



Somerset Local Disaster Management Group

Local Disaster Management Plan (2022)

V4.1



Somerset
REGIONAL COUNCIL

Emergency Contacts

In an emergency, always dial 000	TTY Emergency call 106
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Radio ABC 612 AM http://www.abc.net.au/brisbane/ Phone: 1300 222 612 River 94.9 FM http://www.river949.com.au Phone: 07 3813 1949	Telecommunications Telstra Phone: 13 22 03 Optus Personal Phone: 131 344 Business Phone: 133 343 Vodafone Phone: 1800 914 408 NBN Contact your retailer
Traffic and Transport Phone: 131940 or www.qldtraffic.qld.gov.au	Health 13 HEALTH (13 432584)
Somerset Regional Council General enquiries 07 5424 4000 (including emergencies – all hours) www.somerset.qld.gov.au www.facebook.com/somersetregionalcouncil	National Relay Service Teletypewriter Phone: 133 677 Speak and listen Phone: 1300 555 727 SMS relay Phone: 0423 677 767 Captioned relay users
Water & Sewerage Urban Utilities Faults & Emergencies Phone: 13 26 64 General Enquiries Phone: 13 26 57	Bureau of Meteorology http://www.bom.gov.au/qld/

Foreword

Somerset Region is a dynamic area of the Brisbane Valley in southeast Queensland and is one of the fastest growing regions in Queensland.

Despite its idyllic lifestyle, the area is occasionally subjected to the impact of disasters both natural and non-natural. In the past few years, we have seen the impacts of fast moving, high impact bushfires, the COVID-19 pandemic, and east coast lows pressuring the many dams across the region and the associated riverine flooding.



The region has a wide range of topography, changing demographics and diversified industries; therefore, this dynamic and robust Local Disaster Management Plan (LDMP) is designed to meet the many challenges that threaten the growth we enjoy.

This LDMP, prepared by the Somerset Local Disaster Management Group (LDMG) under the authority of the [Disaster Management Act 2003](#)¹ forms the basis and guidelines for the prevention of, preparedness and response to and the recovery from disasters and emergencies including the activities of the joint agencies within the Somerset Regional Council area.

This LDMP is a dynamic document which will be regularly reviewed to ensure not only the LDMG changes in legislation but reflect lessons identified from natural disasters across the Somerset region and elsewhere in the state.

Whilst as a community we may not be able to prevent disaster from occurring, we can, through planning, prepare our community and enhance its resilience to the adverse impact of any threat.

Cr Graeme Lehmann
Mayor
Chair
Somerset Local Disaster Management Group

¹ <https://www.legislation.qld.gov.au/view/pdf/inforce/current/act-2003-091>

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Plan Endorsement

Section 80(1)(b) of the Act requires Somerset Regional Council to approve this Local Disaster Management Plan.

In accordance with the provisions of the *Disaster Management Act 2003*, the Somerset Local Disaster Management Plan was approved by the Somerset Local Disaster Management Group on 17 August 2022.

Signed/Dated: _____

Cr Graeme Lehmann (Mayor)
Chair
Somerset Local Disaster Management Group

Signed/Dated: _____

Andrew Johnson
Chief Executive Officer
Somerset Regional Council

Version Control

The initial version of the plan and subsequent amendments of a procedural nature must be approved by the Somerset Local Disaster Management Group, Somerset Regional Council and reviewed by the Disaster District Coordinator (Ipswich).

Amendments of a minor nature, e.g., formatting, legislation references, typographical errors, contact names, addresses, telephone numbers etc. will be handled administratively by Somerset Regional Council and ratified at the next Local Disaster Management Group meeting.

Version	Date	Author	Comments
v1.0	1/12/2007	KTG Engineering	Initial version of plan under QDMP Guidelines 2005 & Operational Plan Guidelines 2006.
v2.0	15/02/2012	Somerset Regional Council	Changes to bring in line with amendments to the Act and current arrangements
V2.1	21/11/2012	Somerset Regional Council	Updated as part of Annual Review
V2.2	30/09/2013	Somerset Regional Council	Updated as part of Annual Review
V2.3	31/08/2014	Somerset Regional Council	Updated as part of Annual Review
V2.4	31/08/2015	Somerset Regional Council	Minor changes, including contacts
V3.0	1/10/2018	Somerset Regional Council	Minor changes, including contacts
V4.0	30/06/2022	Somerset Regional Council	2022 review and modernisation of plan
V4.1	30/10/2022	Somerset Regional Council	Minor changes

Abbreviations

Table 1 below provides the abbreviations used in the Somerset LDMP, and their definitions.

Term	Definition
ABS	Australian Bureau of Statistics
ADSL	Asymmetric Digital Subscriber Line
AEP	Annual Exceedance Probability
AIDR	Australian Institute of Disaster Resilience
the Act	<i>Disaster Management Act, 2003</i>
BCP	Business Continuity Plan
BoM	Bureau of Meteorology
CASA	Civil Aviation Safety Authority
CDA	Comprehensive Damage Assessment
DA	Damage Assessment
DAF	Department of Agriculture and Fisheries
DCHDE	Department of Communities, Housing and Digital Economy
DDC	District Disaster Coordinator
DDMG	District Disaster Management Group
DDCC	District Disaster Coordination Centre
DES	Department of Environment and Science
DM	Disaster Management
DRFA	Disaster Recovery Funding Arrangements
DTMR	Department of Transport and Main Roads
EA	Emergency Alert
EAP	Emergency Action Plan
EMAF	Emergency Management Assurance Framework
EWN	Early Warning Network
the Guideline	Disaster Management (DM) Guideline
HAZMAT	Hazardous Materials
HHS	Hospital and Health Service
IMS	Incident Management System
IMT	Incident Management Team
IGEM	Inspector General, Emergency Management
LDC	Local Disaster Coordinator
LDCC	Local Disaster Coordination Centre
LDMG	Local Disaster Management Group
LDMP	Local Disaster Management Plan
LGA	Local Government Area
LMF	Lessons Management Framework (IGEM)
LRC	Local Recovery Coordinator
LRG	Local Recovery Group
MOU	Memorandum of Understanding
NBN	National Broadband Network
NDIS	National Disability Insurance Scheme

Term	Definition
NSR	National Situation Room
PPRR	Prevention, Preparedness, Response and Recovery (phases of Disaster Management)
QAS	Queensland Ambulance Service
QDMA	Queensland Disaster Management Arrangements
QDTMF	Queensland Disaster Training Management Framework
QERMF	Queensland Emergency Risk Management Framework
QEMR	Queensland Emergency Management Report
QDMC	Queensland Disaster Management Committee
QFES	Queensland Fire and Emergency Services
QPS	Queensland Police Service
QPSAAO	Queensland Public Safety Agencies ArcGIS Online Organisation
QRA	Queensland Reconstruction Authority
the Regulation	<i>Disaster Management Regulation (2014)</i>
SDCC	State Disaster Coordination Centre
SDRA	State Disaster Relief Arrangements
SES	State Emergency Service
SEWS	Standard Emergency Warning Signal
SDC	State Disaster Coordinator
SDMP	State Disaster Management Plan
SITREP	Situation Report
SPF	Queensland Disaster Management 2016 Strategic Policy Framework
SRC	Somerset Regional Council
SPF	Strategic Policy Framework
the Standard	Standard for Disaster Management in Queensland
USAR	Urban Search and Rescue
VQ	Volunteering Queensland

Table 1: Abbreviations used within the Somerset Local Disaster Management Plan

Definitions

Table 2 below provides definition for terms used within the Somerset LDMP.

Term	Definition
Alert	Refer to LDMG Activation Levels .
Community	A social group with a commonality of association and generally defined by location, shared experience or function, and with a number of things in common such as culture, heritage, language, ethnicity, pastimes, occupation or workplace ² .
(Community) Resilience	The ability of a system, community or society exposed to hazards to resist, absorb, accommodate, adapt to, transform and recover from the effects of a hazard in a timely and efficient manner, including through the preservation and restoration of its essential basic structures and functions through risk management ³ .
Coordination	The bringing together of organisations and elements to ensure an effective response, primarily concerned with the systematic acquisition and application of resources (organisation, manpower and equipment) in accordance with the requirements imposed by the threat or impact of an emergency. Coordination relates primarily to resources, and operates, vertically, within an organisation, as a function of the authority to command, and horizontally, across organisations, as a function of the authority to control ⁴ .
Coordination Centre	A centre established at local, district and state levels that support disaster management groups in coordinating information, resources and services necessary for disaster operations ⁵ .
Disaster District	A level of disaster management as prescribed by s22 of the <i>Disaster Management Act, 2003</i> .
Disaster management functions	The services essential to managing the impacts and consequences of an event ⁶ .
Disaster mitigation	Measures taken in advance of a disaster aimed at decreasing or eliminating its impact on society and environment ⁷ .
Disaster operations	The activities undertaken before, during or after an event happens to help reduce loss of human life, illness or injury to humans, property loss or damage, or damage to the environment, including, for example, activities to mitigate the adverse effects of the event ⁸ .
Disaster preparedness	All activities undertaken in advance of the occurrence of an incident to decrease the impact, extent and severity of the incident and to ensure more effective response activities ⁹ .
Disaster response	The phase of disaster operations that relates to responding to a disaster ¹⁰ .

² Australian Institute of Disaster Resilience, Glossary, <https://knowledge.aidr.org.au/glossary/>

³ Australian Institute of Disaster Resilience, Glossary, <https://knowledge.aidr.org.au/glossary/>

⁴ Australian Institute of Disaster Resilience, Glossary, <https://knowledge.aidr.org.au/glossary/>

⁵ Queensland Government, Queensland Fire and Emergency Services, PPRR Guidelines s. 2.1.1 p.5

⁶ *Disaster Management Act, 2003* s.14

⁷ Australian Institute of Disaster Resilience, Glossary, <https://knowledge.aidr.org.au/glossary/>

⁸ *Disaster Management Act, 2003* s.15

⁹ Australian Institute of Disaster Resilience, Glossary, <https://knowledge.aidr.org.au/glossary/>

¹⁰ *Disaster Management Act, 2003* s.21 (2) (c)

Term	Definition
Disaster response capability	The ability to provide equipment and a suitable number of persons, using the resources available to the local government, to effectively deal with, or help another entity to deal with, an emergency situation or a disaster in the local government's area ¹¹ .
Disaster recovery operations	The phase of disaster operations that relates to recovering from a disaster ¹² .
Disaster relief	The provision of immediate shelter, life support and human needs of persons affected by, or responding to, an emergency. It includes the establishment, management and provision of services to emergency relief centres ¹³ .
Disaster risk assessment (expected outcome)	The substantial reduction of disaster risk and losses in lives, livelihoods and health and in the economic, physical, social, cultural and environmental assets of persons, businesses, communities and countries ¹⁴ .
District Disaster Coordinator	A person appointed under s25 of the <i>Disaster Management Act, 2003</i> who is responsible for the coordination of disaster operations in the disaster district for the District Disaster Management Group.
Emergency	It should be noted that in some jurisdictions the term <i>emergency</i> is used interchangeably with <i>disaster</i> . In Queensland the terms <i>disaster</i> , <i>disaster management</i> and <i>disaster operations</i> are used interchangeably.
Event	Any of the following: <ul style="list-style-type: none"> • A cyclone, earthquake, flood, storm, storm tide, tornado, tsunami, volcanic eruption or other natural happening. • An explosion or fire, a chemical, fuel or oil spill, or a gas leak. • An infestation, plague or epidemic. • A failure of, or disruption to, an essential service or infrastructure. • An attack against the State. • Another event similar to an event mentioned in paragraphs above. An event may be natural or caused by human acts or omissions ¹⁵ .
Functional lead agency	An agency allocated responsibility to prepare for and provide a disaster management function and lead relevant organisations that provide a supporting role ¹⁶ .
Guidelines	Developed under s63 of the <i>Disaster Management Act, 2003</i> by Queensland Fire and Emergency Services. Accessible here ¹⁷ .
Hazard	A source of potential harm or a situation with a potential to cause loss ¹⁸ .
Lean forward	Refer to LDMG Activation Levels

¹¹ *Disaster Management Act, 2003* s.80 (2)

¹² *Disaster Management Act, 2003* 21E (2)

¹³ Australian Institute of Disaster Resilience, Glossary, <https://knowledge.aidr.org.au/glossary/>

¹⁴ United Nations Office for Disaster Risk Reduction, Sendai Framework for Disaster Risk Reduction p. 35

¹⁵ *Disaster Management Act, 2003* s.16

¹⁶ Queensland Government, Queensland Fire and Emergency Services, Glossary, p.94

¹⁷ <https://www.disaster.qld.gov.au/dmg/Documents/QLD-Disaster-Management-Guideline.pdf>

¹⁸ Australian Institute of Disaster Resilience, Glossary, <https://knowledge.aidr.org.au/glossary/>

Term	Definition
Local Disaster Coordinator	A person appointed under s26 of the <i>Disaster Management Act, 2003</i> who is responsible for the coordination of disaster operations for the Local Disaster Management Group.
Mitigation	Measures taken in advance of a disaster aimed at decreasing or eliminating its impact on society and the environment ¹⁹ .
Primary agency (Hazard Specific)	An agency allocated responsibility to prepare for and respond to a specific hazard based on their legislated and/or technical capability and authority ²⁰ .
QDMA	Queensland's disaster management arrangements are based on partnerships between the community, and groups at the local, district, state and Commonwealth levels to deliver coordinated, cooperative and integrated outcomes. Each level within the arrangements is enabled by disaster management groups working collaboratively to deliver effective disaster management across Queensland ²¹ .
Recovery	The coordinated process of supporting emergency-affected communities in reconstruction of the physical infrastructure and restoration of emotional, social, economic and physical well-being. Measures which support emergency-affected individuals and communities in the reconstruction of the physical infrastructure and restoration of emotional, economic and physical well-being ²² .
Residual risk	The disaster risk that remains in unmanaged form, even when effective disaster risk reduction measures are in place, and for which emergency response and recovery capacities must be maintained. The presence of residual risk implies a continuing need to develop and support effective capacities for emergency services, preparedness, response and recovery, together with socioeconomic policies such as safety nets and risk transfer mechanisms, as part of a holistic approach ²³ .
Risk	The concept of risk combines an understanding of the likelihood of a hazardous event occurring with an assessment of its impact represented by interactions between hazards, elements at risk and vulnerability ²⁴ .
Risk identification	The process of finding, recognising and describing risks. Risk identification involves the identification of risk sources, events, their causes and their potential consequences. Risk identification can involve [the use of] historical data, theoretical analysis, informed and expert opinions and stakeholders' needs ²⁵ .
Risk management	The systematic application of management policies, procedures and practices to the tasks of identifying, analysing, assessing, mitigating and monitoring risk ²⁶ .

¹⁹ Queensland Government, Queensland Fire and Emergency Services QERMF Risk Assessment Handbook p.49

²⁰ Queensland Government, Queensland Fire and Emergency Services, Glossary, p.94

²¹ Queensland Government, Queensland State Disaster Management Plan, s2.1 p.7

²² Australian Institute of Disaster Resilience, Glossary, <https://knowledge.aidr.org.au/glossary/>

²³ United Nations Office for Disaster Risk Reduction, <https://www.undrr.org/>

²⁴ Queensland Government, Queensland Fire and Emergency Services QERMF Risk Assessment Handbook p.50

²⁵ Queensland Government, Queensland Fire and Emergency Services QERMF Risk Assessment Handbook p.51

²⁶ Queensland Government, Queensland Fire and Emergency Services QERMF Risk Assessment Handbook p.51

Term	Definition
Risk register	A table, list or other representation of risk statements describing sources of risk and elements at risk with assigned consequences, likelihoods and levels of risk. Risk registers are produced by risk assessment processes, summarising the outputs of these processes to inform decision making about risks. Risk registers record the identification, analysis and evaluation of emergency risks ²⁷ .
Stand down	Refer to LDMG Activation Levels .
Stand up	Refer to LDMG Activation Levels .
State Disaster Coordinator	A person appointed under s21(B) of the <i>Disaster Management Act, 2003</i> who is responsible for the coordination of disaster response operations of the State Disaster Coordination Centre, on behalf of the Queensland Disaster Management Committee.
State Recovery Coordinator	A person appointed under s21(E) of the <i>Disaster Management Act, 2003</i> who is responsible for the coordination of disaster recovery operations on behalf of the Queensland Disaster Management Committee.
Vulnerability	The characteristics and circumstances of a community, system or asset that make it susceptible to the damaging effects of a hazard ²⁸ .

Table 2: Definition of Terms used within the Somerset Local Disaster Management Plan

²⁷ Queensland Government, Queensland Fire and Emergency Services QERMF Risk Assessment Handbook p.51

²⁸ Queensland Government, Queensland Fire and Emergency Services QERMF Risk Assessment Handbook p.51



1 Introduction and Principles of the LDMP

1.1 LDMP Area Overview

This Local Disaster Management Plan (LDMP) is applicable to the Somerset Regional Council (SRC) Local Government Area (LGA), as shown in figure 1 below. The area administered by SRC covers 5,379km² with the administrative centre located at Esk, approximately 60 km northwest of Ipswich. The area contains a major part of the Brisbane River and Stanley River catchments. The northern, eastern, and western boundaries are formed in the main by several mountain ranges including Brisbane, D'Aguiar and Blackbutt Ranges, and several smaller ranges.

The region is home to two of the largest dams in Queensland, Wivenhoe and Somerset. Somerset Dam releases its water into Wivenhoe Dam, which in turn supplements the natural flow of the Brisbane River and maintains an adequate supply of water to the Mt Crosby pumping station. Wivenhoe Dam was constructed after the 1974 floods to provide Ipswich and Brisbane better flood immunity and at the same time provide potable water to both Brisbane and Ipswich. Lockyer Creek flows into the area from the Lockyer Valley and joins the Brisbane River downstream from Wivenhoe Dam. The southern end of the Council's area generally consists of creek and river flats supporting small crop farming and is the area most likely to be subjected to flooding of any significance. The majority of other usable land in the Council area lies amongst low hilly country used for grazing with small areas under forestation.

The Brisbane Valley Highway, from Ipswich and Brisbane, enters the area at its southeast corner and runs the full length of the Council area in a north, north-westerly direction, intersecting with the D'Aguiar Highway west of Kilcoy. The Warrego Highway forms the southern extremity of the Council's area for a short distance where it crosses at Minden.

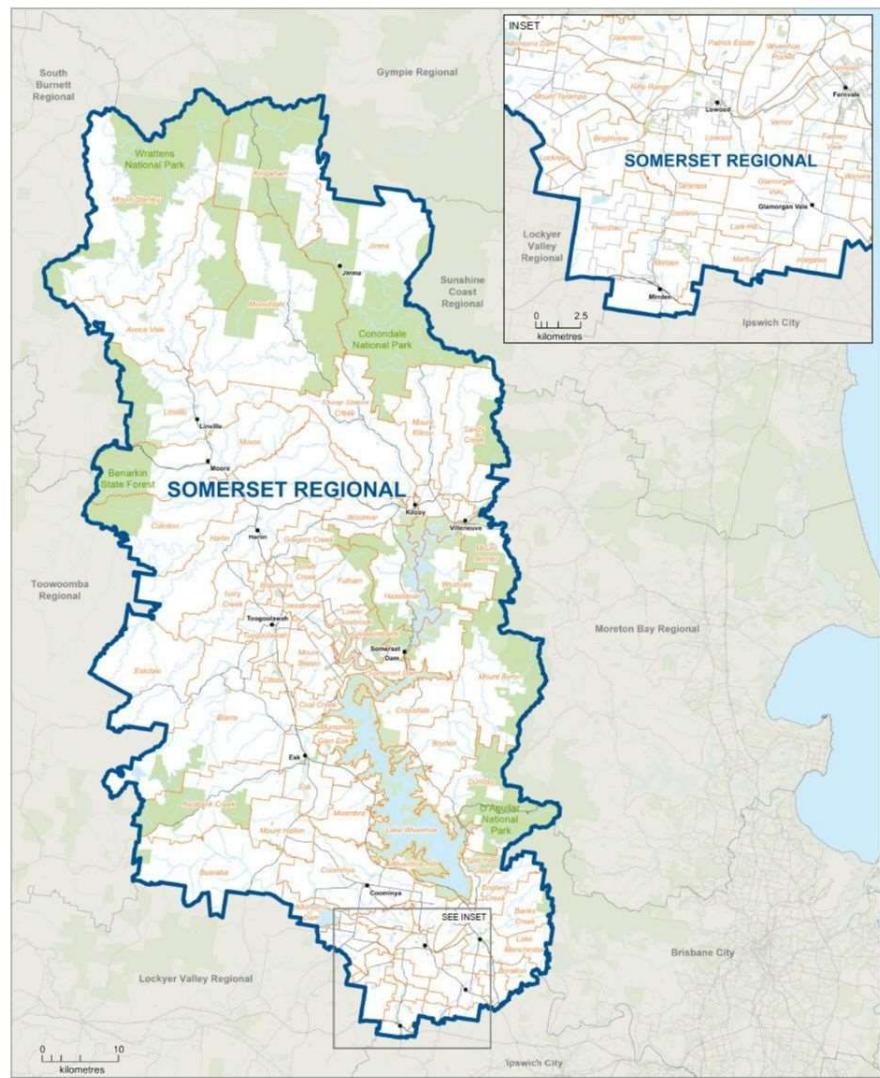


Figure 1: SRC Local

Government Area Map

The Somerset LDMP has been developed by SRC and key stakeholders pursuant to s57 and s58 of the [Disaster Management Act, 2003](#)²⁹ (the Act).

1.2 Plan accessibility

The Somerset LDMP has an information classification of OFFICIAL. The LDMP and associated sub plans, excluding confidential information, are available for download on the [SRC Website](#)³⁰ or at Council's administration buildings at Lowood, Esk and Kilcoy, free of charge.

SRC's planning process, and lessons process are aligned to (the Standard) and as set by the Inspector General, Emergency Management (IGEM) Queensland.

1.3 LDMP Review and Improvement

The Somerset LDMP is reviewed as required by s59(1) of the Act. This occurs annually based on the lessons identified in line with the Inspector General Emergency Management (IGEM) [Lessons Management Framework](#)³¹, the IGEM capacity assessment, and any changes to the [Standard for Disaster Management in Queensland](#)³² (the Standard), and findings which are derived by the annual test of effectiveness as required by s59(2) of the Act. SRC welcomes feedback from the community regarding this disaster management plan.

Feedback and recommendations to amend this plan can be forwarded by mail to:

Chief Executive Officer
Attn: Local Disaster Coordinator
Somerset Regional Council
PO Box 117
Esk, QLD 4312

or by email to mail@somerset.qld.gov.au

1.4 LDMP Distribution

The controlled master copy the Somerset LDMP is held by SRC. Copies will be distributed to members of the Local Disaster Management Group (LDMG) and are available online to members through Council's Local Disaster Management Group Members portal (within GuardianIMS). Under s60 of the Act, a copy of this plan is available on Council's website, with hardcopies of all plans located in the Local Disaster Coordination Centres (LDCC), located at Esk, Fernvale and Kilcoy.

1.5 What is a disaster

A disaster is a serious disruption in a community, caused by the impact of an event, that requires a significant coordinated response by the State and other entities to help the community recover from the disruption³³. A serious disruption is defined by:

- loss of human life, or illness or injury to humans; or
- widespread or severe property loss or damage; or
- widespread or severe damage to the environment³⁴.

²⁹ <https://www.legislation.qld.gov.au/view/pdf/inforce/current/act-2003-091>

³⁰ <https://www.somerset.qld.gov.au/downloads/file/1578/local-disaster-management-plan-public.pdf>

³¹ <https://www.igem.qld.gov.au/sites/default/files/2020-07/IGEM%20Lessons%20Management%20Framework.pdf>

³² [https://www.igem.qld.gov.au/sites/default/files/2019-](https://www.igem.qld.gov.au/sites/default/files/2019-12/NEW%20Standard%20for%20Disaster%20Management%20in%20Queensland%20v2.0.pdf)

[12/NEW%20Standard%20for%20Disaster%20Management%20in%20Queensland%20v2.0.pdf](https://www.igem.qld.gov.au/sites/default/files/2019-12/NEW%20Standard%20for%20Disaster%20Management%20in%20Queensland%20v2.0.pdf)

³³ *Disaster Management Act, 2003*, s13(1)

³⁴ *Disaster Management Act, 2003*, s13(2)

1.6 What is Disaster Management

Disaster Management (DM) arrangements are about managing the potential adverse effects of an event, including, for example, arrangements for mitigating, preventing, preparing for, responding to, and recovering from a disaster³⁵.

1.7 Role of Local Government

The Act describes the responsibilities of SRC under s80(1), which states those as:

- to ensure it has a disaster response capability;
- to approve its local disaster management plan;
- to ensure information about an event or a disaster in its area is promptly given to the District Disaster Coordinator (DDC); and
- to perform other functions given to the local government under the Act.

1.8 The Somerset Cooperative Approach

The comprehensive approach to DM comprises four phases: Prevention, Preparedness, Response and Recovery (PPRR) to ensure a balance between the reduction of risk and the enhancement of community resilience, whilst ensuring effective response and recovery capabilities³⁶. All agencies across the Somerset LDMG work together in a cooperative manner to achieve their roles and responsibilities to protect communities, respond to disasters and emergencies and recover the SRC area after their impact.

1.9 Phases of Disaster Management

Consistent with the Act, disaster management is planned across the PPRR phases of disaster management, as outlined in table 3 below:

Phase	Somerset LDMG Activities
Prevention	<ul style="list-style-type: none">• Investigate and coordinate strategies to reduce the impact of disaster events on the community.
Preparedness	<ul style="list-style-type: none">• Increase community resilience by increasing knowledge and education.• Encourage shared responsibility and an all-hazards approach to disaster management – including for the resources and arrangements used to support response and recovery.• Enhance local capability by encouraging participation in training and exercises, contributing to equipment acquisition programs, and building relationships.
Response	<ul style="list-style-type: none">• Provide effective and efficient coordination of disaster response and relief/short-term recovery in order to safeguard people, property and the environment.• Provide support to communities outside of the SRC region who may be affected by a disaster.
Recovery	<ul style="list-style-type: none">• Ensure that the recovery priorities across the SRC community are identified and met across the functional areas.• Ensure that recovery operations help to build whole of community resilience.

Table 3: Phases of Disaster Management

³⁵ Disaster Management Act, 2003, s14

³⁶ Queensland Government, Queensland Fire and Emergency Services, PPRR Guidelines s.1.3.1 p.2

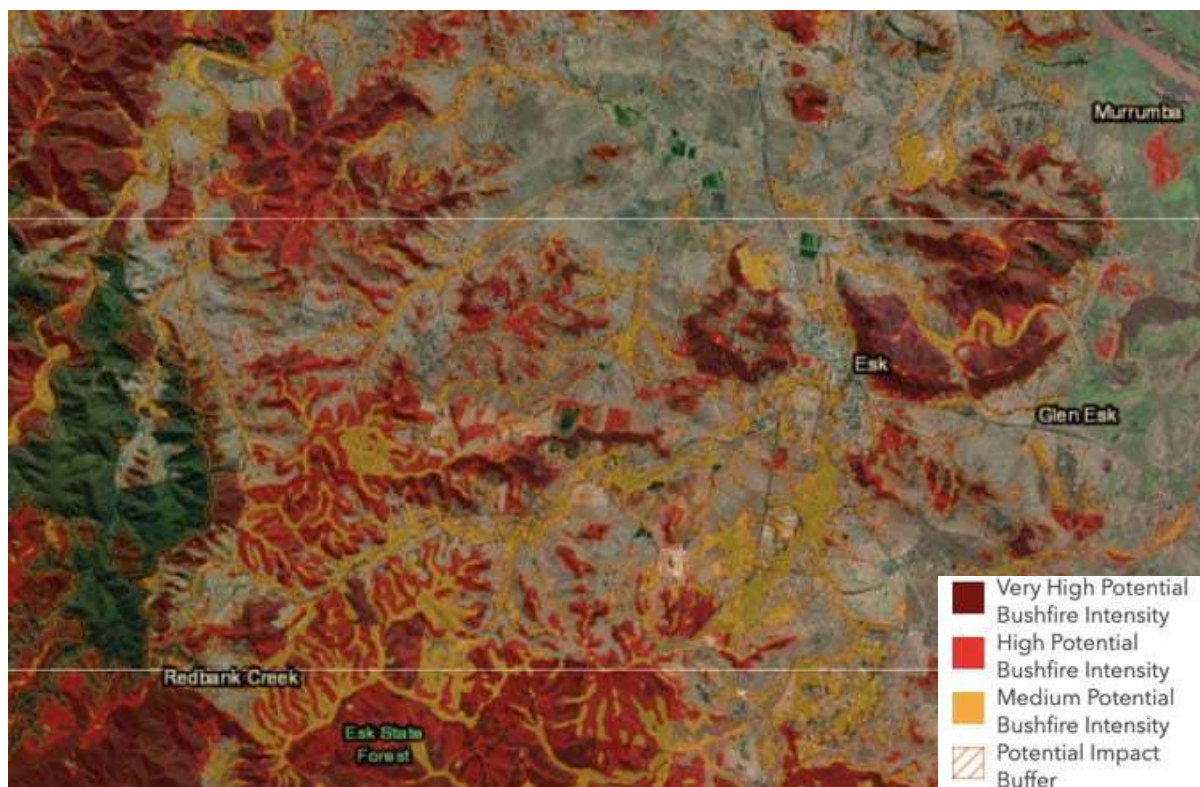
1.10 Guiding Principles

The Somerset LDMP implements s4(a) of the Act:

- **Comprehensive approach**
 - The comprehensive approach to disaster management comprises of activities related to PPRR, as shown in figure 2.
- **All hazards approach**
 - Ensures that a consistent approach is taken so that any hazard can be managed under the plan. This does not mean that all possible hazards are planned for, but ultimately the structures and framework put in place can effectively deal with most hazards that arise.
- **Local Governments should primarily be responsible for managing events in their area**
 - The idea is that it is Local Government who best know their community, risks and geography and as such, are best equipped to effectively manage a disaster event.
- **The District and State Disaster groups will assist Local Governments if required.**
 - Local Governments can seek assistance from the District and/or State through the Queensland Disaster Management Arrangements (QDMA).



Figure 2: Comprehensive approach to Disaster Management (QFES)



Map of the Bushfire Risk across the Esk Area (QFES)



2 Legislative and Governance Framework

2.1 The Disaster Management Act, 2003

The Act determines the establishment, operation of, and roles and responsibilities of the Somerset LDMG, including the provision of this LDMP. The act is cascaded through the authorising environment shown at figure 3.



Figure 3: Disaster management authorising environment across the QDMA³⁷

2.2 The Regulation

The [Disaster Management Regulation \(2014\)](#)³⁸ (the Regulation) determines matters relating to membership and business of disaster management groups, along with provisions for disaster districts.

2.3 The Strategic Policy Framework

The [Queensland Disaster Management 2016 Strategic Policy Framework](#)³⁹ (SPF) is a statement outlining the intent to keeping people safe and making communities more resilient to disaster risks and impacts across Queensland⁴⁰.

2.4 The DM Guideline

The [Disaster Management \(DM\) Guideline](#)⁴¹ (the Guideline) provides detailed information across PRR along with roles and responsibilities across the LDMG and should be read in conjunction with this LDMP⁴².

³⁷ Queensland Government, Queensland Fire and Emergency Services, PRR Guidelines s.1.1 p.1

³⁸ <https://www.legislation.qld.gov.au/view/pdf/2017-04-30/sl-2014-dmr>

³⁹ <https://www.disaster.qld.gov.au/dmp/Documents/Strategic-Policy-Statement.pdf>

⁴⁰ *Disaster Management Act, 2003*, s18(a)

⁴¹ <https://www.disaster.qld.gov.au/dmg/Documents/QLD-Disaster-Management-Guideline.pdf>

⁴² *Disaster Management Act, 2003*, s63

2.5 The Emergency Management Assurance Framework

The [Emergency Management Assurance Framework \(EMAF\)](#)⁴³ defines the role of the IGEM under s16(C) of the Act, and how the Standard is implemented across the Somerset LDMG.

2.6 The Disaster Management Standard

The Standard⁴⁴ in Queensland establishes the performance requirements of all entities involved in disaster management in order to achieve the best outcomes for the community. It outlines the following shared responsibilities:

- Managing Risk
- Planning and Plans
- Community Engagement
- Capability Integration
- Operations; and
- Collaboration and Coordination.

2.7 Queensland Disaster Management Arrangements (QDMA)

SRC, through the Somerset LDMG, has primary responsibility to manage disasters and emergencies at the local level. This is traditionally managed in line with the approach outlined in this plan.

Where there are gaps in capacity or capability, the Somerset LDMG may request assistance from the Ipswich District Disaster Management Group (DDMG).

Where the event exceeds the capability of the Ipswich DDMG, approaches can be made by the DDMG to the State Disaster Coordination Centre (SDCC) to seek resources from across the state, where they exist, and if not, to the Commonwealth, through the National Situation Room (NSR), as shown in figure 4.

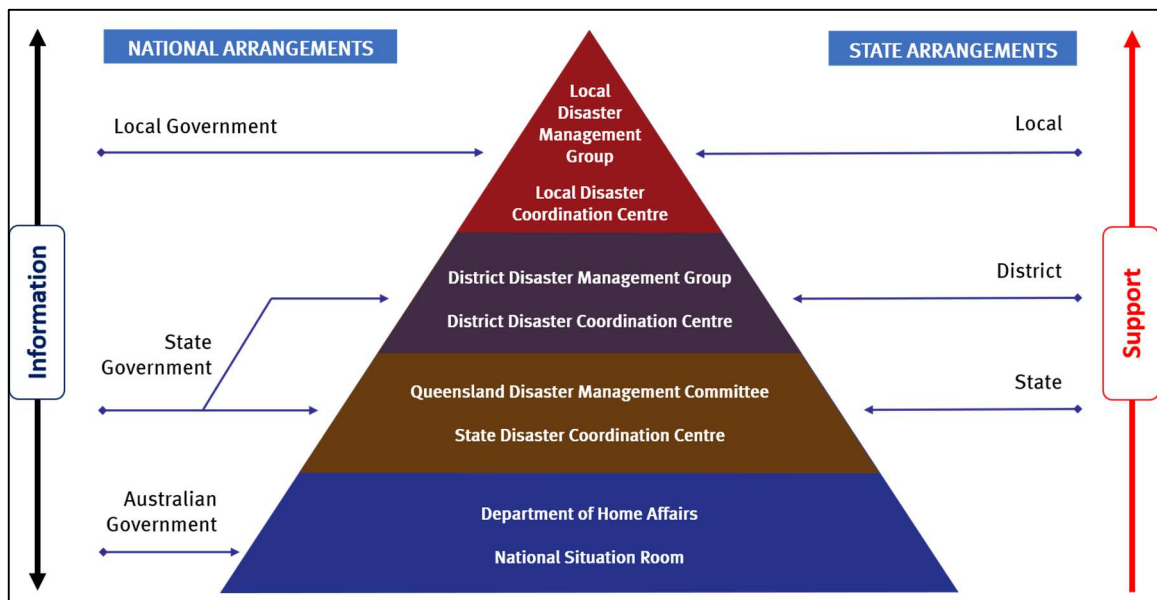


Figure 4: Disaster management authorising environment across the QDMA⁴⁵

⁴³ <https://www.igem.qld.gov.au/sites/default/files/2021-07/Emergency%20Management%20Assurance%20Framework%20v2.1.1.pdf>

⁴⁴ *Disaster Management Act, 2003*, s16N (1)

⁴⁵ Queensland Government, Queensland Fire and Emergency Services, Queensland Disaster Management Arrangements Participant Guide



3 Local Disaster Management Group

3.1 Establishment of the LDMG

Under s29 of the DM Act 2003, the SRC has established the Somerset LDMG to support its disaster management activities.

3.2 Functions of the LDMG

The functions of the Somerset LDMG include (but are not limited to):

- Meet regularly, and in doing so build and maintain relationships between all members.
- Develop, regularly review and assess effective disaster management.
- Assist SRC to prepare the Somerset LDMP.
- Ensure the community is aware of ways of mitigating the adverse effects of an event, and preparing for, responding to and recovering from a disaster.
- Identify and coordinate the use of resources that may be used for disaster operations.
- Manage disaster operations in the area under policies and procedures decided by the State Group.
- Ensure disaster management and disaster operations in the area are consistent with the State Group's SPF for disaster management for the State.

3.3 Responsibilities of the LDMG

In accordance with Section 30 (1) (f) of the Act, the Somerset LDMG is responsible for managing disaster operations across the SRC area. It does so under policies and procedures defined by the Queensland Disaster Management Committee (QDMC), the state group, chaired by the Premier of Queensland. In the event of a disaster, the Somerset LDMG is the decision-making authority for disaster management across the SRC LGA.

3.4 Membership of the LDMG

Chair and Deputy Chair of the LDMG

In accordance with s34 of the Act, SRC has appointed the Mayor as Chair, and the Deputy Mayor as Deputy Chair of the LDMG. The Chair of the Somerset LDMG has responsibility:

- To manage and coordinate the business of the group.
- To ensure, as far as practicable, that the group performs its functions.
- To report regularly to the Ipswich DDMG about the performance by the LDMG of its functions.

Local Disaster Coordinator

Under s35 of the Act, the Chair of the Somerset LDMG appoints a Local Disaster Coordinator (LDC) for the Group. In recognition of the necessary expertise, experience, authority and delegations to perform the role effectively, the Chair has appointed the SRC Director of Operations as the LDC, and the Works Manager as the Deputy LDC.

The LDC has responsibility:

- To coordinate disaster operations for the LDMG.
- To report regularly to the LDMG about disaster operations.
- To ensure, as far as practicable, that any strategic decisions of the LDMG about disaster operations are implemented.

Core Members

Under s33(1) of the Act, the Somerset LDMG consists of the persons prescribed by regulation to be members of the Group. When considering membership, as per s9(4) of

the regulation, SRC requires the person to have the necessary expertise or experience to be a member, to their satisfaction prior to appointment.

Advisors

Advisors provide additional support and expertise to the Somerset LDMG. Advisors do not hold voting rights. The current list of members and advisors are provided in table 4 below.

Member	Advisors
<ul style="list-style-type: none"> Somerset Regional Council (SRC) Queensland Fire and Emergency Services (QFES) Queensland Police Service (QPS) Department of Communities, Housing and Digital Economy (DCHDE) 	<ul style="list-style-type: none"> Queensland Ambulance Service (QAS) Energex Urban Utilities SEQWater CS Energy Telstra National Broadband Network (NBN) Co Queensland Health <ul style="list-style-type: none"> West Moreton Hospital and Health Service (HHS) – Esk Hospital Metro North HHS – Kilcoy Hospital. State Emergency Service (SES) Department of Agriculture and Fisheries (DAF) Red Cross Queensland Education

Table 4: Members and Advisors of the Somerset LDMG

Deputy Members

Deputy members serve as proxies for core members should they be unavailable to attend. Deputy Members are expected to achieve the same level of skill and expertise as core members. A deputy member has voting rights in the absence of their core member.


3.5 Agency Roles and Responsibilities



Effective coordination of disaster management relies on roles and responsibilities being clearly defined, communicated and understood. The indicative disaster management roles and responsibilities of the Somerset LDMG member organisations and other stakeholders is provided in table 5 below.




Further detail about the roles and responsibilities of each agency is contained within the Queensland [State Disaster Management Plan](#)⁴⁶ (SDMP) and/or relevant legislation.







Entity	Indicative DM roles and responsibilities
Somerset residents, businesses and	<ul style="list-style-type: none"> Understand local risks and develop an emergency plan. Prepare emergency and evacuation kits.

⁴⁶ <https://www.disaster.qld.gov.au/cdmp/Documents/Queensland-State-Disaster-Management-Plan.pdf>

Entity	Indicative DM roles and responsibilities
community organisations	<ul style="list-style-type: none"> • Prepare home or business. • Tune into warnings. • Check on family, friends and neighbours. • Plan for pets, animals and livestock in an emergency.
Somerset Local Disaster Management Group	<ul style="list-style-type: none"> • Situation assessment - the collection, collation, evaluation and dissemination of information relating to the current and predicted status of the disaster. • Event priority determination – the establishment of priorities among the many distinct incidents that may make up a disaster event. • Essential resource acquisition and allocation – the acquisition of resources from the agencies involved or from external sources to support the disaster response. • Coordination with other groups – such as the Ipswich DDMG and cross-border coordination bodies. • Coordination with elected and appointed officials – the briefing of elected and appointed officials on disaster-related issues in the local area. • Coordination of information – coordination of summary information such as impact assessments. • Coordination of information – among agencies and other groups to ensure consistency in messages to the public. The Chair, Somerset LDMG approves and delivers the media statements and public announcements to ensure consistent messaging.
Somerset Regional Council 	<ul style="list-style-type: none"> • Management and administration of the Somerset Region LDMG, including the development and maintenance of disaster management plans and sub plans. • Establishment of a LDCC (including training of sufficient personnel to operate the centre on behalf of Somerset LDMG). • Coordinate disaster operations and support response and recovery agencies. • Coordination of impact assessment and disaster response on behalf of the Somerset Region LDMG. • Coordination of immediate welfare and recovery needs in conjunction with Department of Communities, Housing and Digital Economy (DCHDE) and Australian Red Cross (including the management of evacuation centres). • Maintenance of local government function via local government business continuity contingency planning. • Maintenance of a disaster response capability. • Maintenance of Council telemetry and warning systems. • Community awareness and education, and issue of public warnings and information. • Support for the region’s State Emergency Service (SES). • Advice to the Ipswich DDMG on local matters such as evacuation and longer-term recovery.

Entity	Indicative DM roles and responsibilities
	<ul style="list-style-type: none"> • Support for the Ipswich DDMG to perform the functions of the Local Group, in the event a disaster prevents the local group from performing its functions. • Advice to the LDMG and request and provide assistance through the local group as required during disaster operations
<p>Queensland Ambulance Service</p> 	<ul style="list-style-type: none"> • Provide, operate, and maintain ambulance services. • Access, assess, treat, and transport sick and/or injured persons. • Protect persons from injury or death, during rescue and other related activities. • Provide and support temporary health infrastructure where required. • Collaborate with Queensland Clinical Coordination Centre in the provision of paramedics for rotary wing operations. • Participate in Health Facility evacuations. • Collaborate with Queensland Health in mass casualty management systems. • Provide Disaster, Urban Search and Rescue (USAR), Chemical HAZMAT, Biological and Radiological operations support with specialist logistics and specialist paramedics.
<p>Queensland Fire and Emergency Service</p> 	<ul style="list-style-type: none"> • Primary agency for bushfire. • Primary agency for chemical / hazardous materials (HAZMAT) related incidents. • Provide control, management and pre-incident planning of fires (structural, landscape and transportation). • Provide rescue capability for persons trapped in any vehicle, vessel, by height or in confined space. • Rescue of persons isolated or entrapped in swift water/ floodwater events. • Provide advice, chemical analysis and atmospheric monitoring at chemical/HazMat incidents. • Advice to the Somerset Region LDMG, and assistance through the local group as required during disaster operations. • Provide Impact Assessment, and intelligence gathering capabilities. • Provide logistical and communications support to disasters within capabilities. • Advice to the LDMG, and assistance through the local group as required during disaster operations. • Provide advice and support to Somerset Region LDMG in relation to disaster management and disaster operations. • Coordination of disaster management training. • Public education in disaster management.

Entity	Indicative DM roles and responsibilities
<p>Queensland Police Service</p> 	<ul style="list-style-type: none"> • Preserve peace and good order. • Prevention of crime. • Maintain any site as a possible crime scene. • Provide a Disaster Victim Identification capability. • Coronial investigation procedures. • Conduct traffic control, including assistance with road closures and maintenance of roadblocks. • Control and coordinate evacuation operations. • Lead agency for Terrorism • Coordinate search and rescue operations. • Manage the registration of evacuees and associated inquiries in conjunction with the Australian Red Cross. • Crowd management and public safety. • Provide security for damaged or evacuated premises. • Respond to and investigate traffic, rail and air incidents. • Advice to the Somerset Region LDMG, and assistance through the local group as required during disaster operations.
<p>Department of Communities, Housing and Digital Economy</p> 	<ul style="list-style-type: none"> • Coordination of community recovery effort across government and non-government agencies. • Chair for the multi-agency District Community Recovery Committee. • Development and annual review of the combined Ipswich and Toowoomba District Human and Social Recovery Plan. • Establishment and management of Community Recovery Centres and Coordination Centres. • Distribution of financial assistance to eligible individuals and families affected by a natural disaster. • Establishment of outreach service teams to visit households and determine their recovery needs. • Advice to the LDMG, and assistance through the local group as required during disaster operations.
<p>Energex</p> 	<ul style="list-style-type: none"> • Maintenance of electrical power supply. • Advice in relation to electrical power. • Restoration of power. • Safety advice for consumers. • Advice to the LDMG, and assistance through the local group as required during disaster operations.
<p>Queensland Health (West Moreton HHS – Esk Hospital and Metro North HHS - Kilcoy Hospital)</p>	<ul style="list-style-type: none"> • Coordination of medical resources including medical personnel. • Public health advice and warnings to participating agencies and the community. • Psychological and counselling services for disaster affected persons. • Ongoing medical and health services required during the recovery period to preserve the general health of the community. • Advice to the LDMG, and assistance through the local group as required during disaster operations.

Entity	Indicative DM roles and responsibilities
Urban Utilities 	<ul style="list-style-type: none"> • Deliver drinking water, recycled water and sewerage services within the Somerset region. • Provide advice to the LDMG and action reasonable requests during disaster operations, as required.
SEQWater 	<ul style="list-style-type: none"> • Undertake emergency response at Atkinson, Bill Gunn , Wivenhoe and Somerset Dams. • Determine the area of potential impact from the dam safety emergency. • Provide the relevant disaster response agencies with timely notification of impending and actual emergencies, including details of the emergency and estimates of potential impacts downstream of the dam.
State Emergency Service 	<ul style="list-style-type: none"> • Assistance to community preparation for, response to and recovery from an event or disaster. • Public education. • Rescue of stranded persons. • Search operations for missing person. • Emergency repair and protection of damaged or vulnerable buildings. • Assistance with debris clearance. • First aid support. • Traffic control support. • Assistance with radio communications. • Assistance with lighting. • Advice to the LDMG, and assistance through the local group as required during disaster operations.
NBN Co 	<ul style="list-style-type: none"> • Restoration of telecommunication services. • Provision of communication facilities. • Advice to the LDMG, and assistance through the local group as required during disaster operations.
Telstra 	<ul style="list-style-type: none"> • Restoration of telecommunication services. • Provision of communication facilities. • Advice to the LDMG, and assistance through the local group as required during disaster operations.
Department of Agriculture and Fisheries (DAF) 	<ul style="list-style-type: none"> • Lead agency for containment and eradication of animal and plant diseases and pests. The Department of Agriculture and Fisheries (DAF) also provides advice on agriculture, fisheries and forestry in a disaster event • Collaborate with stakeholders with shared responsibilities and other organisations to facilitate prevention, preparedness, response and recovery strategies and priorities for animal welfare management within a community • Provide advice in relation to agriculture, fisheries and forestry disaster impacts • Provide advice on livestock welfare • Coordinate destruction of stock or crops in an emergency pest/disease situation


Entity	Indicative DM roles and responsibilities
	<ul style="list-style-type: none"> • Lead the reporting on the disaster impact assessments on the agricultural sector, including economic losses and expected recovery
<p>CleanCo</p> 	<ul style="list-style-type: none"> • Undertake emergency response at Splityard Creek Dam. • Determine the area of potential impact from the dam safety emergency. • Provide the relevant disaster response agencies with timely notification of impending and actual emergencies, including details of the emergency and estimates of potential impacts downstream of the dam.

Table 5: Indicative DM roles and responsibilities of the Somerset LDMG

3.6 LDMG Meeting Governance

The Somerset LDMG Meeting Governance arrangements are documented in section 2.3.3 (p.8) of the guideline.

Ordinary Meetings

The Somerset LDMG currently meets four (4) times per year in February, May, August and November. Meetings are held as a mix of online (via Microsoft TEAMS) and face-to-face.

For ordinary meetings of the Somerset LDMG an agenda will be emailed to members no later than one week prior to the meeting. Members will be given three months' notice of each of these meetings. It is a requirement that members, or their proxies, attend all meetings where possible. The minimum number of members required for a meeting is 50% plus one.

Extraordinary Meetings

Extraordinary Somerset LDMG Meetings can be called during emergency events and provision may be made for members to use TEAMS. Location of the meeting and the details for the meeting will be provided at the time and at the discretion of the LDC.

Minutes will be taken at all Somerset LDMG meetings, providing a summary of the discussions and any resolutions made. A copy is distributed in a timely manner to members and relevant advisors.

Requirement for members to report

There is an expectation that members of the Somerset LDMG should attend and provide a written report to each of the LDMG meetings. The reports should outline any disaster management related activities performed or proposed to be conducted in the future that is of relevance to the group. Reports should be emailed prior to the meeting and will be included in the minutes of each meeting.



Grass and scrub fire in Jimna in 2021



4 Community Characteristics

4.1 Somerset Climate and Weather

A detailed summary of the climate and weather across the SRC LGA can be found on the Bureau of Meteorology (BoM) [website](#)⁴⁷. The climate of the SRC area is characterised by high variability in rainfall and temperature with the summer rainfalls occurring between October and March. The heaviest rainfalls generally occur in January and February. Ex-Tropical cyclones can affect the area in the form of heavy rain depressions, generally between January and March; this is also the time for well-developed troughs to occur. Between November and February, the area experiences many thunderstorms resulting in the region being classed as being one of the thunderstorm hotspots in the State, particularly around the township of Esk. The average annual rainfall varies between 650mm and 850mm. Daytime temperatures are in the 20-30-degree range for most of the year, although short periods of heat wave conditions can be experienced. Occasional frosts occur in mid-winter. Over the past 10 years, the region has seen days of extreme heatwave and increased drought, which is trending towards climatic conditions, of above average temperatures, and other conditions which are conducive to large spread and rapid-fire conditions occurring.

Climate Change

Climate change is a feature across the region, which needs to be further explored. Further information on climate change, and its impact to the SRC area, can be accessed on the Department of Environment and Science (DES) [website](#)⁴⁸.

4.2 Population

For the latest population data, refer to the Australian Bureau of Statistics (ABS) [website](#)⁴⁹ which provides analysis to the latest analytics for the SRC area. Table 6 provides the key population statistics for the SRC area as at the 2016 Census data. The 2021 Census data will be released in a phased approach between June 2022 and October 2023.

Category	SRC Statistic
Male	50.3% (12,381)
Female	49.7% (12,215)
Aboriginal and/or Torres Strait Islander people	3.7% (903)
Medium Age	43
Families	6508
Average people per household	2.6

Table 6: Overall Statistics – SRC area⁵⁰

4.3 Vulnerable Population

For detailed information on vulnerable communities who require support under the National Disability Insurance Scheme (NDIS), visit the NDIS [website](#)⁵¹.

⁴⁷ http://www.bom.gov.au/climate/averages/tables/cw_040189.shtml

⁴⁸ https://www.qld.gov.au/_data/assets/pdf_file/0023/67631/seq-climate-change-impact-summary.pdf

⁴⁹ <https://www.abs.gov.au/census/find-census-data/quickstats/2016/LGA36580>

⁵⁰ Australian Government, Australian Bureau of Statistics, (2016 Census)

⁵¹ <https://blcw.dss.gov.au/demandmap/>

When considering vulnerable populations within the Somerset LDMG area of responsibility, community members with specific needs should be identified. In consultation with appropriate stakeholders that may require special consideration, such as:

- those reliant on mechanical life-support systems
- those reliant on home oxygen
- people from Non-English-Speaking Backgrounds
- those with health support needs
- aged population
- people in residential care
- people with disabilities
- varying cultural and language backgrounds
- transient populations
- Other population groups without support, dependent upon the nature of the event.

The Somerset LDMG has members and/or advisors from the following organisations that can assist in compiling a list at short notice of those that may be considered as vulnerable, including:

- Energex (critical supply locations)
- DCHDE
- Queensland Health – Metro North and West Moreton HHSs.

4.4 Industry

For information on industry, refer to the ABS [website](#)⁵² which provides the latest analytics for the SRC area. The wealth across the SRC area is based on primary production and timber and secondary industries, which service the primary industries. In broad terms, the southern/central areas of the Region are agricultural land, the northern/western areas are cattle grazing & timber country, and the south-eastern area is forestry/national parks. Dotted throughout the area are numerous rural residential subdivisions. The area has seen a large rise in the number of poultry farms, particularly in the Southern areas of the region. Table 5 provides the employment industry trends based on the 2016 Census data. The 2021 Census data will be released in a phased approach between June 2022 and October 2023.

Category	% Of population employed within the industry
Meat Processing	6.8%
Beef Cattle Farming (Specialised)	3.6%
Road Freight Transport	3.2%
Primary Education	3.1%
Supermarket and Grocery Stores	3.0%

Table 5: Industry employment statistics – SRC area⁵³

4.5 Tourism

Tourist coaches, caravans and private vehicles traverse across the region. The main attractions visited are Wivenhoe and Somerset Dams with associated water sports and camping areas. Several private enterprises include historic buildings, deer farming and skydiving. Across the Somerset region, other tourists are attracted to educational and other centres of attraction including the Boys Brigade Glengarry Education Centre, Camp Duckadang, Mountain Lake Adventures, Camp Somerset, motor sports in the Jimna area,

⁵² <https://www.abs.gov.au/census/find-census-data/quickstats/2016/LGA36580>

⁵³ Australian Government, Australian Bureau of Statistics, (2016 Census) - <https://www.abs.gov.au/census/find-census-data/quickstats/2016/LGA36580>

and the Stanley River Environmental Centre. The Somerset region is home to many parks, both Council owned, and others that are owned and maintained by State Government Agencies such as SEQWater and DES. A list of parks within the region can be found on Council's [website](#)⁵⁴. The [Brisbane Valley Rail Trail](#)⁵⁵ is a recreational trail that follows the disused Brisbane Valley rail corridor from Wulkuraka, west of Ipswich, to Yarraman, west of Kilcoy. Council and the State have invested considerable funds into ensuring that the 161km trail is completed giving walkers, cyclists, and horse riders the unique opportunity to experience the diverse rural landscape of the Brisbane Valley.

4.6 Schools

The public-school systems are distributed across three Department of Education Districts.

- Metropolitan region (Lowood and Fernvale areas)
- Darling Downs West region (Esk and Toogoolawah areas) , and
- North Coast region (Kilcoy area), and are provided in table 7 below:

Category	Locations
Pre- School/ Child Care	Coominya, Esk Kindergarten, Esk Little Deers, Esk Preschool, Fernvale Fun Factory, Fernvale Preschool, Lowood Pre-school/kindergarten, Toogoolawah Kindergarten, Toogoolawah Tiny Terrors, Toogoolawah Playgroup, Country Kids, Kilcoy Kindergarten
Primary Schools	Clarendon, Coominya, Esk, Fernvale, Glamorgan Vale, Harlin, Kilcoy, Mt Kilcoy, Linville, Lowood, Minden, Moore, Patrick Estate, Prenzlau, Mt Tarampa, Tarampa, Toogoolawah
High Schools	Lowood, Toogoolawah, Kilcoy

Table 7: Location of schools across the SRC area

4.7 Major Community Events

Community events are held throughout the year attracting locals and visitors to the region. Some of these are listed below.

- Rural Shows – Esk, Lowood, Toogoolawah and Kilcoy
- Horse Racing – Esk and Kilcoy
- Kilcoy BBQ and Beer Festival
- Watts Bridge Fly In (near Toogoolawah)
- Ramblers Equinox Skydiving (Toogoolawah)
- Somerset Rail Trail Fun Run

A full list of community events can be found on the SRC [website](#)⁵⁶.

4.8 Sporting and Recreational Grounds

A full list of sporting and recreational grounds can be found on the SRC [website](#)⁵⁷.

4.9 Transport

Public transport options are limited across the SRC area, and largely rely on supply from private enterprise. The predominate options are:

- Coaches – TRANSLink Ipswich, Coast and Country (Toogoolawah and Wamuran), Minden Bus Service, Christensen's Coaches (Kilcoy).
- Specialist vehicles – Esk, Lowood, Toogoolawah, Kilcoy Taxis, Blue Care.

⁵⁴ <https://www.somerset.qld.gov.au/our-services/parks-and-environment>

⁵⁵ <https://www.brisbanevalleyrailtrail.com.au>

⁵⁶ <https://www.somerset.qld.gov.au/src-events>

⁵⁷ www.somerset.qld.gov.au/our-services/active-and-healthy



5 Essential Services and Infrastructure

5.1 Spatial Mapping of Infrastructure

For a complete and geographical overlay of essential services and infrastructure, this can be accessed at the [Queensland Public Safety Agencies ArcGIS Online Organisation \(QPSAAO\)](#)⁵⁸. If you are a Somerset LDMG member/advisor, and do not have access to this tool, please consult with the SRC Disaster Management Officer to discuss, noting that there are some restrictions to accessing this information given its sensitivity.

5.2 Airfields

Throughout the region there are a number of locations where rotary winged aircraft can land safely in emergent situations, including sporting fields and schools. Fixed wing aircraft can land at the following air strips.

- **Ramblers Drop Zone** at Toogoolawah.
<https://goo.gl/maps/huHgXHPLcb6BMUjn7>
- **Watts Bridge Memorial Airfield** at Lower Cressbrook (Toogoolawah), often used by QFES as an airbase.
<https://goo.gl/maps/5J3DoWseMV3aMW937>
- **Kilcoy Airfield** Kennedys Road, Winya
<https://goo.gl/maps/frnyYJ5qbTfBpjG7>
- **Coominya Flight Training**.
62 Kiernan Lane Coominya 4311
<https://goo.gl/maps/MUqe1MSxWtmCPDJh7>
- **Bradfield**.
907 Atkinsons Dam Rd, Atkinsons Dam 4311
Private airfield for business only.
<https://goo.gl/maps/soN2cobmyR9PGMcr7>

5.3 Telecommunications and Internet

3G/4G and 5G is available throughout the region, with some blackspots due to hilly terrain, especially across the northern and western areas of the region. Mobile phone coverage over the region has improved over time however there are still blackspots in some locations. Some of these reported blackspots are mapped on the QPSAAO for operational planning. Mobile phone service providers include Optus, Telstra and Vodafone (including other retailers reselling these services).

Other systems:

- Council utilises 2-way radio transmission towers located at Mount Brisbane and Jimna. Power is via battery with trickle charge from solar cells. Physical access, whilst available, is subject to landowner permission. The main repeater site is located at Gregors Creek and is on mains power with battery backup.
- Government Wireless Network (GWN) is an integrated secure radio network for Queensland's public safety agencies such as QPS, QFES, SES and QAS.

Major towns have Asymmetric Digital Subscriber Line (ADSL) as a minimum, with NBN rolling out Fibre-to-the-node in towns such as Lowood, Fernvale and Kilcoy. NBN Fixed Wireless is expanding throughout the region. It should be noted that there is a known risk that NBN services (including phone) may be lost during power outages, both in the premises (business or household) and/or node. Telstra, Optus, Vodafone and NBN Co sites (both fixed wireless, towers and nodes) are mapped on the QPSAAO for operational and preparedness planning.

⁵⁸ <https://publicsafetyqld.maps.arcgis.com/home/webmap/viewer.html>

5.4 Medical and Aged Facilities

There are two distinct Queensland Health Hospital and Health Services that operate across the Somerset region. These are Metro North (Kilcoy Hospital) and West Moreton (Esk Hospital). The predominate medical facilities across the region are shown in table 8:

Category	Locations
Public Hospital	Esk - 22 bed, Kilcoy- 30 bed
Private Facilities	Esk, Fernvale, Lowood, Toogoolawah, Kilcoy
Aged Care Facilities	Lowood, Tarampa, Toogoolawah and Kilcoy.

Table 8: Location of medical facilities across the SRC area

5.5 Power

Mapping of the power assets are provided on the QPSAAO. High and low voltage (275,000, 220,000, 132,000 volts) power transmission lines from Tarong and Splityard Creek power stations to Swanbank power station and Redbank substation traverse the Region. 33,000 volts and Single Wire Earth Return lines service the Region, and power outages are rare on the high voltage transmission lines. During storms and bushfires, the low voltage lines can be out of service for up to 24 hours depending upon the location and nature of the damage.

Significant infrastructure changes by Energex since 2011 have resulted in a more secure and resilient electricity network. Outages occur less frequently and can generally be isolated to affect as little customers as possible and allowing for more efficient restoration.

5.6 Roads and Bridges

The Somerset LGA has an extensive network of state controlled and local roads. There is approximately 818km of sealed and 544km of gravel roads. Of these, 438km are state controlled roads. Major highways that are located within the region are:

- Brisbane Valley Highway – Warrego Highway (Blacksoil) to D’Aguilar Highway (near Harlin)
- D’Aguilar Highway – Bruce Highway to Burnett Highway at Yarraman
- Warrego Highway – at Minden Range.

These are in addition to the extensive regional and main road networks that exist. All state roads and bridges, including their construction type, and other engineering information are mapped on the QPSAAO.

In the floods of 2011 and 2013, a significant number of Council bridges were impacted and ultimately replaced or repaired. Many former timber bridges were replaced with more resilient structures such as concrete. In 2010 Council had 97 timber bridges, there are now only two timber road bridges remaining.

5.7 Television

Free-to-air television is available in most of the region. Foxtel and other satellite subscription Pay television services are also available throughout.

5.8 Radio Stations

There are a number of radio stations that can be heard throughout the region, however the main stations with the best coverage are as follows.

- [612 ABC \(AM Radio\)⁵⁹](https://www.abc.net.au/brisbane)
- [River 94.9 \(FM radio\)⁶⁰](https://www.river94.9.com.au)

During disasters and other emergencies, the LDMG encourages residents to listen to these stations. These will be the primary radio stations that the LDMG and emergency services will use during events impacting the SRC area.

5.9 Water supply, Sewerage Treatment and Dams

Treatment Plants and Distribution

The treatment plants, including clear water tanks and pumps, are owned and operated by SEQWater. Treatment of raw water to potable water standard is the responsibility of SEQWater. SEQWater's standalone treatment plants at Esk, Toogoolawah, Kilcoy, Lowood, Linville, and Jimna treat water to supply the individual townships.

Distribution of drinking water and water quality monitoring in all areas is the responsibility of Urban Utilities.

Dams

The Somerset LGA is home to several dams providing safe and reliable water supply to areas of Southeast and Southwest Queensland. Each dam has an emergency action plan (EAP) developed by the owner in consultation with various stakeholders, including the Somerset LDMG.

- Cressbrook Dam is one of the three water storages used to supply Toowoomba and the surrounding region. Whilst it is located in the Toowoomba LGA, and is managed by Toowoomba Regional Council, downstream impacts can be experienced in the township of Toogoolawah and areas along Cressbrook and Kipper Creeks. The Emergency Action Plan (EAP) is available [here⁶¹](#).
- Somerset Dam was built for the dual purposes of water supply for the region and for flood mitigation. The EAP is available [here⁶²](#).
- Wivenhoe Dam was built for the dual purpose of providing a safe and reliable water supply for the region and flood mitigation. It is a gated dam which allows SEQWater to make controlled water releases during times of heavy rain. The EAP is available [here⁶³](#).
- Atkinson Dam is part of the Lower Lockyer irrigation system. It is an ungated dam, meaning that when it reaches 100 per cent capacity, water flows over the spillway and safely out of the dam. The EAP is available [here⁶⁴](#).
- Splyard Creek Dam has an ungated spillway across the Pryde Creek whose sole purpose is for the generation of hydroelectricity. The EAP is available [here⁶⁵](#).

Sewerage Treatment Plants

Collection systems and treatment plants are operated by Urban Utilities and are located in the towns of Esk, Toogoolawah, Kilcoy and Lowood. All systems are gravitational with pump stations. All plants are mapped on the QPSAAO. The Esk plant produces treated water that is reused by third party users.

⁵⁹ <https://www.abc.net.au/brisbane>

⁶⁰ <https://www.river94.9.com.au>

⁶¹ https://www.rdmw.qld.gov.au/data/assets/pdf_file/0006/1619700/cressbrook-eap.pdf

⁶² https://www.rdmw.qld.gov.au/data/assets/pdf_file/0005/1619771/somerset-eap.pdf

⁶³ https://www.rdmw.qld.gov.au/data/assets/pdf_file/0011/1619786/wivenhoe-eap.pdf

⁶⁴ https://www.rdmw.qld.gov.au/data/assets/pdf_file/0010/1619632/atkinson-eap.pdf

⁶⁵ https://www.rdmw.qld.gov.au/data/assets/pdf_file/0006/1619772/splyard-creek-eap.pdf



6 Hazards and Risk Assessments and Mitigation

6.1 Somerset LDMG QERMF Implementation (2022)

QFES prescribes the standard for Risk Assessments to be conducted across Queensland, the Queensland Emergency Risk Management Framework (QERMF). The QERMF assists key stakeholders working within the QDMA to review existing natural disaster risk management processes and assist in enhancing resilience. More information is available on the QERMF [website](#)⁶⁶. During 2021-22, Council implemented the QERMF in full.

Annual Exceedance Probability

The Annual Exceedance Probability (AEP) is the probability of a hazard occurring once in a year and is calculated by utilising historical data for the local area. Figure 5 below provides the AEP of all relevant hazards as determined by the QERMF 2022 implementation

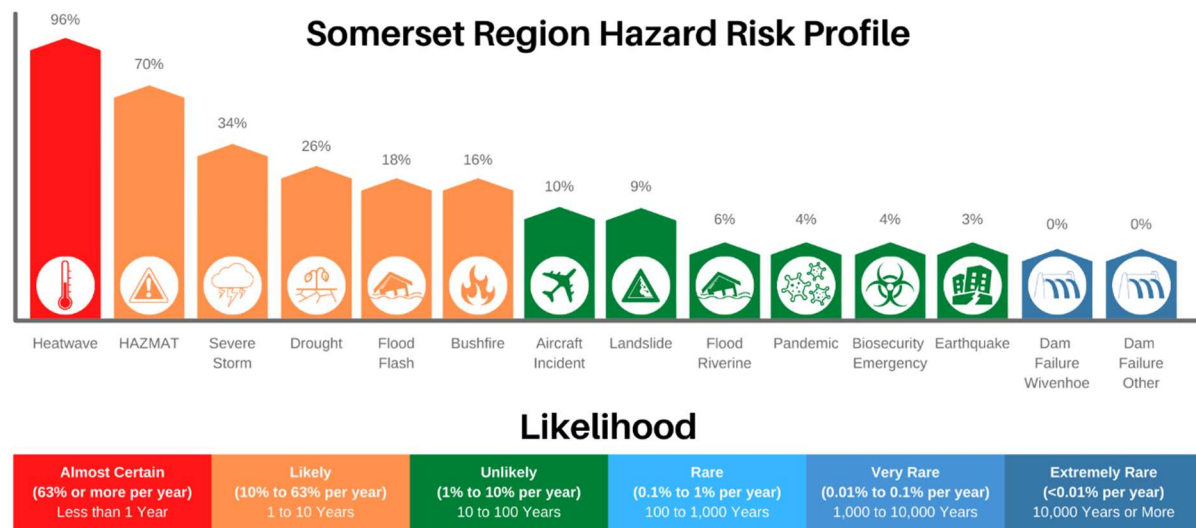


Figure 5: AEP for relevant hazards for the Somerset LDMG

As part of the 2022 QERMF process, all agencies across the LDMG were invited to provide detail on their mitigation programs against each of the hazards listed in relation to their vulnerable elements. A complete list of all vulnerable elements, by hazard type, and their mitigation activities are contained within the QERMF workbooks, which are available through the SRC Disaster Management Officer.

A summary of each of the hazards, relevant considerations occurring across the Somerset LDMG are provided below.



Flooding across Esk Kilcoy Road during the Feb-Mar 2022 Severe Weather Event

⁶⁶ <https://www.disaster.qld.gov.au/dmg/Prevention/Pages/3-5.aspx>

6.2 Heatwave

Table 8 below provides analysis on the Heatwave hazard, based on the 2022 QERMF implementation.

Definition	A heatwave occurs when the maximum and the minimum temperatures are unusually hotter than average over a three-day period. This is considered in relation to the local climate and past weather at the location.
Trends	By 2070, the projected range of warming is 1.2 to 3.8°C, depending on future emissions. The region's summer average temperature is 24°C. This could rise to over 25°C by 2030 and to over 27°C by 2070. There is likely to be a substantial increase in the temperature reached on the hottest days, and an increase in the frequency of hot days and the duration of warm spells, including increased frequency and duration of heatwaves ⁶⁷ .
Likelihood	Heatwave is the highest risk to the SRC LGA and has been calculated to be 96% AEP. This places heatwave risk in the "Almost Certain" category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	Higher demand on power for cooling and other uses will increase strain on the power network, especially during hot nights. Projected changes in heatwave frequency, duration, and intensity are likely to contribute to further increased demand. With increased and sustained temperatures there is a higher risk of bacterial contamination within water infrastructure such as reservoirs and bores.
Access and Resupply	Road and rail networks are vulnerable to damage during periods of intense heat. Damage may result in road closures and affect heavy haulage. Service cancellations or delivery delays for rail transport and freight services may result. People walking and using active transport are more likely to be exposed, and more vulnerable to heat related illness.
Community and Social	Cultural and linguistic barriers may increase vulnerability due to social isolation, limited understanding of heatwave risk, and key messaging.
Medical	Significantly increased mortality rates are likely among vulnerable populations. Vulnerable populations include the elderly, the very young, Aboriginal and Torres Strait Islander communities, people outdoors, people working in hot and/or humid environments, and those with compromised physical and mental wellbeing.
Significant Industries	Sustained high temperatures may reduce crop yield and quality, and affect the productivity, health and wellbeing of livestock. Vulnerability of ecosystems and impacts to biodiversity may affect tourism. Visitation and enjoyment of attractions and experiences may decline.
Environmental	Higher temperatures may result in increased occurrence of algal blooms and fish kill incidents in freshwater ecosystems. Mass deaths of heat sensitive species and birds may occur, and the risk of extinction for some species may increase.
Mitigation	
Powerlink and Energy Queensland (Energex) have strong mitigations and business continuity plans to maintain power to the region and state. Emergency Services and medical facilities have strong BCPs and redundancies in place to manage the impacts of heatwave.	

Table 8: Heatwave Hazard Overview

6.3 HAZMAT Incident

Table 9 below provides analysis on the HAZMAT Incident hazard, based on the 2022 QERMF implementation.

⁶⁷Queensland Government, Climate Change in the South East Region, Department of Environment and Science
https://www.qld.gov.au/data/assets/pdf_file/0023/67631/seq-climate-change-impact-summary.pdf

Definition	HAZMAT incidents have the potential to cause harm to persons, property, or the environment. HAZMAT incidents (such as chemical spill, dangerous goods, incidents etc.) often pose significant difficulties to emergency responders and frequently require multi-agency response and technical expertise to manage their safe resolution ⁶⁸ .
Trends	There have been no significant HAZMAT incidents in the Somerset region that have required the support of the LDMG. The events identified to determine the AEP were classified as Chemical Spill or Leak, Hazardous Materials (including suspected CBR), however all HAZMAT incidents have been small in nature and complexity and have been able to be managed with the initial responding Fire and Rescue crews.
Likelihood	The AEP of Hazardous Materials Incidents have been calculated to be 70%. This places heatwave risk in the “Likely” category, however the risk to the region is low as most events are localised.
Potential Exposure and Vulnerability Impacts	
Infrastructure	Significant infrastructure at the location of the HAZMAT incident may sustain damage, depending on the type of incident. Neighbouring infrastructure may also sustain damage, depending on the impact (e.g., explosion), however this is still expected to be localised.
Access and Resupply	Hazardous Materials are transported across the Somerset region by truck each day. Should a HAZMAT incident occur on a main road there may be significant delays to as the roads are closed for clean-up and/or repair.
Community and Social	Should a HAZMAT Incident occur, communities may be impacted if they are required to evacuate their properties due to the incident. There are no particular at-risk areas to note.
Medical	In the event of a HAZMAT incident QAS would be the primary medical response organisation and patients would likely to be transferred out of region to Ipswich or Brisbane.
Significant Industries	Long term effects to significant industries in the area are not expected.
Environmental	HAZMAT Incidents, depending on the type of material and scale of incident, could have significant environmental impacts. Facilities that house hazardous materials are required to have comprehensive emergency response procedures, including in the event of a spill, and ways to contain these.
Mitigation	
There are no major hazard facilities recorded in the Somerset LGA, however there a number of other facilities that store small amounts of hazardous materials, for example the Water Treatment Plants throughout the region and a medical waste facility operated by Queensland Health. Each location/industry has comprehensive emergency response procedures and works closely with QFES, who has a dedicated HAZMAT response capability.	

Table 9: Hazardous Materials Incident Hazard Overview

⁶⁸ Queensland Government, Queensland Fire and Emergency Services, Chemical Incidents, <https://www.qfes.qld.gov.au/prepare/chemical>

6.4 Severe Thunderstorm

Table 10 below provides analysis on the Severe Thunderstorm hazard, based on the 2022 QERMF implementation.

Definition	Thunderstorms which produce any of the following are classified as severe in Australia - large hail (2 cm in diameter or greater); damaging wind gusts (90 km/h or greater); tornadoes; or heavy rainfall conducive to flash flooding ⁶⁹ .
Trends	Somerset LGA has experienced 42 severe thunderstorms, with significant impacts from hail and flash flooding in the last one hundred years. Predicted increases in storm intensity may result in a higher risk of damage to property.
Likelihood	Severe thunderstorm is the third highest risk to the Somerset Region and has been calculated to be 34% AEP. This places severe thunderstorm risk in the "Likely" category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	Severe thunderstorms have the potential to damage key infrastructure with large hail and high winds. Secondary hazards exist in relation to power outages across the Region. Damage to infrastructure could be severe, and redundancies may be required to host alternate infrastructure for business continuity.
Access and Resupply	Access and resupply issues relate to matters such as trees or power lines over roads. These are likely to be short in duration with the deployment of Council and other agencies to resolve these often-localised incidents.
Community and Social	Community and social assets can be impacted during severe thunderstorms. Given the age of many of the properties in the Region, there is potential for damage to roofs, windows etc. which may lead to the requirement for short term recovery and displacement of community.
Medical	Most of the medical facilities in the region are maintained by the State, and there is limited risk of large-scale impact on reduction of services due to severe thunderstorms. Key health and aged care sites have back up generation to maintain critical services.
Significant Industries	The agricultural industries are at the highest risk of damage from severe thunderstorms, as these can significantly damage crops and farming infrastructure. Other significant industry across the region is relatively resilient to severe thunderstorms. Whilst damage may occur to assets, significant industry is likely to be able to operate under business continuity plans.
Environmental	Environmental damage can be seen during events, where they cause damage or destroy local ecosystems, bring trees down which have been standing for decades and alter the environments of the natural assets across the Somerset such as D'Aguiar National Park. They can also cause creek and catchment damage with debris entering watercourses affecting riparian zones and cause large scale clean-up operations.
Mitigation	
The solar farm between Harlin and Kilcoy (500MW+) would be at some risk should large hail impact the region. Other Power Stations have little vulnerability to severe thunderstorms. Energy Queensland has a response plan which is scalable from local, regional and State levels to reconnect power. The Energy Queensland website provides significant information on outages to the community. The LDMG undertakes community education under the Get Ready Queensland initiative to advise residents on what actions they can undertake to prepare. The Somerset SES is a sustainable Unit with modern equipment and trained personnel to respond to requests for assistance. Through QFES the SES are also able to request additional support from across the South East and State if required.	

⁶⁹ Commonwealth Government, Bureau of Meteorology - <http://www.bom.gov.au/weather-services/severe-weather-knowledge-centre/severethunder.shtml>

Table 10: Severe Thunderstorm Hazard Overview

6.5 Drought

Table 11 below provides analysis on the Drought hazard, based on the 2022 QERMF implementation.

Definition	Drought is a prolonged, abnormally dry period when the amount of available water is insufficient to meet our normal use. Because people use water in so many different ways, there is no universal definition of drought. It is measured in different ways and at different timescales.
Trends	With the likely substantial increase in the temperature reached on the hottest days, and an increase in the frequency of hot days and the duration of warm spells, by late this century, under a high emissions scenario, it is likely that the Somerset region will experience more time in drought. The region has seen 35 drought declarations over 126 years – many of these declarations have lasted for 3+ years at a time, increasing in duration in the recent years.
Likelihood	Drought is the fourth highest risk to the Somerset Region and has been calculated to be 26% AEP. This places drought risk in the “Likely” category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	Drought should have minimal effect on the majority of infrastructure, however, can lead to industry slowing or shutting down given the primary employment categories in agriculture and meat processing across the region. Reduced water availability has flow on effects to fire response capability.
Access and Resupply	Drought has limited impact on access and resupply to the Region. Where appropriate the use of grazing along roadways can be utilised to maintain the rural industries while also reducing bushfire risk.
Community and Social	Drought can have high impacts on the community and social structure. Primary producers may need to reduce stock (due to lack of feed, water, and money to provide these) which then has a flow on affect to meat processing, and this can lead to larger scale economic reduction, and more impact on the urban areas as people move away from farming and into the urban centres. Reduction in the farming industry can also impact food supplies locally and nationally.
Medical	Prolonged drought and its impact on generational farmers have seen an increased need for mental health services.
Significant Industries	Drought has significant impact on the agricultural industry, impacting water supplies crucial for growing crops, feed and other farm uses. Current conditions have driven up feed and water prices, due to high demand and limited availability. This is impacting all farmers and can lead to economic decline and reduction in significant industry as farmers leave the area. There are also likely tourism impacts in areas such as Somerset and Wivenhoe Dams and Lakes with areas being closed for tourism purpose.
Environmental	During periods of drought existing threats to flora and fauna are exacerbated, changes to natural habitats occur and there is a changing dynamic of invasive species, pests and diseases. The assessment acknowledges the direct link between environmental and tourism outcomes. As environmental assets are impacted by drought, tourism attraction can reduce leading to poor regional outcomes.
Mitigation	
SEQWater has a Water Security Program 2016-2046 and Drought Management Plan in place. The Water Security Program is SEQWater’s plan to provide South East Queensland with drinking water over the next 30 years. This includes planning for extreme weather — both flood and drought. The Program is a requirement under the <i>Water Act 2000</i> and is an updated version of the plan published in 2015. Bore water is available for some agricultural areas when there are supply restrictions from Atkinson Dam.	

Table 11: Drought Hazard Overview

6.6 Flooding – Flash

Table 12 below provides analysis on the Flooding – Flash hazard, based on the 2022 QERMF implementation.

Definition	Flooding occurring within about six hours of rain, usually the result of intense local rain and characterised by rapid rises in water-levels, is known as flash flooding.
Trends	The Somerset LGA is built between many minor watercourses such as Redbank Creek, Cressbrook Creek, Ivory Creek, Kilcoy Creek, Sheep Station Creek , Neurum Creek and Oaky Creek. Flash flooding can occur locally by severe thunderstorms, or by more persistent systems such as East Coast lows which produce the rainfall levels required.
Likelihood	Flash Flooding is the fifth highest risk to the Somerset Region and has been calculated to be 18% AEP. This places flash flooding risk in the lower end of the “Likely” category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	Critical Infrastructure which is built along the various creek systems across the area are prone to flash flooding. Overland flooding (when the soil is at maximum moisture levels), can also contribute to flash flooding, which could inundate infrastructure across the Somerset LGA.
Access and Resupply	Access and Resupply routes are less at risk for this hazard compared to riverine flooding, due to their features of "water up, water down" in a quick manner, however there is potential for road damage for those which are not built to withstand such an event.
Community and Social	Some schools located in flood prone areas may be affected by flash flooding. Evacuation of houses and business premises may be required. Damage may occur to these properties as a result of flooding.
Medical	Any impact on medical facilities across the Somerset LGA would likely be localised, and not cause an LDMG response.
Significant Industries	Flash flooding can impact agricultural land throughout the Somerset LGA and has done so in recent history.
Environmental	Washouts and other debris within waterways can impact the environment through erosion and bank destabilisation.
Mitigation	
SRC has commissioned a number of flood studies to assist in planning and DM on behalf of the LDMG. A number of mitigations works, such as roadworks and replacement of vulnerable bridges have been undertaken since the 2010-11 flood event. SEQWater has plans in place for the management of Somerset and Wivenhoe Dams during flood events to lower the risks of flooding. Agencies such as the Department of Transport and Main Roads (DTMR), Energy Queensland, and Somerset Regional Council have strong response plans for flooding events. The Somerset LDMG undertakes a range of community resilience programs under "Get Ready Queensland" to prepare the local communities hazards including flooding.	

Table 12: Flooding - Flash Hazard Overview

6.7 Bushfire

Table 13 below provides analysis on the bushfire hazard, based on the 2022 QERMF implementation.

Definition	A bushfire is a fire involving grass, scrub or forest. A bushfire can cause injury, loss of life and/or damage property or the natural environment ⁷⁰ .
Trends	Bushfires are a feature across the Somerset Region, with fires recorded every year across the Council Area from 2010. Large fires which threatened properties were seen in 2018 and 2019 in Redbank Creek, Cressbrook, Patrick Estate, Wivenhoe Pocket, Jimna, Esk and other areas, where prepare to leave messages were issued.
Likelihood	This assessment has identified bushfire as being the sixth risk to the Somerset Region calculated to be 16% AEP. This places bushfire risk at the lower end of the "Likely" category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	There is a range of infrastructure across the Somerset LDMG area which could be impacted by fire, across varying potential intensity bushfire prone land. This infrastructure includes power and communications assets, and the water network.
Access and Resupply	Road Access areas along the Brisbane Valley Highway, D'Aguilar Highway and Warrego Highway (at Minden). Given a good deal of Somerset LGA is lined with creeks and rivers, riparian zones that also run parallel with roads can both increase fire spread through "wicking" and close local strategic roads.
Community and Social	There are remote localities in the Somerset LGA which are exposed to "Very High Potential Bushfire Intensity" such as Jimna, Linville, Villeneuve, and Moore. Areas in and around Somerset Dam, Esk are also at risk. Fire history suggests that fires may travel from the Lockyer Valley Regional Council area through Lockyer National Park and enter the Somerset LGA, which requires a coordinated approach between both LDMGs and QFES to protect communities to the east and northeast of the National Park. Similarly, fires can travel from the Toowoomba Regional Council area, and impact the South-west part of our region such as what occurred in the Pechey fires of 2019.
Medical	There are no medical facilities directly in very high potential bushfire intensity prone land, however Esk Hospital is close to bushland buffer zone. Access between medical facilities needs to be considered with arterial roads being potentially impacted.
Significant Industries	The impact of bushfire on the landscape has a direct relationship with drought and heatwave and its intensity. Given both these risks are increasing, the impact on the agriculture industry, as the biggest employer across the Somerset LGA, it needs to be considered into the future at how best fires can be prevented and their spread minimalised.
Environmental	Some plant species are vulnerable to damage or extinction when fires burn at an extreme or catastrophic level. Long term changes to the vegetation landscape can result from fire events.
Mitigation	
Queensland Parks & Wildlife Service, Rural Fire Service, HQPlantations, DTMR, SEQWater and other landholders have strong bushfire mitigation plans and undertake mitigation actions. The Somerset Area Fire Management Group, coordinated by QFES, meets regularly to monitor risk, identify high risk areas and collaborate to plan, implement and report bushfire mitigation activities. Mitigation strategies such as fire break and trail maintenance, controlled burns, planting of fire-resistant species in bushfire prone areas and community education and engagement activities are performed regularly throughout the Region.	

⁷⁰ Queensland Government, Queensland Fire and Emergency Services Queensland Bushfire Plan, s.1.7.1 p.3

Table 13: Bushfire Hazard Overview

6.8 Aircraft Incident

Table 14 below provides analysis on the aircraft incident hazard, based on the 2022 QERMF implementation.

Definition	An aircraft incident, for the purpose of this assessment, is a crash or other event that involves an aircraft and leads to a disruption of the community.
Trends	The flight path for Brisbane Airport tracks directly over the north eastern corner of the Somerset Regional Council area. The LIMA approach sees flights descend to around 3,500 metres near Kilcoy and Royston with an average of 76 flights a day. Since 1990, there has been a total of 9 aircraft accidents, and 95 incidents, 8 of which were deemed to be serious. Two fatalities have been reported ⁷¹ .
Likelihood	This assessment has calculated the likelihood to be 10% AEP. This places the risk at the high end of the “Unlikely” category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	In the event of a large-scale aircraft incident, there could be significant, localised, infrastructure damage at the site of the incident.
Access and Resupply	Significant access and resupply issues could be realised in the event of a major aircraft accident that impacts a major transport route e.g., the D’Aguilar Highway.
Community and Social	There may be the requirements to evacuate the surrounding areas of the incident site while Civil Aviation Safety Authority (CASA) investigations occur, along with plans to rebuild any community infrastructure and housing that could be damaged as a result.
Medical	It is likely that medical capacity at Kilcoy Hospital would be quickly overwhelmed, and State arrangements would need to be enacted.
Significant Industries	Significant local industry in and around the incident area could be disrupted during a large-scale aviation accident.
Environmental	There are a range of environmental considerations that are exposed from a large-scale aviation accident. Bushland areas around the incident location may present a fire risk, and the spill of jet fuel into catchments may contaminate water supplies.
Mitigation	
The five airfields in the area are generally used for private usage, and any incident would have little to no impact on the greater community. Emergency services and other agencies have response plans in place should a major aircraft incident occur, with support available from the District and State if required.	

Table 14: Aircraft Incident Hazard Overview

⁷¹ Commonwealth Government, Australian Transport and Safety Bureau, <https://www.atsb.gov.au/aviation/aviation-statistics/>

6.9 Landslip

Table 15 below provides analysis on the Landslip hazard, based on the 2022 QERMF implementation.

Definition	A Landslip is the movement of a mass of rock, debris or earth down a slope ⁷² .
Trends	There have been four recorded Landslip events for Somerset Region, all were in the north: near Esk, east of Fulham, at Kilcoy and west of Moore. Each of these events, the cause was prolonged rainfall, indicating the clear link between this being a secondary hazard to heavy rainfall events. Other locations can be susceptible to landslip , such as Esk Hampton Road and Kilcoy Murgon Road near Jimna.
Likelihood	This assessment has calculated the likelihood to be 9% AEP. This places the risk in the “Unlikely” category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	The risk to critical infrastructure across the region is limited.
Access and Resupply	The most populated areas of Jimna, Moore, Linville, Esk, and the eastern side of Fernvale are the highest risk areas across the shire. Due to the undulation of the area, and the key transport routes passing through the ranges, there is significant risk for Landslips to block the Brisbane Valley Highway or D’Aguiar Highway which could disrupt traffic flow between the major centres and villages across SRC.
Community and Social	Where Landslips occur and transport routes are affected, there is possibilities of communities becoming isolated, or taking longer to resupply. Typically, Landslips are destructive, so in the case of areas such as the western side of Esk, this could see communities displaced if a large event occurred.
Medical	There would be minimal impact on the medical services in the event of a Landslip.
Significant Industries	The risk to significant industries across the region is limited.
Environmental	Landslips can overwhelm, and even pollute streams and waterbodies with excess sediment. In extreme cases they can dam streams and rivers, impacting both water quality and fish habitat. Landslips can wipe out large tracts of forest, destroy wildlife habitat, and remove productive soils from slopes.
Mitigation	
As part of this planning scheme, Landslip is considered in the approval for urban and regional planning, reducing the risk of private or commercial property being impacted by Landslip.	

Table 15: Landslip Hazard Overview

⁷² Commonwealth Government, Geoscience Australia, https://www.ga.gov.au/_data/assets/pdf_file/0010/86491/Landslide-Awareness.pdf

6.10 Flood - Riverine

Table 16 below provides analysis on the flood - riverine hazard, based on the 2022 QERMF implementation.

Definition	Riverine flooding can be caused by systems such as east coast lows, or as was the case in 2011, releases from Dams which are at full capacity, combined with catchment flows.
Trends	There have been five major flooding events in the Somerset Region over 72 years, with the 2010-11 flooding event being the most impactful.
Likelihood	The major flooding hazard for the Somerset Region has been calculated to be 6% AEP. This places major flooding risk in the "Unlikely" category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	Infrastructure built in at-risk areas may be impacted by flooding, however urban planning and development should limit the amount of built infrastructure without resiliency in these areas. Infrastructure in areas such as Lowood, Fernvale and Esk are at highest risk of riverine flooding.
Access and Resupply	Access and Resupply can be disrupted for days to weeks with major flooding across the area. Whilst work continues to increase the resilience of the infrastructure, the sheer design of the landscape across the Somerset Regional Council lends itself to local and state roads being inundated where they breach bridge levels and road design.
Community and Social	Properties built in at-risk areas may be impacted by flooding, however urban planning and development should limit the amount of built infrastructure without resilience to flooding. Communities may be isolated for over a week and may require a blended approach of resupply and / or evacuation depending on localised hazards.
Medical	Medical facilities may become inundated or isolated. This requires Metro North and West Moreton HHS to plan for operations, which will likely rely on the LDMG to provide support to enact these plans.
Significant Industries	The agricultural industry, and most prominently the horticulture industry, are at the highest risk of damage from flooding, as these can significantly damage crops and farming infrastructure, Given the link to water supply and locations of agricultural enterprise across the region, risks exist to a secondary economic disaster occurring concurrently with this hazard.
Environmental	Environmental impacts can be long lasting to the agricultural industries across the Somerset with soil displacement, and a large increase of biosecurity threats with free dispersion of invasive weeds etc. Secondary hazards such as Landslips are likely to have longer term environmental impacts.
Mitigation	
Somerset Regional Council has commissioned a number of flood studies to assist in Planning and Disaster Management for the region. Many mitigation works, such as roadworks and replacement of vulnerable bridges have been undertaken since the 2010-11 flood event. SEQWater has plans in place for the management of Somerset and Wivenhoe Dams during flood events to lower the risks of flooding. Agencies such as the DTMR Energy Queensland, and SRC have strong response plans for flooding events. The Somerset LDMG undertakes a range of community resilience programs under "Get Ready Queensland" to prepare the local communities hazards including flooding.	

Table 16: Flood – Riverine Hazard Overview

6.11 Pandemic

Table 17 below provides analysis on the pandemic hazard, based on the 2022 QERMF implementation.

Definition	Pandemics are epidemics on a global scale. For a disease to have pandemic potential it must meet three criteria: <ul style="list-style-type: none"> • Humans have little or no pre-existing immunity to the causative pathogen; • Infection with the pathogen usually leads to disease in humans; and • The pathogen has the capacity to spread efficiently from person to person⁷³.
Trends	There have been seven pandemics in Australia in the last century. The most significant in recent time, COVID-19.
Likelihood	The pandemic hazard for the Somerset Region has been calculated to be 4% AEP. This places pandemic risk in the “Unlikely” category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	Pandemics do not directly impact infrastructure, however, can have an impact on the workforce which operate, or maintain them.
Access and Resupply	Pandemics do not directly impact access and resupply however can impact on the workforce which operate or maintain networks.
Community and Social	The pandemic hazard has a direct impact on people, the community and its social structure. Longer term pandemics have the ability to reduce community resilience through people being directed to isolate during lockdowns. Impacts on the elderly and those who are more vulnerable can be profound.
Medical	Pandemics have the ability to overwhelm medical facilities and those who work in these facilities. Staff are considered highly vulnerable as they have a higher exposure to the virus than the normal population. Aged care facilities and hospitals are especially vulnerable to pandemics given the age and medical conditions of patients within them.
Significant Industries	Pandemics have the potential to slow or stop industry operations as a result of outbreaks. This is largely managed through Public Health Orders by the State. Vulnerabilities to food or animal processing plants in particular exist during pandemics.
Environmental	Pandemics do not directly impact environmental assets, however, can impact on the workforce which seek to maintain them. This has the potential to slow or stop operations such as hazard reduction or other works occurring which can then present a secondary risk to another hazard.
Mitigation	
With the COVID-19 Pandemic occurring through 2020-22, SRC and other agencies have strong pandemic plans in place. These have been tested and refined and many sites can be operated remotely or with adequate social distancing in place to reduce the spread of disease.	

Table 17: Pandemic Hazard Overview

⁷³ Queensland Government, Queensland Health - https://www.qld.gov.au/__data/assets/pdf_file/0025/124585/FINAL-QLD-WoG-Pandemic-Plan.pdf

6.12 Biosecurity Emergency

Table 18 below provides analysis on the biosecurity emergency hazard, based on the 2022 QERMF implementation.

Definition	A Biosecurity Emergency is an event that is, was or may become a significant problem for human health, social amenity, the economy or the environment, and it was or may be caused by a pest, disease or contaminant ⁷⁴ .
Trends	There have been three Biosecurity Emergencies across the state, and these have cost the local and/or state governments and economies billions of dollars in damage repair costs, producer losses, social pressures, business closures and/or job losses. In Somerset Regional Council the top three employment categories are Meat Processing (6.8% vs. 0.5% as the Queensland average), Beef Cattle Farming (3.6% vs. 0.8% as the Queensland average) and Road Freight Transport (3.2% vs. 1.3% as the Queensland average) ⁷⁵ .
Likelihood	The Biosecurity Emergency hazard for the Somerset Region has been calculated to be 4% AEP. This places pandemic risk in the “Unlikely” category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	Biosecurity Emergencies do not generally directly impact infrastructure however can impact on the industries which operate or rely on it.
Access and Resupply	It is unlikely that there would be any issues in relation to access and resupply during these types of events, as they are generally responded to by Biosecurity Queensland on lands affected. The only potential impact would be possible delays on major routes, where quarantine stations are established.
Community and Social	The impact on the community and social fabric of Somerset Regional Council could be catastrophic of a large-scale biosecurity emergency.
Medical	From a medical perspective, biosecurity emergencies could have devastating community and social impacts, where they lead to the destruction of major industries, increasing the prevalence of mental illnesses.
Significant Industries	The top three employment categories of Meat Processing, Beef Cattle Farming and Road Freight Transport would be heavily impacted should a Biosecurity Emergency impact the agricultural or horticultural industries.
Environmental	The direct and ongoing impact on the environment may take many years to recover from, depending on the source (plant, animal etc.) and the associated response to it.
Mitigation	
SRC has a mature Biosecurity Plan which defines the various stages of prevention, preparedness, response and recovery to a Biosecurity emergency. Biosecurity Queensland (as part of Department of Agriculture and Fisheries (DAF)) have strong links into the community and agricultural industries and a Biosecurity Emergency response would be supported by the State and Commonwealth governments.	

Table 18: Biosecurity Emergency Hazard Overview

⁷⁴ Queensland Government, Department of Agriculture and Fisheries, <https://www.daf.qld.gov.au/business-priorities/biosecurity/policy-legislation-regulation/biosecurity-act-2014/terms>

⁷⁵ Commonwealth Government, Australian Bureau of Statistics, https://quickstats.censusdata.abs.gov.au/census_services/getproduct/census/2016/communityprofile/LGA36580?opendocument

6.13 Earthquake

Table 19 below provides analysis on the earthquake hazard, based on the 2022 QERMF implementation.

Definition	Earthquakes are the vibrations caused by rocks breaking under stress. The size or magnitude is determined by measuring the amplitude of the seismic waves recorded on a seismograph and the distance of the seismograph from the earthquake ⁷⁶ .
Trends	There have been four seismic events, greater than magnitude 3.0, across the Somerset Region in the past 108 years.
Likelihood	The earthquake hazard for the Somerset Region has been calculated to be 4% AEP. This places earthquake risk in the lower end of the “Unlikely” category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	A computer simulated earthquake (ShakeMap) generated with a local magnitude 5.6 equivalent to the 28 December 1989 event in Newcastle, and applied to the Somerset Region, shows that there would only be superficial, if any, damage to infrastructure. There has been no damage to power transmission or gas line infrastructure from previous seismic events.
Access and Resupply	While there is potential to see impacts to major arterials, bridges and other access routes during a major earthquake across the Somerset Region, the data does not support the occurrence of such an event. No notable incidents have been recorded for earthquake damage across the major arterial or local road networks from previous seismic events.
Community and Social	There may be psychological issues in relation to the community which need to be managed post an earthquake event.
Medical	It is expected that there would be limited to no impact on the medical facilities or services as a result of an earthquake of this magnitude.
Significant Industries	It is expected that there would be limited to no impact on significant industries as a result of an earthquake of this magnitude.
Environmental	There is likely to be limited to no environmental damage as a result of an earthquake of this magnitude.
Mitigation	
Agencies such as DTMR and QFES have mature response and recovery plans in place for all hazards. Queensland Health have redundancy plans which are able to be activated for patient movement if hospitals across the Somerset Region are impacted. The LDMG has a mature Local Disaster Management Plan which could be activated to deal with community impact if there were displaced residents.	

Table 19: Earthquake Hazard Overview

⁷⁶ Geoscience Australia - <https://www.ga.gov.au/scientific-topics/community-safety/earthquake>

6.14 Dam Failure (Sunny Day) – Wivenhoe Dam

Table 20 below provides analysis on the Dam Failure (Sunny Day) - Wivenhoe hazard, based on the 2022 QERMF implementation.

Definition	A dam failure is an uncontrolled release of water from a reservoir through a dam as a result of structural failures or deficiencies in the dam. Dam failures can range from fairly minor to catastrophic and can possibly harm human life and property downstream from the failure ⁷⁷ .
Trends	Wivenhoe Dam has not suffered any failures since it was built in 1984.
Likelihood	Dam Failure of Wivenhoe Dam has been calculated to be an AEP of 0% placing it in the “Rare” category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	A dam failure will likely cause considerable damage to infrastructure downstream of the Dam (Lowood, Fernvale and surrounds) due to extreme flood level rise, high velocity, and debris that could potentially be generated from the failure.
Access and Resupply	A dam failure will likely cause considerable damage to the road network downstream of the Dam (Lowood, Fernvale and surrounds) due to extreme flood level rise, high velocity, and debris that could potentially be generated from the failure.
Community and Social	Under a sunny day failure there is 65,000 people at risk downstream in total. For the Somerset LGA, Residents in Lake Wivenhoe and Wivenhoe Pocket (440 residents in ABS 2016) become threatened within one hour, with Patrick Estate (189), Rifle Range (186), Mount Tarampa (481), Clarendon (244), and Coominya (1200) and Lowood (4159) flooding within 1-3 hours. In the event of a failure, this is likely to cause destruction and significant damage to the community, its assets and social fabric and would require a high level of support by the LDMG for an ongoing timeframe.
Medical	There are no direct impact on hospitals due to dam failure however it is expected that the hospital system would be strained with an increase in casualties and injuries.
Significant Industries	The local agricultural industry is likely to be impacted between the dam wall at Wivenhoe and the Warrego Highway. It could be expected that areas close to the dam wall would be a complete loss and anticipation would be reasonable that a full redevelopment may be required.
Environmental	Extensive environmental damage could be expected with vegetation damage, salt scalds and displacement of soils and lands in the immediate areas to the south of the dam in the event of a sunny day failure.
Mitigation	
The dam operators have comprehensive EAPs in the event of a Dam Failure or other events involving the dams. SEQWater and Clean Co (the operators of the dams) are committed to maintaining a comprehensive dam safety management program aimed at ensuring the continued safe and reliable operation of all dams and does not expect that a catastrophic dam failure event will occur.	

Table 20: Dam Failure (Sunny Day) - Wivenhoe Hazard Overview

⁷⁷ University of Calgary, website, https://energyeducation.ca/encyclopedia/Dam_failures

6.15 Dam Failure (Sunny Day) – Other Major Dams

Table 21 below provides analysis on the Dam Failure (Sunny Day) – Other Dams hazard, based on the 2022 QERMF implementation.

Definition	A dam failure is an uncontrolled release of water from a reservoir through a <u>dam</u> as a result of structural failures or deficiencies in the dam. Dam failures can range from fairly minor to catastrophic and can possibly harm human life and property downstream from the failure ⁷⁸ .
Trends	There have not been any dam failures at Somerset Dam, Splityard Creek Dam or Atkinson Dam since they were built.
Likelihood	Dam Failure of Somerset Dam, Splityard Creek Dam or Atkinson Dam has been calculated to be an AEP of 0% placing it in the “Rare” category.
Potential Exposure and Vulnerability Impacts	
Infrastructure	The loss of the dam at Somerset during a sunny day failure would unlikely cause significant damage to infrastructure due to the flows into Wivenhoe and Stanley River. A failure at Splityard Creek Dam would see minimal impact on local infrastructure in and around the Dam. In the case of a failure at Atkinson Dam, there is a potential for Mount Tarampa State School to have minor flooding experienced.
Access and Resupply	The impact of a sunny day failure at Somerset Dam, sees roads such as Wivenhoe Somerset Road, Esk Kilcoy Road and Brisbane Valley Highway impacted in and around the bridges area. For a dam failure of Splityard Creek, Wivenhoe-Somerset Rd and Brisbane Valley Highway are likely to be impacted. For a failure at Atkinson Dam, roads such as Atkinson’s Dam Rd, Coominya Connection Road, Clarendon Road and Forrest Hill Fernvale Road will be impacted.
Community and Social	The impact of a sunny day failure at Somerset Dam, sees only 7 people at risk (vs. 66,000 during flood). Water is dispersed predominately into Lake Wivenhoe and the Stanley River, and the impact to the community is minimal (however the consequential impacts to Wivenhoe need to be considered). A failure at Splityard Creek Dam sees 47 people at risk. The impact is limited due to its size, and minimal impacts to the northern areas of Fernvale and eastern sides of Wivenhoe Pocket is affected. In the case of a sunny day failure, there are 30 people at risk around the Coominya and Clarendon, Patrick Estate, Lowood and Wivenhoe Pocket areas.
Medical	There are no direct impact on hospitals due to dam failure however it is expected that the hospital system would be strained with an increase in casualties and injuries.
Significant Industries	The local agricultural industry is likely to be impacted downstream of the dam wall/s. It could be expected that areas close to the dam wall would be a complete loss and anticipation would be reasonable that a full redevelopment may be required.
Environmental	Extensive environmental damage could be expected with vegetation damage, salt scalds and displacement of soils and lands in the immediate areas downstream of the dams in the event of a sunny day failure.
Mitigation	
The dam operators have comprehensive EAPs in the event of a Dam Failure or other events involving the dams. SEQWater and Clean Co (the operators of the dams) are committed to maintaining a comprehensive dam safety management program aimed at ensuring the continued safe and reliable operation of all dams and does not expect that a catastrophic dam failure event will occur.	

Table 21: Dam Failure (Sunny Day) – Other Dam Hazard Overview

⁷⁸ University of Calgary, website, https://energyeducation.ca/encyclopedia/Dam_failures



7 Prevention

7.1 Somerset Region Risk Mitigation and Reduction

In addition to the mitigation summaries in [Section 6](#) of this plan, below is a summary of other activities the LDMG engages in to reduce the overall risk to the relevant hazards across the Somerset region.

7.2 SRC Planning Scheme and Land Use Strategy

SRC prepares and maintains the SRC Planning Scheme (v4.0), which can be accessed on the SRC [website](#)⁷⁹.

This scheme includes plans, references for land-use management, codes for development, and requirements relating to the assessment of proposed developments. The SRC Planning Scheme contributes to disaster risk reduction within identified hazard-prone/constraint areas, in particular:

- potential bushfire hazard areas (this allows for the identification of an appropriate class of building construction)
- waterways (allowing for minimum building setbacks)
- areas of unstable soils and areas of potential landslip hazard
- natural hazard (flood) management areas (allows for the identification of appropriate development standards so that private and community infrastructure can be sited above recommended flood levels).

There are current land use planning maps for SRC [North](#)⁸⁰ and [South](#)⁸¹ is accessible here.

7.3 Building Codes

Building codes, regulations and standards are designed to ensure consistent, safe, and sustainable development of buildings and infrastructure. Building is regulated by SRC under *the Building Act 1974*⁸² and the *Building Regulation 2006*⁸³. The codes, regulations and standards cover areas including drainage, fire separation, and construction in flood hazard areas. More information on building standards can be found on the SRC [website](#)⁸⁴.

7.4 Community Education

Under s58 of the Act, the LDMG member organisations are responsible for ensuring the community is aware of relevant hazards and risks, how to prepare for, respond to and recover from them. Activities have been identified to ensure that the capacity within the region remains strong:

- Get Ready week participation
- Bushfire preparedness activities in high-risk areas
- Capacity building workshops for spontaneous volunteer management
- Forums with key agencies within the senior's community
- Presentations to local schools regarding local risks and disaster preparedness
- Partnering with DAF to hold presentations for primary producers on the potential impacts of Foot and Mouth Disease and other biosecurity concerns.

⁷⁹ <https://www.somerset.qld.gov.au/downloads/file/2526/somerset-region-planning-scheme-version-4-2>.

⁸⁰ <https://www.somerset.qld.gov.au/downloads/file/2613/zm001a-regional-zone-map-north-version-4-nov-2020->

⁸¹ <https://www.somerset.qld.gov.au/downloads/file/2614/zm001b-regional-zone-map-south-version-4-nov-2020->

⁸² <https://www.legislation.qld.gov.au/view/pdf/inforce/current/act-1975-011>

⁸³ <https://www.legislation.qld.gov.au/view/pdf/inforce/2019-08-09/sl-2006-0227>

⁸⁴ <https://www.somerset.qld.gov.au/our-services/building>

7.5 Insurance

Residents, businesses and other organisations are encouraged to evaluate their risks and consider appropriate levels of insurance.

The 'Understand Insurance' [website](https://understandinsurance.com.au)⁸⁵, developed by the Insurance Council of Australia provides practical information to help residents, businesses and other organisations find out more about insurance and make decisions to meet their needs. It also covers how to understand risks, what to consider when choosing a product and an insurer, how to manage the cost of a premium, and how to lodge a claim⁸⁶.

The Insurance Council of Australia coordinates liaison between government and the insurance industry during the recovery phase of a disaster event. This focuses on:

- Providing senior industry representation to each state and federal recovery group.
- Providing a 24-hour escalation path for insurance queries from the impacted community.
- Providing key insurance data and decision support to the community and government.
- Providing clear public communication about the insurance response to the event.
- Providing liaison between insurers, assessors, brokers, trades and suppliers at an industry level on issues of collective importance in delivering services to the impacted community⁸⁷.

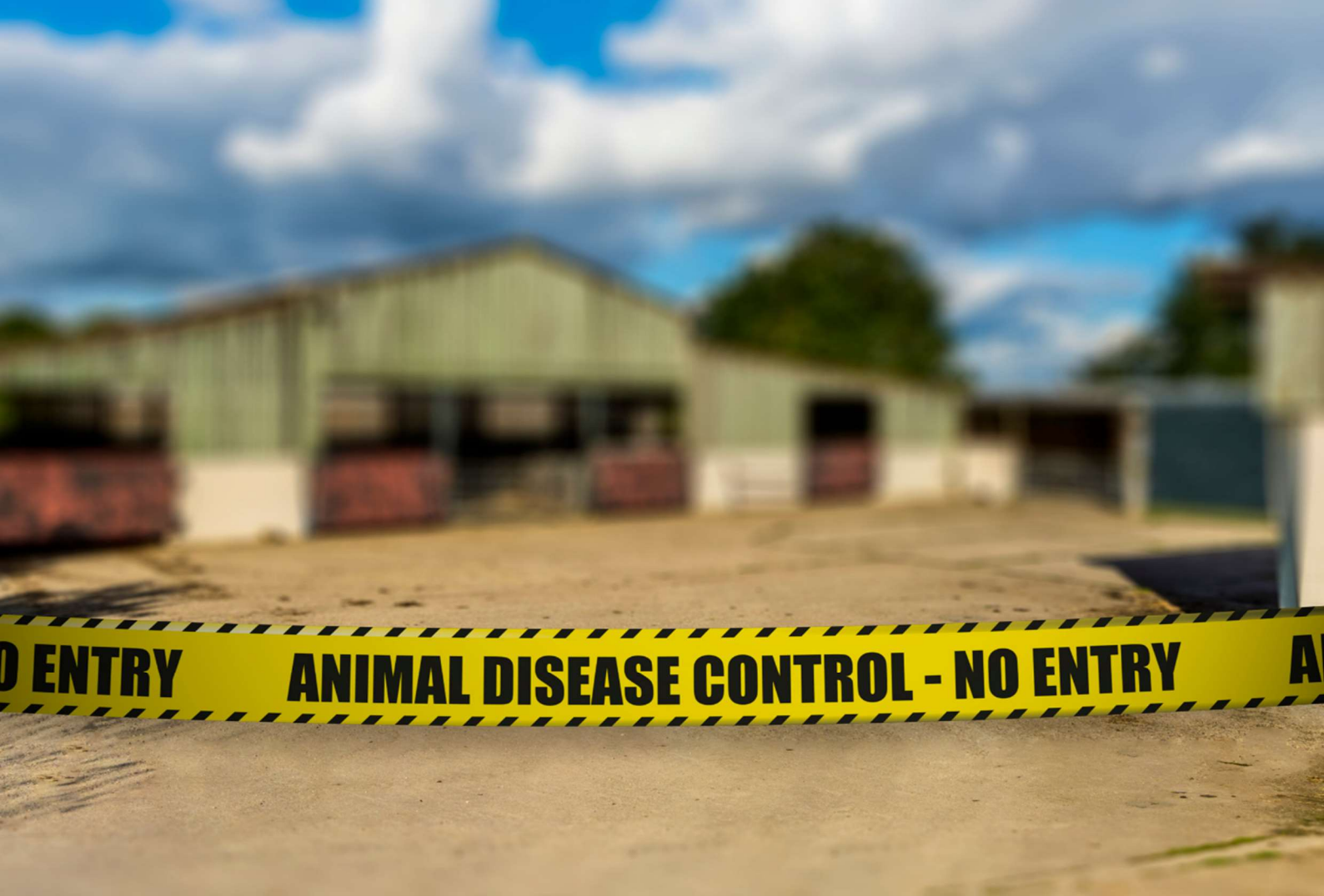


Figure 6: Damage on the Brisbane Valley Highway south of Geoff Fisher Bridge from the Feb-Mar 2022 Severe Weather

⁸⁵ <https://understandinsurance.com.au>

⁸⁶ Insurance Council of Australia [Insurancecouncil.com.au/for-consumers](https://insurancecouncil.com.au/for-consumers)

⁸⁷ Insurance Council of Australia [Insurancecouncil.com.au/for-consumers/catastrophe-arrangements](https://insurancecouncil.com.au/for-consumers/catastrophe-arrangements)



8 Preparedness

8.1 Preparedness – A shared responsibility

Disaster management is a shared responsibility and as such it is important that the community, local government and other agencies are as prepared as possible. By building capacity into the existing communities, the preparedness and resilience of the region can be improved.

Preparedness activities are designed to increase the capability of communities in order to reduce the impact of disasters. Examples of preparedness activities which the Somerset LDMG engages in include:

- developing and implementing community awareness programs
- developing effective information management and collection of historical data events
- developing concise and effective community communications methods
- ensuring that accurate and current plans are in place.

8.2 Response Capabilities

The community is well supported by agencies, organisations, services, and sporting clubs as well as a myriad of special interest and hobby groups. Many of these groups support the region's ability to respond during disaster events.

Council Response Capability

SRC, which employs approximately 190 staff, including:

- Disaster Management Officer
- SES Local Controller
- SRC Depots located in Lowood, Esk, Toogoolawah and Kilcoy
- Council Administration Centres in Esk, Lowood and Kilcoy
- Extensive plant and other resources such as heavy machinery, water trucks, store items (lists are available on request to members of the LDMG).

LDMG Member Agency Response Capability

The locations of Police Stations, Fire and Rescue Stations, SES depots, rural fire brigades and are provided below in figure 6.

8.3 Training

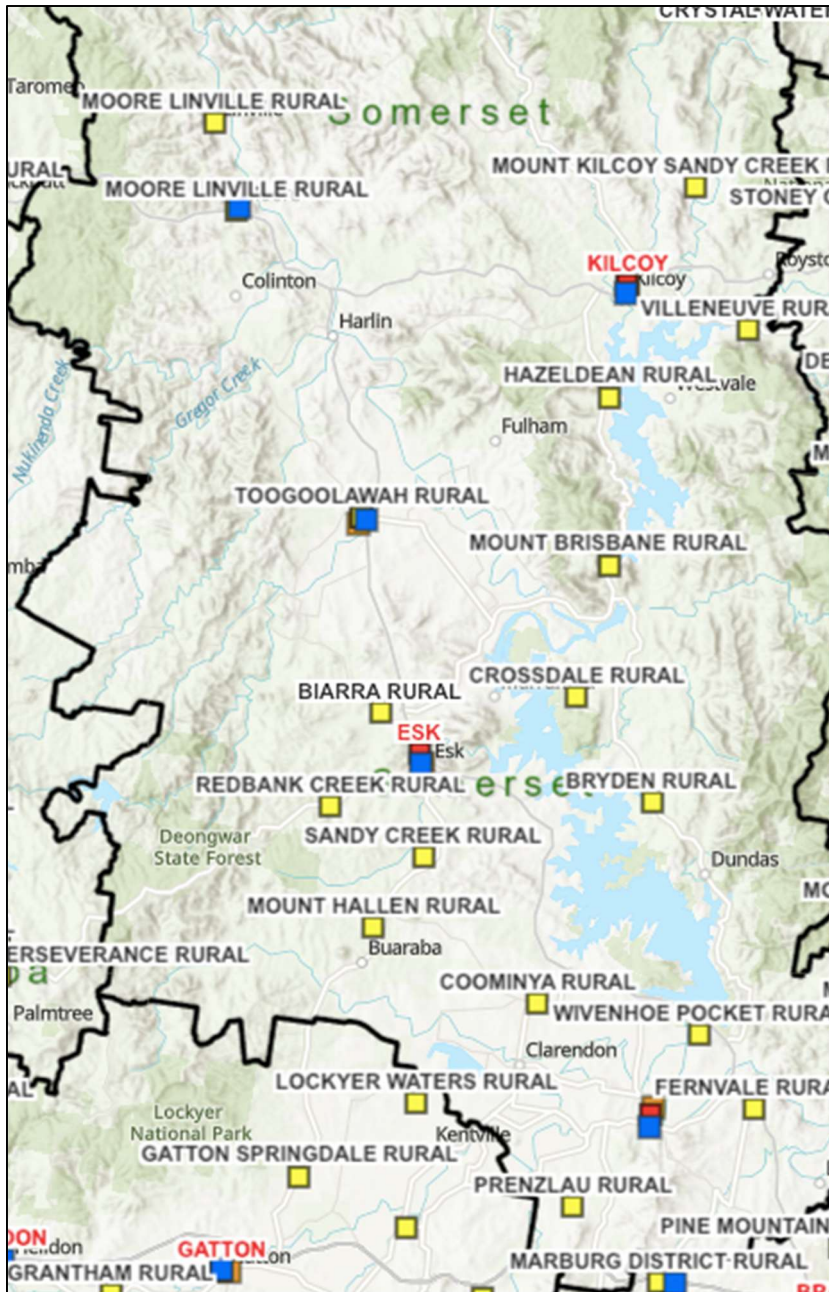
Training and education are important in ensuring all agencies within Queensland's Disaster Management Arrangements can seamlessly integrate, cooperate and contribute to effective and coordinated disaster operations. QFES provides a range training packages to ensure the LDMG members / advisors are adequately trained to fulfil their role under s16 of the Act on the Somerset LDMG. Courses which are mandatory for members to undertake are outlined in the [Queensland Disaster Management Training Framework⁸⁸](#) (QDMTF).

8.4 Exercises

Exercises are used to practise and test this LDMP and any associated sub plans. They are a way of satisfying s59 (2) of the Act. The Somerset LDMG actively participates in exercises with members to ensure that plans are functional and that systems work when needed. Exercises are aligned to be conducted in line with the [Australian Institute of Disaster Resilience \(AIDR\) Handbook: Managing Exercises⁸⁹](#), and be subject to an evaluation, which is designed to identify lessons to feed into the continuous improvement cycle for the Somerset LDMG.

⁸⁸ <https://www.disaster.qld.gov.au/dmg/st/Documents/H1027-QueenslandDisasterManagementTrainingFramework.pdf>

⁸⁹ <https://knowledge.aidr.org.au/media/3547/handbook-3-managing-exercises.pdf>



Rural Fire Service, State Emergency Service, Fire and Rescue, Police

Figure 6: Location of Emergency Service sites across SRC

8.5 Post Event Analysis

The assessment that takes place after an event is critical to ensure continuous improvement of both Response and Recovery operations within the Somerset LDMG. By assessing what worked and what didn't work the LDMG are able to ensure that each event runs more smoothly, and that future coordination is more effective. This assessment will often be undertaken during the debrief process, immediately following an event.

There are generally two types of debriefs that will be conducted;

- The Hot Debrief – this debrief will occur immediately after the event to ensure that relevant information is captured while still fresh in everyone's mind. The Hot debrief can occur at multiple times during an operation at the request of the LDC.
- Post Event Debrief – this debrief is more formal and gives the opportunity for all involved to have a considered view on the effectiveness of the operation. A post operational report should be completed and endorsed by the Somerset LDMG.

An effective debrief will:

- Seek constructive comments from those involved in the event
- Establish what went right and what went wrong, and at the same time trying not to apportion blame
- Recognise good performance and activities that can be sustained or further developed
- Ensure that the debrief is recorded to allow for future reporting
- Focus on improvement
- Identify any gaps in capacity or capability.

The formation of lessons identified from exercises, and post event analysis should be conducted in line with the [AIDR Handbook: Lessons Management⁹⁰](#), and by doing so, the Somerset LDMG will be compatible with the IGEM Lessons Management Framework (LMF), to contribute to sector wide lessons.

8.6 Notification Pathways

Notification of events to the community are important during the preparation stage. The LDMG takes a multi-phased approach to this occurring.

Bureau of Meteorology

Warning products issued by the BoM include severe weather warnings, heatwave warnings, tropical cyclone advice and tsunami warnings. The community is encouraged to subscribe to these. Monitoring may also occur through BoM [website⁹¹](#) or through the BoM App available from the Google Play Store or Apple Store.

SRC Early Warning Service

SRC provides residents of the Somerset LGA a free early warning service that provides subscribers with notifications on severe weather events that could impact their residential address. The LDMG encourages all residents to register for the free service on the SRC [website⁹²](#).

⁹⁰ <https://knowledge.aidr.org.au/resources/lessons-management-handbook/>

⁹¹ <http://www.bom.gov.au>

⁹² <http://www.somerset.qld.gov.au/ewn>

Social Media

SRC has an active [Facebook](#)⁹³ presence during an event to assist in providing information to the community.

Websites

The SRC [website](#)⁹⁴ is a valuable source of disaster preparedness information and has a links to other agencies and organisations that can assist the community to be better prepared, such as:

- [Get Ready Queensland](#)⁹⁵
- [Rural Fire Service Queensland](#)⁹⁶.

SRC Disaster Dashboard

The [Somerset Disaster Dashboard](#)⁹⁷ is used by the LDMG to provide the following sorts of information to the community during disaster and emergencies:

- Public Bulletins
- Power Outages
- Road Closures
- Current bushfire incidents
- Flood Camera images
- Active Evacuation Centres
- Facebook/Twitter feeds for Somerset Regional Council
- Latest weather warnings from BOM
- Significant weather threat map (as at 9am each morning).

SEQWater Notification Service

SEQWater provides information on planned releases of water from the dams in addition to other notices. For more information visit the seqwater [website](#)⁹⁸.

To assist the guidance on who is responsible for notifying the community about specific threats, table 22 provides the lead member agency for each hazard.

Hazard	Responsible Agency
Animal/Plant Disease	Relevant agency (e.g., DAF)
Fire (urban and rural)	QFES
Flooding	BOM and SRC
Hazardous Materials	QFES
Heatwave	Queensland Health
Major Transport Accident (road and air)	DTMR, QPS
Pandemics and Epidemics	Queensland Health
Severe Storm, East Coast Low	BOM
Water Contamination	Urban Utilities and SRC

Table 22: Lead agency for community notifications

⁹³ <https://www.facebook.com/SomersetRegionalCouncil>

⁹⁴ <http://www.somerset.qld.gov.au/disaster-management>

⁹⁵ <https://www.getready.qld.gov.au>

⁹⁶ <https://www.qfes.qld.gov.au/about-us/frontline-services/rural-fire-service>

⁹⁷ <http://disaster.somerset.qld.gov.au>

⁹⁸ <https://www.seqwater.com.au/dam-release-notification-service>

8.7 Memorandums of Understanding (MOUs)

SRC currently has MOUs to assist with various components of preparedness and to further support the Somerset LDMG disaster management arrangements, as shown in table 23 below.

Entity engaged in MoU	Key Details
GIVIT	The management of donated goods and money during an event using a virtual warehouse.
Salvation Army	The provision of Emergency Catering Services within an Evacuation Centre during the Response and Recovery phases of an Emergency or Natural Disaster.
Department of Education and Training	Allows for the use of schools to serve as evacuation centres if required.
Volunteering Queensland and Conservation Volunteers Australia	Management of spontaneous volunteers during disaster and emergency events.
St John Ambulance	The provision of first aid services to evacuation centres.

Table 23: Agencies with an MoU with SRC for services within this LDMP.

8.8 Agreed Key LDMG Messages

The following are key messages which the LDMG member agencies agree to promote in the lead up to disaster season each year.

- Disaster preparedness is a shared responsibility and as such there is much that the community can do to prepare themselves for a disaster. Be Prepared.
- Know your risks. For example, if you live in a bushfire prone area, ensure you have a Bushfire Survival Plan. Visit the [Rural Fire Service Queensland⁹⁹](#) website and create your plan now.
- Sign up to [Council's Early Warning Network¹⁰⁰](#) (EWN).
- Prepare your home for severe storms - clearing gutters, trimming trees, and anchoring of outdoor items so that they do not become projectiles.
- Tune in to our local radio stations River949 and ABC612.
- "Like" our [Facebook¹⁰¹](#) site for up-to-date messaging.
- Get to know your neighbours.
- Visit [Get Ready Queensland¹⁰²](#) website.

8.9 Community Education

Under Section 30(f) of the Act, there is an onus on the member agencies that make up the Somerset LDMG to ensure the community is aware of the relevant hazards and risks and knows how to prepare for, respond to and recover from them. A resilient and prepared community is paramount to disaster management arrangements for the Somerset Region. Below are a series of tools available online to assist in preparedness and improving situational awareness.

- [QLDAlert¹⁰³](#)
- [SEQWater Dam Release Notification Service¹⁰⁴](#)

⁹⁹ <https://www.qfes.qld.gov.au/about-us/frontline-services/rural-fire-service>

¹⁰⁰ <http://www.somerset.qld.gov.au/ewn>

¹⁰¹ <https://www.facebook.com/SomersetRegionalCouncil>

¹⁰² <https://www.getready.qld.gov.au>

¹⁰³ <https://www.qld.gov.au/alerts>

¹⁰⁴ <https://www.seqwater.com.au/dam-release-notification-service>

- [Flood Cameras¹⁰⁵](#)
- [Flood Studies¹⁰⁶](#)
- Bureau of Meteorology Tools:
 - [MetEYE¹⁰⁷](#) - forecasting tool
 - [Radar¹⁰⁸](#) sites (Marburg and Staplyton)
 - [River Rainfall Data¹⁰⁹](#) (Stanley, Brisbane, Bremer, Ipswich/Brisbane Creeks, Pine/Caboolture)
- [Queensland Fire and Emergency Services – Safety and Education Programs¹¹⁰](#)
- Red Cross Services:
 - [Telecross¹¹¹](#) Telecross is a free Red Cross service which provides a short reassuring daily phone call to people living in the community to ensure they are safe and well. The service operates 365 days a year throughout Australia assisting a wide range of people such as older people living alone, people living with disabilities, special needs groups, as well as people who need temporary assistance in the absence of a carer.

¹⁰⁵ <https://eservices.somerset.qld.gov.au/floodcams/>

¹⁰⁶ <http://www.somerset.qld.gov.au/flood-studies>

¹⁰⁷ <http://www.bom.gov.au/australia/meteve/>

¹⁰⁸ <http://www.bom.gov.au/australia/radar/>

¹⁰⁹ http://www.bom.gov.au/qld/flood/rain_river.shtml

¹¹⁰ <https://www.qfes.qld.gov.au/safety-education>

¹¹¹ <https://www.redcross.org.au/services/telecross/>

8.10 Emergency and Disaster Management Planning

The Somerset LDMG prepares plans in line with the guideline, as shown within figure 7 below.

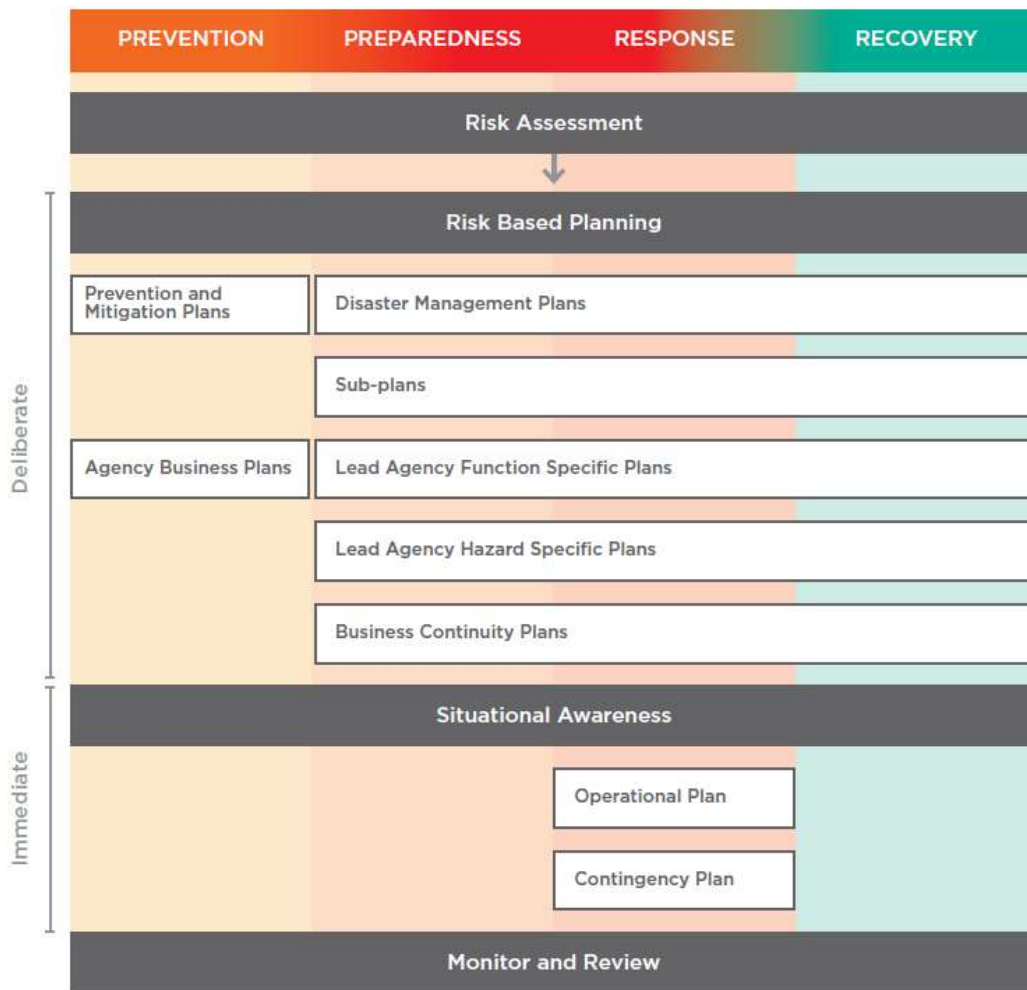


Figure 7: QFES endorsed planning phases for Disaster Management in Queensland¹¹²

¹¹² Queensland Government, Queensland Fire and Emergency Services, PRR Guidelines s.4.1 p.32

Local Disaster Management Plan

SRC is responsible for maintaining this LDMP, in consultation with member agencies. In addition, Council maintains a number of sub plans detailing coordination and support arrangements for the LDMG.

Hazard Specific Plans

The Somerset LDMG expects that primary (hazard/threat-specific) and lead (functional) agencies to prepare and maintain written emergency plans to support the LDMP, and associated sub plans to control hazards and manage the delivery of the disaster management functions for which they are responsible for, along with sharing these across the LDMG to ensure planning synchronisation occurs.

Business Continuity Plans

Each agency should have Business Continuity Plans (BCPs) established to ensure that they can operate critical functions during times of disaster or business interruptions.

SRC has procedures in place to ensure that major systems can be brought back online through the SRC Information Technology Disaster Recovery Plan. This includes major systems such as SRC's Incident Management Software - Guardian IMS.

Engagement

The Somerset Regional Council maintains close relationships with its neighbouring LGAs , State and other agencies to support continued growth and development of disaster management within the Somerset LDMG.



9 Response

The purpose of disaster response is primarily for the preservation of life, property and the environment. The Somerset LDMG response strategy includes, but is not limited to:

- Monitoring of events likely to impact the region
- Activation of the LDMG
- Activation of the LDCC
- Using available resources to provide timely and relevant information to the community
- The coordination of resources to assist in responding to the event.

9.1 Notification Pathways

LDMG members receive warnings from several sources to ensure the group is ready to respond to any threat to the SRC area.

Agency Notifications

Lead agencies, as shown in table 6 should provide notifications to the LDMG when a threat for which they communicate with the public with exists. Notifications can come in the form of emails, phone calls or text messages.

Queensland Emergency Management Report

Council also receive notification through the SDCC by either the Queensland Emergency Management Report (QEMR) which is emailed daily at 10am, or by specific threat warnings which can arrive at any time, generally by email. These reports outline any current or emerging events that may impact Queensland, including additional information on the current status of events throughout the state.

Early Warning Network

Council's partnership with the Early Warning Network (EWN) provides a report each day indicating severe weather threat levels. These reports are used to heighten awareness should they show an increased risk of an event that could impact the SRC communities.

9.2 Activation of this LDMP

The LDMG is informed of the day-to-day emergency (incident) response undertaken by primary agencies, including emergency services. Once activated, the LDMG's role is to:

- Efficiently and effectively coordinate the response to an event.
- Minimise the impact of a disaster event on the community.
- Detail the strategic manner in which elements of the LDMG will deal with day-to-day disaster management business.
- Determine how information will be shared on events that may affect the local government area.

Activation and change of status of the LDMG can be authorised by its Chair, Deputy Chair, LDC or Deputy LDC on receipt of any of the following:

- a warning of an impending threat that would require a coordinated multi-agency response;
- a request from:
 - a lead or primary agency for assistance under this plan
 - a support agency for assistance under this plan
 - the Ipswich DDC

- an affected neighbouring local government (to provide assistance under mutual aid arrangements)
- advice from the state of an impending disaster.

Wherever possible the Chair or Deputy Chair should be consulted regarding the activation or change of status.

9.3 LDMG Activation Levels

Timely activation of the LDMG is critical for an effective response to an event. The LDMG will activate using an escalation model based on the following four levels, outlined in table 24 below.

Level	Description	Triggers	Actions
Alert	<p>There is awareness of a hazard that has the potential to affect the LGA.</p> <p>No further action is required; however, the situation should be monitored by someone capable of assessing the potential risk.</p>	<p>There is awareness of a risk source (threat) that has the potential to affect the SRC LGA to an extent that a coordinated multi-agency response would be required or requested.</p>	<ul style="list-style-type: none"> • Monitor the risk source through communication with the primary agency. • Maintain situational awareness. • Brief the LDC and key staff. • Provide advice of the LDMG response level to the DDC. • Report, by exception only, to the DDC and/or LDMG. • Undertake emergency response activities through LDMG members' core business arrangements.
Lean Forward	<p>This is an operational state prior to 'Stand Up', characterised by a heightened level of situational awareness of a disaster event (either current or pending) and a state of operational readiness.</p> <p>The LDCC is on standby, prepared but not activated.</p>	<p>There is a likelihood that a threat may affect the SRC LGA to an extent that a coordinated multi-agency response would be required or requested.</p> <p>The threat is quantified but may not yet be imminent.</p> <p>There is a need for public awareness.</p>	<ul style="list-style-type: none"> • The LDC places the Chair and Deputy Chair of LDMG on watching brief. • Establish communication protocols with the primary and warning agencies. • Maintain situational awareness and confirm level and potential of the threat. • Provide advice of the LDMG response level to the DDC. • Issue warning orders to key staff and agencies. • Prepare LDCC but do not activate it. • Determine trigger point for move to stand up. • Conduct initial briefing of LDMG. • Provide ad-hoc reporting by exception only to DDC and/or LDMG. • Initiate public information and warnings.

Level	Description	Triggers	Actions
Stand Up	<p>This is the operational state following Lean Forward, at which resources are mobilised, personnel are activated, and operational activities are commenced.</p> <p>LDCC is activated.</p>	<p>The threat is imminent or has occurred.</p> <p>The community will be or has been affected.</p> <p>Requests for support received by the LDMG.</p> <p>There is a need for coordination.</p>	<ul style="list-style-type: none"> LDC briefs Chair and Deputy Chair of LDMG. LDMG meets. LDCC is activated and operational. LDMG assumes control of disaster operations in the LGA. Implement standard operating procedures. Provide regular reporting to DDC and/or DDMG. Recovery needs and operations are scoped.
Stand Down	<p>The transition is made from responding to an event back to normal core business and/or continuance of recovery operations.</p> <p>There is no longer a requirement to respond to the event and the threat is no longer present.</p>	<p>There is no requirement for coordinated response.</p> <p>Community has returned to normal function.</p> <p>Recovery actions are occurring.</p>	<ul style="list-style-type: none"> LDC approves stand down. Conduct final checks of outstanding tasks. Make the transition to business as usual and/or recovery. Debrief staff of the LDCC and LDMG. Make a final situation report to DDC and/or LDMG. Through the Local Recovery Group (LRG), manage medium to long term recovery operations

Table 24: Activation Levels for the Somerset LDMG

9.4 Local Disaster Coordination Centre

The LDCC is established under Somerset LDMP Sub Plan 1.02 – LDCC. As the functional lead agency for disaster coordination, SRC provides a primary LDCC at Council’s Esk Library and Gallery, with alternate locations available at Esk (Civic Centre), Kilcoy and Fernvale.

Should all of these sites be unable to function, the LDC, in consultation with the LDMG, shall identify an appropriate site for a coordination centre, following assessment of the potential or actual impacts of the particular event.

The LDCC will be setup so that the Incident Management Team (IMT) can effectively manage the event to manage the:

- coordination and planning of disaster operations
- dissemination of public information and warnings
- coordination of reporting to the relevant stakeholders.

Agency Reporting

Agencies will be required to submit reports at regular intervals during an event to ensure that the LDCC maintains situational awareness. Members will be reminded of this obligation with deadlines to ensure that they submitted to the LDCC with sufficient time to allow for inclusion in the Situation Report (SITREP).

Situation Reporting

The LDCC will use the agency reports submitted, along with own intelligence to construct a SITREP that will be passed to the DDC. Situation reports will usually be sent at least once per day and normally around 1pm. The frequency and times of these can be changed at the discretion of the LDC.

9.5 Public Information and Warnings

The LDMG is responsible for ensuring the community is aware of ways to prevent, prepare for, respond to, and recover from a disaster¹¹³.

This involves raising awareness of identified threats and the means by which the public should respond at an individual and/or household level. It may also include warnings and directions, as provided by primary agencies relating to the particular hazard.

The Chair of the LDMG (or delegate) is the official source of public and media information for the Group's coordination and support activities.

Primary and functional lead agencies provide media liaison for issues relating to their organisational roles. Individual organisations maintain responsibility for internal reporting on their business in accordance with their established procedures.

Community members may receive warnings and information from a variety of sources – some official, some not. Many of the methods discussed in Section 8.4 are relevant for warning the community in the response phase. In addition to those, the following should be considered.

Emergency Alert System (EA)

EA is a national telephone warning system used by emergency services to distribute messages to landlines and mobile phones during an emergency.

The system uses location-based technology to ensure that messages are only sent to those in an affected area (this area is identified as a polygon).

The Somerset LDMG has issued EAs in previous events and has worked with the SDCC to provide pre-approved polygons for use should they be required. The polygons are generally reserved to events that impacts can be predicted, such as areas impacted by flooding.

Polygons can be created and provided to the SDCC as required using Mapinfo and/or Google Maps KML. It should be noted that with the increase in subscribers to the NBN, and the subsequent reliance of mains power for those services to run, it is possible that delivery of EAs to landlines could be an issue during power outages. For more information refer to [Emergency Alert](#)¹¹⁴.

Standard Emergency Warning System (SEWS)

When disasters loom or a major emergency happens, residents will be alerted by the sound of the Standard Emergency Warning Signal (SEWS) before critical television or radio broadcasts.

The SEWS is a wailing siren sound that has been adopted by all States and Territories to alert the community to the broadcast of an urgent safety message relating to an emergency/disaster. The signal is sounded immediately prior to an emergency warning message being played on public media broadcasts, in the potential or likely impacted areas¹¹⁵.

¹¹³ *Disaster Management Act 2003*, s30.

¹¹⁴ <https://www.emergencyalert.gov.au>

¹¹⁵ Queensland Government, Queensland Standard Emergency Warning Manual 1.171 s. 1.2 p. 6

Public Information and Media Management

During a disaster, it is critical that the public information provided to the media is consistent across all agencies. To ensure the release of appropriate, reliable and consistent information:

- Joint media conferences should be held at designated times involving key stakeholders, including the Chair of the Somerset LDMG, where feasible.
- Key spokespeople should be senior representatives of the LDMG agencies involved in the event.

Consideration of the following should occur:

- The scheduling of media conferences requires a coordinated approach to ensure there is no conflict between state, district or local media stand ups.
- Statistics are a potentially contentious issue requiring careful checking with all agencies before release.
- Each agency should only be commenting on issues relating their roles and responsibilities within this plan.

During an event, the Somerset LDMG will develop a media management strategy that:

- Identifies key messages to share with the community, including reinforcing the LDMG's role in coordinating support to the affected community.
- Identifies preferred spokespeople for factual information (for example, evacuation measures and road closures).

9.6 Resource Coordination

Each organisation in the Somerset LDMG is responsible for ensuring that it has appropriate resources to deliver its agreed roles and responsibilities. Where an organisation's local capacity is exceeded, they are to request assistance from the LDMG.

In a multi-agency response, the Somerset LDMG coordinates and supports the response capability of individual organisations. Where the LDMG is unable to provide the requested support for the organisation, it will follow the established processes to seek assistance from the Ipswich DDMG.

9.7 Disaster Declaration

In accordance with the s 64 of the Act, and subject to several factors, 'a District Disaster Coordinator for a disaster district may, with the approval of the Minister, declare a disaster situation'⁶⁶ for a district or for one or more LGAs within the district in whole or in part.

The declaration confers extra powers on particular groups to perform actions, give directions and control movements within the declared area.

Under s70 of the Act, in declaring a disaster situation, the Ipswich DDC for a disaster district may, with the approval of the Minister, declare a disaster situation for the district, or a part of it, if satisfied:

- a disaster has happened, is happening or is likely to happen in the disaster district; and
- it is necessary, or reasonably likely to be necessary, for the district disaster coordinator or a declared disaster officer to exercise declared disaster powers to prevent or minimise any of the following:
 - loss of life
 - illness or injury to humans
 - property loss or damage
 - damage to the environment.

It should be noted that it is not necessary to declare a disaster situation to activate the disaster management arrangements or to obtain financial assistance through established disaster relief schemes e.g., [Disaster Recovery Funding Arrangements \(DRFA\)](#)¹¹⁶ or [State Disaster Relief Arrangements \(SDRA\)](#)¹¹⁷.

9.8 Impact Intelligence Gathering

Impact assessment is the organised process of collecting and analysing data after an emergency or disaster to estimate:

- extent of loss of/injury to human life
- damage to property and infrastructure
- the needs of the affected community in terms of response, recovery and future (prevention and preparedness) assistance.

Impact assessments provide the Somerset LDMG with a source of comprehensive, standardised information on the effect an event has had on various elements of the community. This information is then used to identify need, set priorities and make decisions about the response to an emergency or disaster, and to take the initial steps leading to recovery. There are two basic types of impact assessment:

- Post-Impact Assessment, which examines the ways in which an event has affected a community.
- Needs Assessment, which examines the type, amount and priorities of assistance needed.

Post Impact Assessment

There are two types of post-impact assessments:

- Damage Assessment (DA), led by QFES.
- Comprehensive Damage Assessment (CDA), led by all relevant agencies across the LDMG.

DAs are undertaken immediately after an event to gather a high-level view of consequences and potential consequences. Sources of information include:

- Calls for assistance recorded at emergency services communications centres and through Council's call centre.
- Information and assessment data provided by LDMG members, representatives, and advisors.
- Media monitoring and reporting.

The DAs provide initial and often unconfirmed information. The information collected is used to provide a broad assessment of the potential overall impact of the event and to set initial priorities. CDAs will commence as soon as possible after an event to accurately establish the impact.

All LDMG members and requested relevant organisations will undertake detailed impact assessments relating to their area of jurisdiction. Depending on need, the Somerset LDMG may coordinate the formation and operation of multi-agency DA teams to systematically collect and analyse impact assessment data.

Needs Assessment

¹¹⁶ <https://www.qra.qld.gov.au/funding/drfa>

¹¹⁷ <https://www.qra.qld.gov.au/funding-programs/state-disaster-relief-arrangements-sdra>

Using data from the initial DAs and CDAs, the Somerset LDMG will conduct a needs assessment to establish the type, quantity and priorities of assistance required by disaster-affected communities.

9.9 Financial Management

The Somerset LDMG member organisations are responsible for their financial management and procurement matters.

SRC will assume responsibility for financial management of the LDCC during the event (outside the costs incurred by agencies in performing their roles and responsibilities).

When an event occurs, each organisation should immediately begin accounting for personnel and equipment costs relating to disaster operations (in accordance with its own policies and procedures) to provide evidence for reimbursement from the various assistance arrangements.

Care and attention to detail must be taken throughout the disaster operations period to maintain logs, formal records, and file copies of all expenditure (including personnel timesheets). This will provide clear and reasonable accountability and justification for future audit and potential reimbursement purposes.

9.10 Disaster financial assistance arrangements

There are two sets of financial arrangements that, if activated, provide financial support to Queensland communities affected by a disaster event.

Disaster Recovery Funding Arrangements (DRFA)

The DRFA is a joint funding initiative of the Australian and State governments to provide disaster relief and recovery payments and infrastructure restoration to help communities recover from the effects of natural disasters and terrorist acts. In Queensland, this program is managed on the whole of government basis by the Queensland Reconstruction Authority (QRA).

Eligible disasters under DRFA include cyclones, floods, Landslips, meteor strikes, storms, bushfires, terrorist act, tornadoes and earthquakes.

Droughts, frosts, heatwaves and epidemic events relating from poor environmental planning, commercial development or personal intervention are not eligible events under DRFA. The Minister for Fire and Emergency Services is responsible for activating the DRFA. The DRFA activation relies on the damage, loss and personal hardship information provided by state and local governments.

To claim for expenditure reimbursement under SDR or DRFA arrangements:

- the relevant arrangements must be activated
- the expenditure must meet the eligibility requirements of that measure
- the claimant must provide documentary support for all eligible expenditure detailed in the claim.

State Disaster Relief Arrangements (SDRA)

The SDRA is an all-hazards relief program that is 100% State funded and covers natural and non-natural disasters. The purpose of the SDRA is to address personal hardship and community response needs for disaster events where the DRFA is unable to be activated. SDRA relief measures for Personal Hardship Assistance Scheme and Counter Disaster

Operations are the same relief measures that are activated under the DRFA, as detailed above.

The SDRA is able to be activated when the DCHDE identifies that local service providers have reached their capacity to provide a service to people identified as experiencing personal hardship as a direct result of a disaster event, or that there are no local service providers to assist in the event of a disaster.

The Director-General of the Department of the Premier and Cabinet (supported by QRA) is responsible for activating the SDRA.

9.11 Logistics management

When the Somerset LDMG requires logistics support and/or resources to meet operational requirements that are beyond local capacity and capability, it sends a request for assistance to the Ipswich District Disaster Coordination Centre (DDCC). At times, administrative boundaries may separate resources from affected communities. In planning, the LDMG considers resources in neighbouring LGAs in addition to those available locally.

9.12 Resupply

The Somerset LDMG is responsible for supporting communities in preparing for temporary isolation. It is also responsible for ensuring procedures are in place for resupply of food and other essentials during times of isolation.

Most events that isolate communities occur on a seasonal basis and their effects on roads and transport networks can be predicted with reasonable accuracy. Communities that are likely to be affected by such events have the responsibility to prepare well in advance for both the event and the expected period of isolation.

To help with this, the LDMG will conduct community education programs that focus on the community and household preparations to be made prior to the expected time of impact.

Planning for resupply operations considers the necessity and urgency of the request. It will need to balance the diversion of limited resources from other activities (such as supporting rescue, evacuation centres or similar) with the needs of the isolated community.

9.13 Emergency Supply

'Emergency Supply' is the acquisition and management of emergency supplies and services in support of disaster operations. Emergency supply can include:

- Resource support in the establishment of forward command posts, community recovery centres and/or disease control centres, such as furniture, equipment and materials.
- Resource support for community evacuation centres, such as furniture, bedding material and health and hygiene products.
- Bottled water and bulk water supplies.
- Temporary structures such as marquees and portable ablution facilities.
- Small plant equipment hire services, such as chainsaws and pressure washers.

Before requesting emergency supply:

- Every effort will be made to exhaust local supplies.
- Attempts will be made to support local economies.
- Organisations will use their own internal acquisition processes.

QFES is the functional lead agency for emergency supply.

9.14 Accessing Support and Allocating Resources

Requests for support may come from lead agencies, supporting agencies or the community. These requests must be registered and acted on in accordance with the standard operating procedures for the Somerset LDCC.

The LDC may request assistance from local agencies, businesses and community groups for additional resources.

The Somerset LDMG will maintain regular communications with the Ipswich DDMG to coordinate the actions and resources required to respond and recover from the impact of disaster events. It will also maintain communication with local governments that share a boundary with the area. These are the Toowoomba Regional Council, Ipswich City Council, Moreton Bay Regional Council, Lockyer Valley Regional Council and South Burnett Regional Council.

Any requests for assistance that cannot be met within local resources will be submitted to the Ipswich DDC. The LDMG Chair or the LDC must endorse these requests.

If the request for assistance cannot be actioned by the DDC, they will request assistance through the SDCC.

Coordination of Primary Lead Agencies

During a disaster, a number of primary and lead agencies are likely to be operating at the same time. For example, a disaster may involve the management of multiple threats and the delivery of multiple disaster management functions, such as evacuation centre management or public health.

Coordination operates horizontally across agencies but does not extend to the control of threats or functions, or to the command of agency resources. The Somerset LDMG's role in coordination is to ensure primary, lead and support agencies have the resources and information needed to carry out their agreed roles.

9.15 Primary (Hazard-Specific) Agency

A primary agency is the organisation in control of the management of a specific threat. 'Control' relates to managing what should be done, when and by whom. Control operates horizontally across agencies that are contributing to the management of the particular hazard.

For example, during a bushfire threat, QFES is the primary agency, it will control all agencies that are contributing to management of the bushfire. This includes giving directions and tasks to supporting agencies, allowing access into various zones and/or determining the need for evacuation.

Primary agency status is usually bestowed by legislation, common law, regulations, state plans or by agreement of the LDMG.

9.16 Lead (Functional) Agencies

A functional lead agency is the organisation in control of the management of a specific function. For example, when an evacuation centre is required, Council is the functional lead agency and will control all agencies that are contributing to the management of the

evacuation centre. This includes giving directions and tasks to supporting agencies and opening and allowing access to centres.

A functional lead agency will be supported by other agencies that have agreed roles in the delivery of the disaster management function. For example, in the management of evacuation/ emergency shelters, Council is assisted by agencies such as Australian Red Cross, QPS and SES.

Functional lead agency status is usually bestowed by legislation, common law, regulations, state plans or by agreement of the LDMG. Roles and Responsibilities of each agency across the QDMA can be found on p. 72 (Appendix C) of the [State Disaster Management Plan¹¹⁸](#) (SDMP).

Related Plans for each of the hazard and functional plans can be found on p. 110 (Appendix E) of the SDMP.

9.17 Support of Primary and Lead Agencies

Members of the LDMG agree to support other organisations through the provision of mutual aid. A support agency assists the primary or lead agency in the delivery of their objectives.

While under the control of a primary or lead agency, support agencies retain responsibility for commanding their resources and ensuring that their own standard operating procedures are correctly implemented.



Chair of the LDMG inspecting damage post the Feb-March 2022 Severe Weather Event (March 2022)

¹¹⁸ <https://www.disaster.qld.gov.au/cdmp/Documents/Queensland-State-Disaster-Management-Plan.pdf>



10 Relief and Recovery



REGIONAL COUNCIL

Somerset
REGIONAL COUNCIL

LOCAL DISASTER MANAGEMENT PLAN (2022) V4.1

10.1 Relief

Relief is stage 1 (as shown in figure 7 below) of the recovery process, as shown at figure 7 below. It is where efforts to meet the immediate needs of persons affected by a disaster, to minimise further loss through the provision of immediate shelter and basic human needs, is provided.

10.2 Evacuation centres

The decision to evacuate, and the various stages which occur, can be found on p.25 of the [Queensland Evacuation: Responsibilities, Arrangements and Management Manual – M.1.190¹¹⁹](#).

Evacuation centres are opened to meet an immediate need for those with no other option, in order to preserve life, wellbeing and safety. They should not be the primary source of shelter or relocation.

Evacuation centres abide by the Australian Red Cross Preferred Emergency Sheltering Practices, which provide for:

- one toilet for every 20 to 50 people
- 1.2m² – 5m² of floor space per evacuee
- one shower for every 30 to 50 people.



Figure 7: Stages of Recovery¹²⁰

The above capacity limits and other operational approaches to evacuation centre management will be suitably adjusted to mitigate the threat of infection posed by a pandemic.

Preferred evacuation solutions for community members to consider, in priority order, are:

¹¹⁹ <https://www.disaster.qld.gov.au/dmg/st/Documents/M1190-Evacuation-Manual.pdf>

¹²⁰ Queensland Government, Queensland Reconstruction Authority, Queensland Recovery Plan (2021) p.12

1. A destination of the person's choosing (for example, with family, friends or neighbours).
2. Established accommodation (for example, a hotel, motel or caravan park).
3. An evacuation centre.

10.3 Donations

Council and Queensland Government have partnered with GIVIT to manage all offers of donated goods and services (including corporate offers of assistance) in response to disasters and emergencies in Queensland.

Affected people discuss their needs with organisations and charities, including but not limited to Australian Red Cross, UnitingCare Lifeline and neighbourhood centres. While providing other essential recovery supports, these organisations verify that the needs are genuine and register the items requested with GIVIT. GIVIT then matches these needs with donated goods and services through its online warehouse. This eliminates the need for organisations to store and sort unexpected donations.

GIVIT will also purchase goods with money donated by the public in response to such events. GIVIT accepts donations of money. 100% of funds received by GIVIT during a disaster are spent on urgently needed items. Wherever possible, the items are purchased from businesses in the disaster-affected area to assist recovery of the local economy. To donate, visit the GIVIT [website](#)¹²¹.

10.4 Volunteering

The desire to volunteer is an indication of the health and resilience of the community. The best way a person can start volunteering is to find out if family, friends and neighbours need assistance first. This should always be done under their direction and with their consent.

It is imperative that volunteers act safely. WorkCover Queensland provides guidance on how to be [safe](#)¹²².

After assisting family, friends and neighbours, all volunteers should register with Volunteering Queensland's (VQ) Emergency Volunteer Service by visiting their [website](#)¹²³ or phoning 1800 994 100. Volunteers will then be contacted by VQ if additional volunteers with their skills are required.

10.5 Isolated communities

Communities that become physically isolated, particularly due to flooded roads, have been identified during the risk management process. These communities do not necessarily require evacuation, but additional support may be needed to help people stay in their homes.

Occupants of areas known to become isolated are strongly encouraged to plan for periods (of at least three days) without access to food, water, medicine, toiletries and essential household items.

10.6 Transition to Recovery

Recovery is the coordinated process of supporting disaster-affected communities' psychosocial (emotional and social) and physical well-being; reconstruction of physical infrastructure; and economic and environmental restoration (including restoring the natural

¹²¹ <https://www.givit.org.au>

¹²² <https://www.worksafe.qld.gov.au/safety-and-prevention/hazards/workplace-hazards/dangers-in-your-workplace/storms-and-floods>

¹²³ <https://emergencyvolunteering.com.au/qld>

environment, associated infrastructure and heritage sites and structures, and the management of pollution and contamination). Recovered is being able to lead a life that individuals and communities value living, even if it is different from the life they were living before the disaster event¹²⁴.

10.7 Approach to Recovery

The Somerset LDMG approach to recovery is aligned with the [National Principles for Disaster Recovery](#)¹²⁵, which has been adopted in Queensland. These principles are:

- understanding the context
- recognising complexity
- using local, community-led approaches
- ensuring coordination of all activities
- employing effective communication
- acknowledging and building capacity
- identifying lessons and building resilience.

Once the [relief](#) stage is complete, the final two phases of recovery are enacted by the Somerset LDMG.

Phase 2: Recovery and Reconstruction

This phase includes medium-term recovery and the execution of planned methodical recovery and reconstruction to enhance the outcomes of disaster-affected individuals, communities, functions and infrastructure. In this phase, coordination of impact assessments, community engagement, communication and collaboration of all recovery partners continues, and recovery progress is monitored by the Local Recovery Coordinator (LRC).

Phase 3: Transition

In the transition phase, recovery and reconstruction is progressively handed over to agencies or organisations – including government, community-based or industry-led sectors that would normally support the functional area. During transition, lessons are identified and implemented to increase the community’s resilience. This phase ends when all recovery and reconstruction responsibilities are back to being managed as business as usual and the community realises its post-disaster “new normal”.

10.8 Functions of Recovery

Effective recovery requires an integrated, multi-disciplinary approach to analysing needs, engaging the community, and planning. Recovery is a complex and potentially protracted process. To help coordinate this, it is grouped into five functions:

- human and social
- economic
- environment
- buildings
- roads and transport.

These often overlap, and recovery arrangements must reflect the interrelationship between them.

¹²⁴ Queensland Government, Queensland Reconstruction Authority, Queensland Recovery Plan (2021) p.6

¹²⁵ <https://knowledge.aidr.org.au/resources/national-principles-for-disaster-recovery/>

10.9 Local Recovery Group

The Somerset LRC has been established as a standing group established under the Somerset LDMG. The appointed LRC is the SRC Chief Executive Officer, Mr Andrew Johnson.

10.10 Local Recovery Sub Groups

The Somerset LDMG may establish a range of sub groups during recovery. They will be typically led by the relevant SRC manager.

Human and Social

- Personal support and information
- Physical and emotional health
- Psychological, spiritual, cultural and social wellbeing
- Public safety and education
- Temporary accommodation
- Financial assistance to meet immediate individual needs
- Uninsured household loss and damage.

Economic

- Renewal and growth of:
 - the micro economy (within the affected area) and the macro economy (overall economic activity of the state)
 - individual and household entities (for example, employment, income and insurance claims), private and government business enterprises, and industry
 - assets, production and flow of goods and services
 - capacity for the export of goods and services from the affected region.
- Securing the confidence of overseas markets.

Environment

- Restoration and regeneration of:
 - biodiversity (species and plants) and ecosystems
 - natural resources
 - environmental infrastructure
 - amenity/aesthetics (for example, scenic lookouts)
 - culturally significant sites and heritage structures.
- Management of environmental health, waste, contamination and pollution, and hazardous materials.

Infrastructure (buildings, roads and transport)

- Repairing and reconstructing:
 - residential and public buildings
 - commercial, industrial and rural buildings/structures
 - government structures
 - utility structures, systems and services (water, sewage, energy and communications)
 - other essential services.
- Dam safety
- Repairing and reconstructing local roads and transport systems.

The service components of each of the five functions are not necessarily delivered by the lead agency. The lead agency works with multiple private and public sector partners who deal directly with the community and individual families and businesses to achieve recovery.

While these five functions provide the framework for the recovery structure, the final structure depends upon the nature and consequences of an event. For example, events such as cyclones may cause large-scale damage to housing and the built environment and therefore may require more emphasis on infrastructure recovery. Other events, such as pandemics, may require more emphasis on the human and social and economic aspects of recovery.

10.11 Planning for Recovery

The Recovery Sub Plan provides information on a framework for the coordination of recovery operations across the Somerset LDMG. The procedures outlined in the Queensland Recovery Plan support this framework, and the sub plan is part of the Local Disaster Management Plan. The strategy it outlines is flexible and designed to address different types and sizes of disaster events, as required.

Recovery can also offer an opportunity to learn and build resilience so that the Somerset region is better prepared for future disaster events. Communities can further develop their capability and resilience through recovery activities that focus on sustainability and growth, community development initiatives, reconstruction efforts, risk reduction strategies, and hardening of infrastructure and the built environment.

The recovery sub plan includes transition arrangements from 'response' through to 'immediate relief arrangements' to 'recovery arrangements', outlining the transfer of all required resources. It also identifies the scope of possible disaster recovery operations and the roles and responsibilities of all stakeholders involved in the process for short, medium and long-term recovery requirements.



The Australian Defence Force deployed across the region during the Feb-Mar 2022 Severe Weather Event

Sub Plans

Table 25 provides a list of the Sub Plans which have been developed to support the Somerset LDMP.

Sub Plan Number	Sub Plan
1.01	Activation of Local Disaster Management Group
1.02	Local Disaster Coordination Centre
1.03	Evacuation and Evacuation Centre Management
1.04	Isolated Communities
1.05	Community Support
1.06	Impact Assessment
1.07	Medical Services
1.08	Transport
1.09	Public Health
1.10	Public Works and Engineering
1.11	Public Information and Warnings
1.11A	Contacting Media Outlets
1.13	Financial Management
1.14	Logistics Plan
1.15	Resupply
1.16	Recovery
2.01	Bushfire (Threat Specific)
2.02	Flood, Dam Break and Severe Storm (Threat Specific)

Table 25: Somerset LDMP Sub Plans