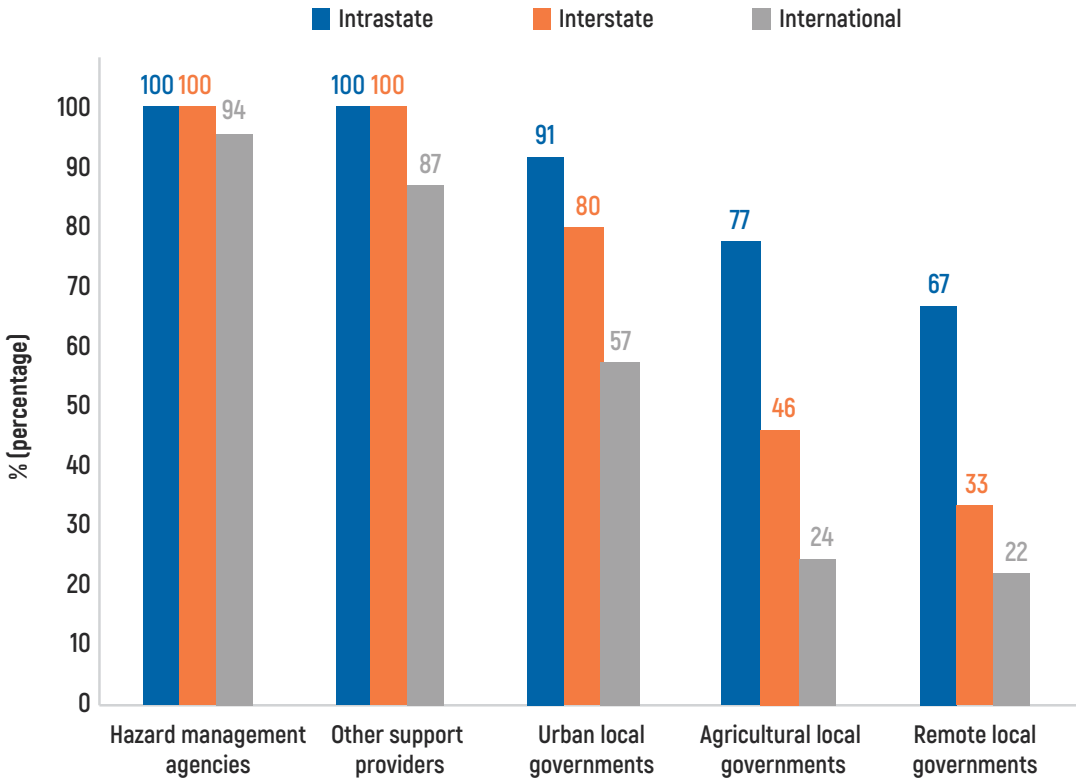
Horizon scanning

Horizon scanning is an organisation's tendency to monitor developments in best practice by monitoring information sources such as research, journal articles, and reviews in other jurisdictions. Responses to questions about horizon scanning revealed that hazard management agencies, other support providers, and urban local governments are more likely to monitor such information than agricultural or remote local governments.

All hazard management agencies and other support providers described some monitoring of intrastate and interstate incidents for transferable lessons (Figure 22). Ninety-four percent of hazard management agencies and 87 percent of other service providers also reported some monitoring of international incidents.

Ninety-one percent of urban, 77 percent of agricultural and 67 percent of rural local governments indicated they undertake some monitoring of incidents that occur in WA. Urban local governments are also likely to monitor incidents occurring in other Australian jurisdictions, with 80 percent of respondents saying they do so at least some of the time. Agricultural and remote local governments are somewhat less likely to monitor interstate incidents.

Figure 22 Percentage of organisations that report undertaking at least some monitoring of local, national, or international incidents.



04
Conclusion

4. Conclusion

The 2022 Emergency Preparedness Report describes a wide range of organisational capacity in relation to the core capabilities of the SEMC Capability Framework.

WA's most developed core capabilities in 2022 are:

- Impact assessment
- Evacuation and welfare
- Situational assessment
- Public information
- Business continuity planning
- Finance and administration

Core capabilities with the most opportunity for improvement are:

- Infrastructure protection
- Recovery resources
- Recovery skills
- Equipment and critical resources
- Sector information sharing

It is noteworthy that many of the capabilities that have shown the greatest improvement in recent years are areas where the State has invested considerable effort. For example, the special inquiry into the January 2016 Waroona bushfire[9] identified the need for better provision of public information during emergencies. This was subsequently prioritised by elevating the visibility and resourcing of the public information unit within Incident Management Teams. Public information quality is now rated as one of the State's most developed capabilities.

Agency interoperability has also been an area of focus, particularly since the 2015 Major Incident Review of the Lower Hotham and O'Sullivan fires[10] identified a need for improvement in this area. The 2022 Emergency Preparedness Report shows that this capability continues to grow.

Meanwhile, the significant improvement in the business continuity planning capability identified in the 2022 Emergency Preparedness Report is attributable to the requirement to maintaining business functions during the COVID-19 pandemic.

The results of the 2022 Annual and Preparedness Report Capability Survey identified where the State has made advances in the development of core capabilities, while recognising areas for improvement. The results highlighted in this report, combined with the effective inter-connectiveness of the WA emergency management sector during the year's emergencies, highlights the continuing preparedness of the State.

[9] Ferguson, E. (2016). Report of the special inquiry into the January 2016 Waroona fire.

[10] Nous Group. 2015.

05

Ongoing capability improvement

5. Ongoing capability improvement

The WA emergency management sector is continuing to advance projects aimed at addressing areas where greater capability is needed.

Impact management and recovery

In recognition of current recovery challenges, a State Disaster Recovery working group has been established to identify and address gaps and opportunities necessary to improve the State's capability in this area.

Community involvement

The WA Community Disaster Resilience Strategy is being progressed with SEMC support. This strategy will provide guiding principles and an outcomes framework to support the efficient use of resources and minimise duplication across the sector.

Planning and mitigation

The local government sector is leading a review of Local Emergency Management Arrangements. The review aims to refresh and reshape arrangements to better fit with the changing landscape of emergency management and ensure they are fit-for-purpose, contemporary, scalable, and sustainable.

Resources

WA continues to ensure that approaches to managing disaster risk align with international frameworks. The mid-term review of the Sendai Framework for Disaster Risk Reduction will be presented at a special meeting of the United Nations General Assembly in 2023. The recommendations of that review will trigger changes to Australia's National Disaster Risk Reduction Framework and the supporting National Action Plan. A review of the WA Implementation Plan for the National Disaster Risk Reduction Framework will be conducted in 2023-24 to ensure the plan continues to to reflect best practice and align with the national framework.

Alignment with the National Disaster Risk Reduction Framework is also a key enabler of WA's success in winning Commonwealth grant funding for disaster risk reduction initiatives. The 2022 National Disaster Risk Reduction grant program saw more than $3 million distributed to local governments, state government agencies, and non-government organisations to support disaster risk reduction initiatives.

The Australian Government recently announced plans to create the Disaster Ready Fund, allowing up to $200 million to be made available to the states and territories each year for disaster risk reduction initiatives. Work continues with the National Emergency Management Agency to ensure Western Australia is positioned to benefit from this new source of funding.

Governance

The SEMC has released its 2022-25 Strategic Plan. The Plan provides direction to SEMC subcommittees and local and district emergency management committees on the objectives of the SEMC. The release of the plan will be supported by a comprehensive review of SEMC operational governance structures, including the structure, reporting relationships, roles and responsibilities of SEMC subcommittees and reference groups. The review will ensure that WA's emergency management sector continues to benefit from thorough and effective governance.

Appendix A:
Survey respondents

Appendix A: Survey respondents

- Arc Infrastructure
- ATCO Gas Australia
- Australian Gas Infrastructure Group
- Australian Red Cross
- Bureau of Meteorology
- City of Albany
- City of Armadale
- City of Bayswater
- City of Belmont
- City of Bunbury
- City of Busselton
- City of Canning
- City of Cockburn
- City of Fremantle
- City of Gosnells
- City of Greater Geraldton
- City of Joondalup
- City of Kalgoorlie-Boulder
- City of Karratha
- City of Kwinana
- City of Mandurah
- City of Melville
- City of Nedlands
- City of Perth
- City of Rockingham
- City of South Perth
- City of Stirling
- City of Subiaco
- City of Swan
- City of Vincent
- City of Wanneroo
- Department of Fire and Emergency Services
- Department of Biodiversity, Conservation and Attractions
- Department of Communities
- Department of Defence
- Department of Education
- Department of Health
- Department of Planning, Lands and Heritage
- Department of Primary Industries and Regional Development
- Department of the Premier and Cabinet
- Department of Transport - Maritime
- Department of Water and Environmental Regulation
- Energy Policy WA
- Forest Products Commission
- Horizon Power
- Main Roads WA
- NBN Co
- Public Transport Authority
- Shire of Ashburton
- Shire of Augusta-Margaret River
- Shire of Beverley
- Shire of Boddington
- Shire of Boyup Brook
- Shire of Brookton
- Shire of Broomehill-Tambellup
- Shire of Bruce Rock
- Shire of Capel
- Shire of Carnamah
- Shire of Carnarvon
- Shire of Chittering
- Shire of Collie
- Shire of Coolgardie
- Shire of Coorow
- Shire of Corrigin
- Shire of Cranbrook
- Shire of Cuballing
- Shire of Cue
- Shire of Cunderdin
- Shire of Dalwallinu
- Shire of Dandaragan
- Shire of Dardanup
- Shire of Denmark
- Shire of Derby-West Kimberley
- Shire of Donnybrook-Balingup
- Shire of Dowerin
- Shire of Dumbleyung
- Shire of Dundas
- Shire of East Pilbara
- Shire of Esperance
- Shire of Exmouth

Appendix A: Survey respondents (Cont.)

Shire of Gingin	Shire of Morawa	Shire of Three Springs	Town of East Fremantle
Shire of Gnowangerup	Shire of Mount Marshall	Shire of Toodyay	Town of Mosman Park
Shire of Goomalling	Shire of Mukinbudin	Shire of Trayning	Town of Port Hedland
Shire of Harvey	Shire of Mundaring	Shire of Upper Gascoyne	Town of Victoria Park
Shire of Irwin	Shire of Murchison	Shire of Victoria Plains	Western Australia Council of Social Service
Shire of Jerramungup	Shire of Murray	Shire of Wagin	WA Local Government Association
Shire of Kalamunda	Shire of Nannup	Shire of Wandering	Water Corporation
Shire of Katanning	Shire of Narembeen	Shire of Waroona	Western Australia Police Force
Shire of Kent	Shire of Narrogin	Shire of West Arthur	Western Power
Shire of Kojonup	Shire of Ngaanyatjarraku	Shire of Wickepin	
Shire of Koorda	Shire of Northam	Shire of Wiluna	
Shire of Kulin	Shire of Northampton	Shire of Woodanilling	
Shire of Lake Grace	Shire of Peppermint Grove	Shire of Wyalkatchem	
Shire of Laverton	Shire of Perenjori	Shire of Wyndham-East Kimberley	
Shire of Leonora	Shire of Pingelly	Shire of Yalgoo	
Shire of Manjimup	Shire of Plantagenet	Shire of Yilgarn	
Shire of Meekatharra	Shire of Quairading	Shire of York	
Shire of Menzies	Shire of Ravensthorpe	St John Ambulance Western Australia	
Shire of Merredin	Shire of Serpentine-Jarrahdale	Telstra	
Shire of Mingenew	Shire of Shark Bay	Town of Bassendean	
Shire of Moora	Shire of Tammin	Town of Claremont	

GOVERNMENT OF WESTERN AUSTRALIA

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STATE EMERGENCY MANAGEMENT COMMITTEE

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