

2 December 2016

Independent Review of the Extreme Weather
Event South Australia
GPO Box 2706
ADELAIDE SA 5001

Dear Sir/Madam,

Independent Review of the Extreme Weather Event SA - Submission

Please find attached a submission in regards to the above mentioned review.

The information in this document has been compiled from the region and does not necessarily represent the specific view of Regional Development Australia Far North.

Yours sincerely



Claire Wiseman
Chief Executive Officer

SUBMISSION FOR INDEPENDENT REVIEW OF EXTREME WEATHER EVENTS SA REGIONAL DEVELOPMENT AUSTRALIA FAR NORTH

The Far North region of South Australia as per the Regional Development Australia boundaries, covers approximately 80% of South Australia with a land mass of around 800,000sq with a population *28,212 and incorporates the Anangu Pitjantjatjara Yankunytjatjara Lands. The region takes in the iconic Flinders Ranges and Outback region, popular and well visited tourism destinations in the State. The Flinders Ranges is also now recognised as a National Landscape.

The main townships in the region include (but are not limited to) Port Augusta, Quorn, Hawker, Leigh Creek, Copley, Lyndhurst, Marree, Innamincka, William Creek, Oodnadatta, Marla, Mintabie, Coober Pedy, Glendambo, Pimba, Woomera and Roxby Downs. Some of these remote townships are between 800 - 1,000 kilometres from Port Augusta.

The Far North region of South Australia experienced the severe weather event which first occurred on the 28 September 2016, when power outages in parts of Port Augusta occurred from 12pm onwards. Like many other parts of the State, the Far North region experienced severe thunderstorms, strong winds and flash flooding.

To gauge the impact across the region, Regional Development Australia Far North undertook a survey of businesses and asked the following questions:

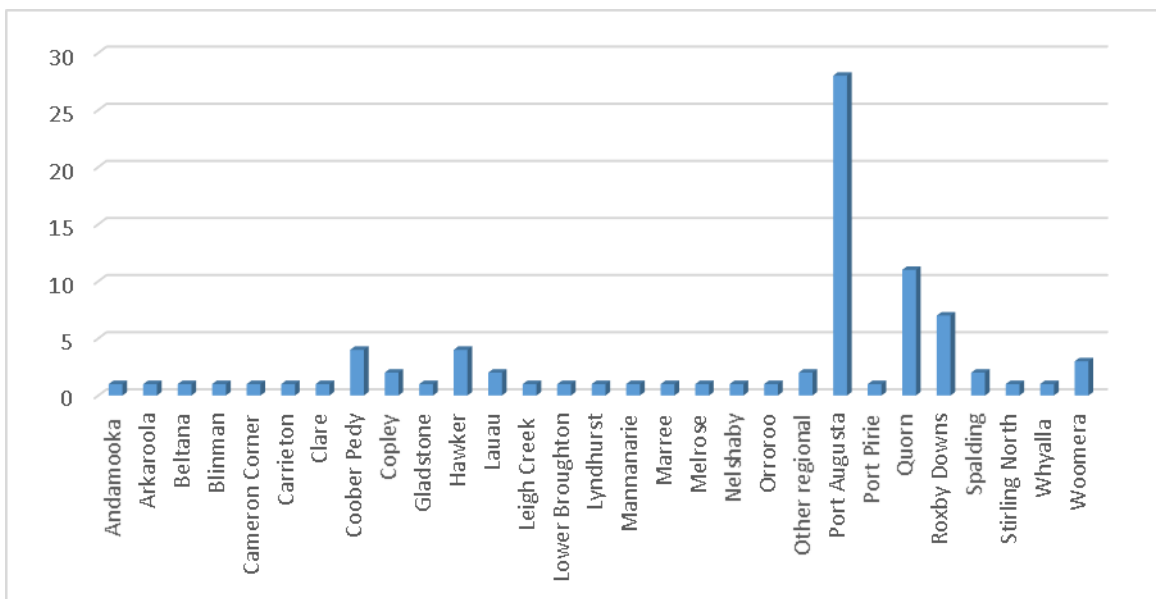
- What township is your business located in?
- What is your main business activity?
- How long was your business unable to operate as a result of the blackout?
- Do you own/maintain a back-up power supply in the form of generators or other to minimize impacts to your business in the event of regular power outages?
- Please provide an estimate of your stock losses due to the power outage (including dumping/disposal expenses)
- Please provide an estimate of other losses due to the power outage (including trading and production, wages paid with no productivity and other losses)
- Please provide an estimate of you total expenses due to the power outage (including expenses relating to transport, generator and other expenses including those outlined above)
- What percentage of your total losses/costs associate with the power outage do you estimate might be/are covered by insurance?
- Was there any form of emergency or Government assistance provided to your business during or following the blackout?
- Please comment on any other impacts to your business related to the power blackout e.g. loss of water supply, Eftpos, other associated costs/losses and future or re-start costs
- The extreme weather event also involved destructive winds and extreme flooding. Did your business sustain any physical damage from these winds or flooding, e.g. roof, falling trees, flooding internally or externally etc (if you are a Local Government body, please include damage to community infrastructure and assets)

- If you answered yes to the above question, please specify what damage was cause (if you are a Local Government body, please include damage to community infrastructure and assets)
- In reference to the above question, what is the estimate value of damage caused directly to your business?
- What percentage of your total losses/costs associated with the infrastructure damage do you estimate might be/are covered by insurance?
- Telecommunications were also affected by the power outage, therefore did you experience any outage to your mobile phone service and if so how long?
- Who is your mobile service provider?
- Did you experience any outage to your landline telephone service?
- Did you have access to or receive any emergency warnings or alerts before, during and after the extreme weather event?
- If you answered yes to the above question, please specify how these messages were accessed/received
- In reference to these emergency warnings, please indicate the below that apply (They were helpful, they were received prior to the event, they were received too late, they contained enough information to allow me to decide and act, they didn't contain enough information to allow me to decide and act, other)

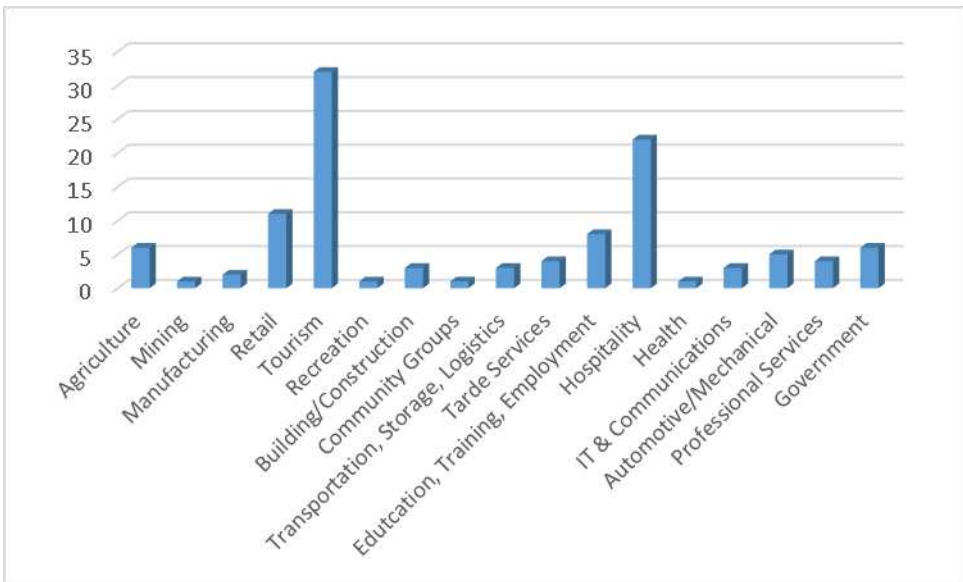
Survey Results – General Overview

We had 87 respondents to the survey with the following general breakdown:

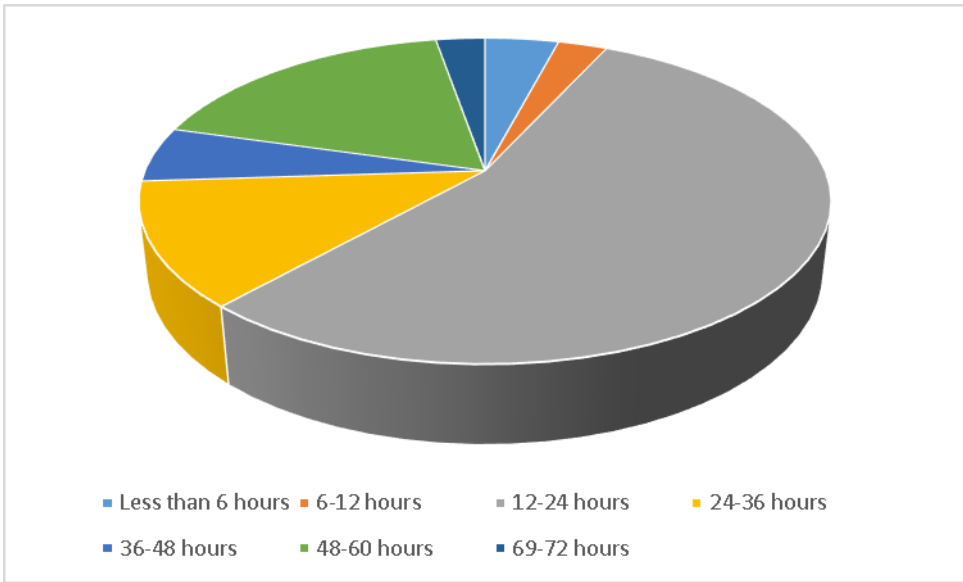
Township location:



Main Business Activity:

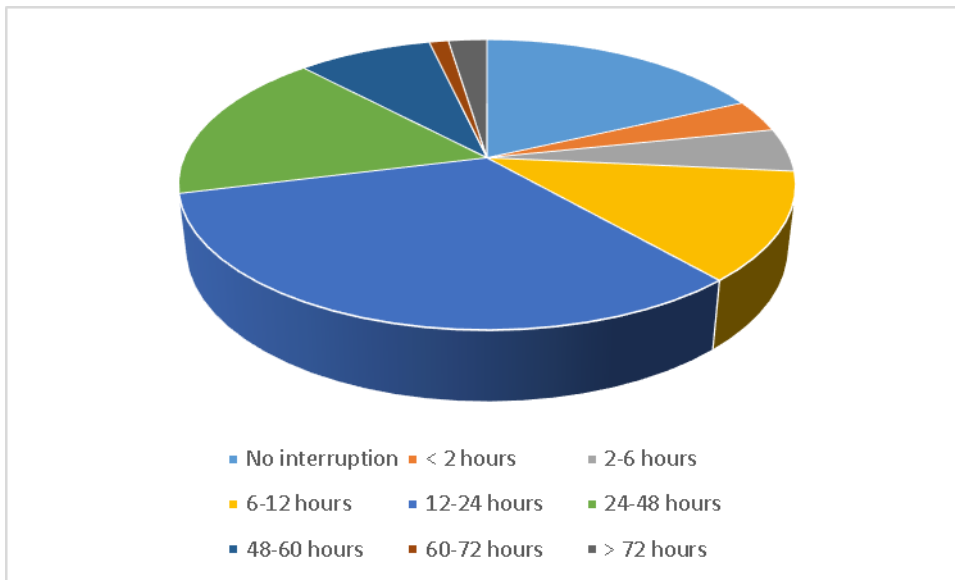


How many hours did you experience a power blackout for?



54.79% of respondents experienced the power blackout for 12-24 hours with 17.82% experiencing it for 48-60 hours and 12.33% experiencing it for 24-36 hours. It is worth noting that 2.74% experienced it for more than 60-72 hours. A few respondents experienced a blackout in excess of 72 hours e.g. 80 hours (1 respondent), 96 hours (2 respondents) and 108 hours (2 respondents).

How long was your business unable to operate as a result of the blackout?



32.53% of respondents were unable to operate their business for 12-24 hours, with 18.07% experiencing no interruption and 16.87% unable to operate their business for 24-48 hours. 2.41% indicated they were unable to operate their business for more than 72 hours. Of those who were more than 72 hours, times indicated were 96 hours and 144 hours.

The information that we have gathered across our vast region assists us in answering the relevant points of review, as follows:

1. The impact of state-wide power outage, including on:
 - 1.5 Telstra and other networks
 - 1.6 community preparedness and response
 - 1.7 business continuity planning
 - 1.8 access to food, water, case, fuel and other essentials
2. The impact of various aspects of weather including:
 - 2.2 damage from destructive winds
 - 2.3 damage to homes, businesses, primary industries, community assets and infrastructure
3. The adequacy, appropriateness, effectiveness and timeliness of response, incident management and emergency management activities including:
 - 3.1. The preparedness of control and supporting agencies, functional services, local councils and communities
 - 3.2. Public information including:
 - Alerts and warnings
 - Traditional, digital and social media and press conferences
 - Community liaison and information

- Continuity of public information through prevention, preparedness, response and recovery phases

Responses to above relevant review points:

1.5 Telstra and other networks

When asked if respondents experienced any outage of their mobile phone service and for how long, 84 indicated that they did experience outages with 28.57% experiencing outages for 12-24 hours, 21.43% experiencing outages for <12 hours, 17.86% experienced no outage and 16.67% experienced outages between 24-36 hours. 9.52% of respondents experienced outage of their mobile service for more than 72 hours.

Of these responses 91.36% use Telstra as their service provider and 3.70% use Optus with 4.94% using other providers. It is important to note that many townships within the outback area do not have access to mobile phone service, however, those that do only have access via Telstra with Optus only starting to be available in some of the township in recent years. Some of the other providers that respondents use are Vodaphone (2 respondents), Aldi Mobile (1 respondent), Virgin (1 respondent) and internet (1 respondent).

44.19% of respondents also experienced outage of their landline telephone services from 12-24 hours with 13.95% experiencing it for 24-36 hours and 17.44% experienced no outage. It is also noted that 8.14% experienced landline telephone service outage for more than 72 hours.

These results show that communications were adversely affected by the storm and with no mobile phone service or landline quite a few businesses, and communities, were left without communication methods. If you add the power outage to the mix, they were all quite vulnerable. For the landline service, it is also worth noting that the outage of this also prevents access to the NBN (where this service is available).

1.6 community preparedness and response

1.7 business continuity planning

1.8 access to food, water, cash, fuel and other essentials

When asked how long was their business unable to operate as a result of the power blackout, of the 87 respondents 32.53% of respondents were unable to operate their business for 12-24 hours, with 18.07% experiencing no interruption and 16.87% unable to operate their business for 24-48 hours.

When asked what these impacts to the business related to the power blackout were, communications including EFTPOS, internet, phone, banking were the biggest impact with 42 respondents stating this. When expanding on these interruptions comments were received around schools not being able to contact parents or students to inform them the school was closed via traditional methods such as email and SMS, loss of guests due to not being able to

contact them to say the business was still open etc and some resulted in total closure (9 respondents).

Other responses included loss of trade and staff (9 respondents) resulting in \$ losses, loss of water supply (4 respondents) in a lot of townships in our region access to water is maintained via pressure pumps and with no power these were inoperable, loss of food (3 respondents), no access to hot water (3 respondents), and loss of laundry facilities and no meals being able to be prepared (1 respondent each).

We asked respondents if they owned/maintained a back up power supply in the form of a generator or other to minimise impacts in events such as this. 74/12% respondents did not have back up of any kind, with 25.88% having back up such as generators.

Of those that did have back up generators we enquired as to the cost of these facilities, with the following responses received:

- \$1,000 per annum
- Cost of plant \$14,000 initially plus \$500/year
- Initial outlay of \$15,000 with ongoing costs of \$200/year for fuel and servicing of equipment
- Initial outlay of \$200,000 with ongoing costs of \$10,000 per year
- Have six small generators but looking at purchasing a large one and spend \$20-\$30k to back all the business up
- \$50/month
- \$250,000 per quarter
- \$20/month

Note that the outlay and ongoing costs are dependant on size of business and how essential the maintenance of services is.

Some respondents also mentioned they they have purchased generators since the event occurred to now be prepared for future events and a couple only have generators that provide essential services such as keeping computers and fridges and/or freezers running e.g the bare essentials.

When considering business continuity it is also important to consider the costs involved in the lossess businesses experienced due to the extreme weather event, which will impact on their future requirements for preparedness.

When asked to provide an estimate of stock losses due to the outage, 58.14% said they had no loss (this could be reflected in the industry that they work in e.g. no perishable stock to lose or also in their preparedness for events and having back up generators already in place), 33.72% said their stock losses were \$1,000-\$2,500 and 1.16% reported above \$25,000 with that loss confirmed at \$82,000.

We also asked respondents to provide an estimate of other losses including trade, production, wages etc. 42.17% reported losses of between \$1,000-\$2,500 and 19.20% reported no loss or between \$2,500-\$5,000. One business reported a loss of \$30,000.

The high rate of respondents (81%) that indicated that their losses weren't covered by insurance can be attributed to the high percentage that indicated they suffered no losses. 4.82% indicated that they are uninsured.

Respondents were also asked to provide an estimate of their total expenses due to the power outage (including expenses relating to transport, generator and other). 46.99% indicated that their expenses were at the low end of \$1,000-\$2,500, 20.48% indicated there were no expenses whilst 9.64% indicated their expenses were between \$2,500-\$5,000. 1.2% indicated their total expenses to be between \$20,000-\$25,000.

2.2 damage from destructive winds

2.3 damage to homes, businesses, primary industries, community assets and infrastructure

In regards to businesses suffering damage from the destructive winds and flooding, 31.4% indicated they did suffer damage with that damage being falling/dangerous tree removal (14 respondents), flooding/leaking roofs/roads cut due to flooding (9 respondents), infrastructure damage including building, structural and fences (9 respondents), telephone wires down (1 respondent) and damage to parks and reserves due to heavy rain (1 respondent).

The estimate value of this damage was indicated by 50% of respondents stating there were no costs, 28.33% indicating costs between \$1,000-\$2,500 and 10% indicating costs between \$2,500-\$5,000. Four respondents estimated damage between \$7,500-\$10,000 and one reported a damage bill of \$18,000.

Once again the percentage of respondents that indicated their losses weren't covered by insurance (82.26%) can be attributed to those that reported no loss values, however, 8.06% indicated they were uninsured. A further 6.36% indicated up to 75% of their costs were covered by insurance with 1.61% indicating they were 100% covered.

3.1 The preparedness of control and supporting agencies, functional services, local councils and communities

3.2 Public information including:

- **Alerts and warnings**
- **Traditional, digital and social media and press conferences**
- **Community liaison and information**
- **Continuity of public information through prevention, preparedness, response and recovery phases**

95.29% of respondents indicated that there was no form of emergency or Government assistance provided to their business during the blackout. This does not cover whether they

actively sought assistance. However, of the 4.71% that indicated they were provided assistance, services they utilised were Emergency Relief Grant (Housing SA), on-loan generator and SES for removal of a fallen dangerous tree.

When asked if respondents had access to or received any emergency warnings or alerts before, during and after the extreme weather event 57.65% responded yes, they did. When asked how these messages were accessed/received respondents indicated that 36.75% were from Radio alerts, 16.33% from Facebook, 10.2% direct local local SES/CFS, 8.16% from Television, 6.12% from SMS and 22.45% indicated other. These 'other' were made up of Internet (9 respondents), family and neighbours (1 respondent) and local police (1 respondent). The internet responses included Bureau of Meteorology website, News Corporation and Email.

When given a series of options as to the helpfulness etc of these messages 42.86% said they were helpful, 25% said they were received prior to the event, 12.5% said they were received too late, 28.57% said they contained enough information to allow me to decide and act, 14.29% said they didn't contain enough information to allow me to decide and act. 12.5% indicated 'other', which was made up of responses such as couldn't predict power outage when this was the biggest disruption, they were irrelevant, initial warning didn't indicate impact to our area or level of danger, not a usual event so couldn't predict, South Australian Power Network information was not correct, doubled up or was not up to date and the information was less than useless.

Summary

Like other parts of South Australia, the Far North region was also impacted heavily by the extreme weather event, of which this data shows.

To summarise:

- Some regional businesses experienced a blackout for up to 108 hours (4.5 days) with others reporting 80–96 hours, at the high end. Most businesses experienced the blackout for 12-24 hours.
- One regional business was unable to operate their business for a total of 144 hours (6 days) with others reporting 72-96 hours. Most businesses were unable to operate for 12-24 hours.
- The overall costs of these businesses not being able to operate is:
 - Stock losses – lower end = \$54,000, higher end = \$194,500
 - Other losses – lower end = \$222,500, higher end = \$367,500
 - Expenses – lower end = \$244,000, higher end = \$415,000
 - Damage from winds and flooding – lower end = \$92,000, higher end = \$155,000
 - **TOTAL \$612,500 - \$1,132,000**
- The outage of the mobile telephone service also had an impact with the majority of businesses experiencing outages for 12-24 hours, however 9.52% experienced outages for more than 72 hours.

- The landline telephone service also suffered outages with the majority of businesses experiencing outages for 12-24 hours, however 8.14% experienced outages for more than 72 hours.
- Most businesses were unable to operate for 12-24 hours with 16.87% being unable to operate for 24-48 hours.
- One of the biggest impacts through the loss of power was to the communications and banking systems such as EFTPOS. Some accommodation businesses reported that some customers were unable to pay at the time, and have still not paid their accounts.
- Some of the accommodation businesses had to close due to not having access to running water including cold and hot, loss of food and laundry facilities.
- The majority of businesses that responded to the survey did not have power back up of any kind e.g. generators. Of those that did have generators, outlay costs for this range from \$1,000-\$200,000 and ongoing costs ranging from \$20/month-\$10,000/years. Of those businesses that weren't prepared for an event such as this, they are now taking action to become prepared.
- Some businesses did utilise emergency or Government assistance in the form of emergency housing or short term loan of generators.
- Access to emergency warnings is crucial in an event such as this with 36.75% of businesses stating access to warning was via radio, with Facebook and direct from SES/CFS next in line.
- Of the emergency warnings and messages received the majority said they were helpful and received prior to the event however, some reported they were received too late and didn't contain enough information to decide and act. A few respondents did highlight that this event is not a regular occurrence therefore keeping up to date with information for it was difficult.