# FINAL REPORT

Fire memories: gathering stories about the fire impacts and responses to build resilience 02/11/2021

Agreement 583218-25164 Ethics GU Ref No: 2020/632











We acknowledge the Traditional Owners of country throughout Australia and pay our respects to their Elders – past, present and emerging.

We extend this respect to the Traditional Owners of the Lamington National Park region, the Yugambeh Aborignal people and in particular the Migunberri, Birinburra and Wangerriburra people who have respected this country for generations.

'Shaping our future' by Rickiesha Deegan

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# 1.EXECUTIVE SUMMARY

The Scenic Rim Local Government Area south-west of Brisbane encompasses 4,300 square kilometres, with the southern boundary of the area doubling as the border between Queensland and New South Wales. Despite being a mainly rural region, it is also a well-known tourism destination, particularly among bushwalkers/hikers. The region is home to a number of renowned national parks including the Lamington, Mount Barney, Main Range and Moogerah Peaks National Parks, which together form part of the Gondwana Rainforests of Eastern Australia World Heritage Site. The Scenic Rim region is large with diverse socio-economic, cultural and environmental values. The three main centres of Beaudesert, Boonah and Tamborine Mountain are the largest in terms of population, but a number of smaller towns provide a depth of character and uniqueness to the region.

Stories of resilience have been collected and transformed into interactive exhibits for key sites in the Scenic Rim impacted by the devastating 2019-2020 bushfires. Collaborating with community stakeholders, including strategic partners Scenic Rim Regional Council, Binna Burra Lodge and Mount Barney Lodge, first-hand accounts of survival and recovery have unearthed important insights for future natural and community disaster preparedness and recovery.

The memories and knowledge are weaved into the exhibition pavilion educating the public about bushfire disasters, their impacts and community stories. Designed in co-creation with the community, this storytelling pavilion increases awareness, fosters discussion and builds collective learning. Importantly, it is a tangible place for community voices to be heard.

Main findings revealed that there is a strong sense of community within the region. This is enhanced by the fire events, as well as an acute awareness of community strengths and weaknesses regarding preparedness, recovery and resilience. For example, local knowledge and community networks and relationships were found to be strong but with a deficiency in education and training. In the same way, risk communication (before and after disaster) was deemed appropriate, but improvements are needed for crisis communication, which lacked streamlining.

In addition, while the community recognised the great work done on a daily basis by the rural fire brigades, they acknowledged that more work is needed for preparedness, including working with new residents.

In general, mental health, governance, leadership, resources and economic investment were identified as the areas needing much more effort to improve resilience capacity.

In conclusion, 18 recommendations stemmed from these findings.

# 2.ACKNOWLEDGEMENTS

The Fire memories: gathering stories about the fire impacts and responses to build resilience results from the successful application for a Queensland Bushfires Category C Flexible Funding Grant of \$ 45,000 (excl GST) by a multidisciplinary team from Griffith University, including Professor Karine Dupre, Dr Margarida Abreu Novais, Dr Guy Castley, A/Prof Sarah Gardiner, A/Prof Jim Smart and Dr Sera Veda.

The authors of this report are deeply grateful for the funding of this project, as well as for the key partners who have supported every stage of this project: Scenic Rim Regional Council, Binna Burra Lodge and Mount Barney Lodge.

This project would have not been possible without the generosity and support from the participants that shared their memories and experiences with us: Ana Barnjak, Ann Swain, Barbara Greer, Barry Davies, Betty Weiler, Brad Cox, Brendan Long, Neville. David Cameron Murphy. Denise Christensen, Ethan Crow, Gordon Holden, Greg Christensen, Ian Gilbert, Innes Larkin, Jankees Van der Have, Jenna, Jessica Brown, Kim Crow, Kuwani Dias-Mendis, Leighton Pitcher, Lisa Groom, Lou Rankin, Marg Haebich, Mark Ayers, Nikki Tervo, Noel Scott, Patricia Wright, Phil Rankin, Richard Groom, Rodney Anderson, Ronda Green, Sam Rankin, Sebastian Smith, Susan Packer, Steve Noakes, Tony Groom and Virginia West.















Finally, we would like to acknowledge the people who contributed to the making of the pavilion, exhibition and video.

Design: Sasha Wales and Prof. Karine Dupre

Exhibit curation: Prof. Karine Dupre, Dr Margarida Abreu Novais, Dr Guy Castley, A/Prof Sarah Gardiner, A/Prof Jim Smart

Pavilion engineering and construction: A/Prof Benoit Gilbert, Dr Ian Underhill, Andrew McDonald, James Webster, Josh Jardine and Jurgen Zier from the Griffith School of Engineering and Built Environment.

William Leggate and Robbie McGavin, from the Forest Products Innovation, Queensland Department of Agriculture and Fisheries, have been crucial both for their expertise and to rally timber industry support such as Wesbeam.

Video editing & video graphic design: Sahel Dupré-Virtamo and Julien Bonneau-Figuereo.

# 3.PROJECT OVERVIEW

The 2019-2020 bushfires were devastating. Not only did they burn forests, farms and buildings, but they also took the lives of 34 people and more than a billion animals (Center for Disaster Philanthropy, 2020). In the Scenic Rim Region (Queensland), it was the first time that the Gondwana world heritage rainforests were burned, including the iconic Binna Burra Lodge, as well as 11 homes and vast areas of farming and agriculture land (Scenic Rim Bushfire Recovery, n.d.).

The project's overall aim was to gain a deeper understanding of how communities can prepare for, respond to and recover from natural disasters, with a focus on enhancing resilience through tangible outcomes. This interdisciplinary project was lead by Griffith University in collaboration with Scenic Rim Regional Council, Binna Burra Lodge, Mount Barney Lodge and the different local communities.

For the common good, public and private interests were easily coordinated: private owners of the lodges were happy to host and manage the public pavilion on their land, while timber providers -such as Austral Plywood & Wesbeam- and scientists at Queensland's Department of Agriculture and Fisheries gave both some materials and expertise for free to build the pavilion.

It also provided communities with an opportunity to share their experiences and assess their recovery needs. An awareness and appreciation of challenges brought about by the 2019-2020 bushfires built greater resilience by identifying best practices and responses. This project aligns closely with four of the National Principles for Disaster Recovery:

#### 1. Understanding the context

The collection of the memories captured by the exhibition provides a voice to those affected by the bushfires to share their experiences. This facilitates an interpretation of the disaster enhancing the understanding and context of these events.

#### 2. Using local, community led-approaches

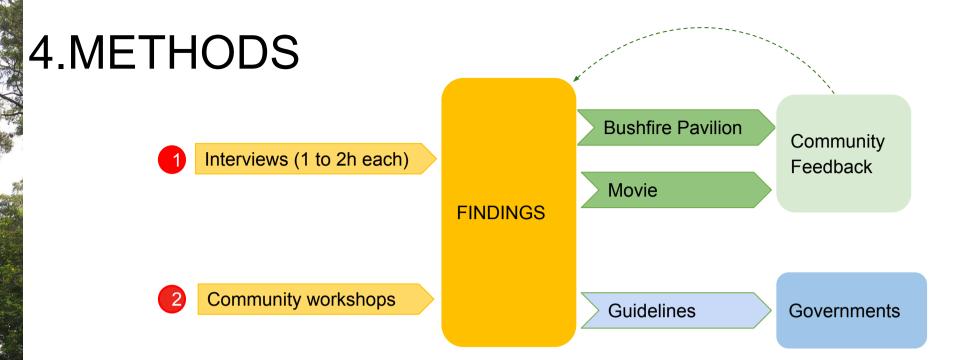
The focus on the lived experiences is clearly community-driven: affected members from the community share their stories and these are then experienced by the wider community.

# 3. Employing effective communication & identifying lessons

The immersive exhibition and the three community workshops are based on storytelling and interactive community participation, both recognised as effective communication approaches.

#### 4. Building resilience

The platform established for social engagement and learning contributes to both the meaningful record of the fire events from intangible perspectives and the improved capacity and capability for responding to future disasters.



The project involved two stages:

Stage 1: The first stage entailed the gathering of stories from those who were impacted by the 2019-2020 bushfires in the Scenic Rim Region, Queensland. Interviews (Ethics GU Ref No: 2020/632) were conducted with a variety of stakeholders including emergency services, local government, visitors, local residents and businesses from different locations within the region. Data were analysed to create the content for an exhibition focused on the stories of community resilience. Community members were regularly consulted and their feedback taken into consideration for the creation of the exhibition, through meetings, morning tea and content directly emailed to them.

**Stage 2:** The second stage of the project involved the design and construction of a movable pavilion that would nest the exhibition. The ultimate goals of the exhibition pavilion are to share and collect memories, to increase awareness and to foster discussion about post-disaster recovery and build collective learning.

Most importantly, the project engaged the community in all stages: data collection (interviews), the exhibition content was co-designed to share their stories and memories, the pavilion was built to create a place for the community and the workshops were delivered to bring the community together and promote discussion.

# 5.OUTCOMES

### in a blink

More than **50** hours of interviews

1 exhibition in 1 pavilion touring the Scenic Rim Region

Media releases ABC radio, Channel 7, Timber & Forestry News, Canungra Times, etc.

1 scientific article (in press) 1 diffusion article (in press)

18 Recommendations

Community pride Empowerment Engagement Resilience Recovery Healing

community
workshops
morning tea
community
presentation

1.5 h

Visit of the Governor General of Australia on 25/05/2021 4000+ Visitors

Interviews to be archived at the State Library of Queensland Long-lasting relationships with the community & partnerships

### 5.1 Interviews & Video

The collection of memories and stories through interviews resulted in more than 50 hours of content. In the interviews, participants were encouraged to share their thoughts and experiences from before and after the fires. Questions were organised in six sections.

The first section concerned demographic details and the participant's relationship to the Scenic Rim region. The second section investigated participant's experience with the 2019/2020 bushfires in terms of preparedness, effects and responses. The third section explored the values in regards to the burnt areas and Binna Burra specifically. The fourth section investigated impact and recovery, while the last one focused on the future. The interview protocol is available in the Appendices (pp.30-31).

Excerpts from the interviews were collated to create a video featuring the interview highlights. The 1.5 hour video allowed the project to extend its reach and was structured following the central themes and questions of the interviews. The video was sent to participants and was distributed in various ways including through Griffith media channels and social media. The video is also featured in the exhibition and can be found on youtube:

https://www.youtube.com/watch?v=tgmAsee8vCo&t=19s









### 5.2 Pavilion & Exhibition

Co-creation with the Scenic Rim community and stakeholders was at the heart of the exhibition and pavilion design.

Data from the interviews were analysed to create the content for the exhibition focused on the stories of community resilience and the design of the pavilion. First drafts were sent to our participants for their approval and feedback. In addition, a community morning tea was organised on November 7th, 2020 at Binna Burra Lodge to discuss these conceptual ideas and initial designs. Feedback was then integrated into the final proposal.

The name of the 'Phoenix Pavilion' was chosen to demonstrate the resilience and recovery post-fire.

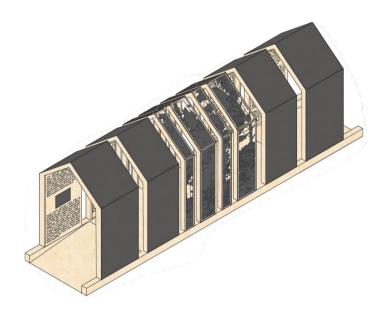




Figure 2: Morning tea with Binna Burra community and Scenic Rim Mayor Greg Christensen to discuss the first designs of the exhibition and pavilion @ Karine Dupre

Figure 3: First ideas for the pavilion design @ Sacha Wales & Karine Dupre

The design of the Phoenix Pavilion is based on a series of modules shaped as a home silhouette, black coated outside and light shade timber inside, as a symbol of the 11 houses that were destroyed during the bushfires in the Scenic Rim. The middle section shows the timber structure, while plywood cut in the shape of trees symbolises the lost forest and its regrowth.

The full pavilion is timber-built, proudly using certified and sustainably sourced timber and structural elements engineered by the team of Forest Products Innovation. Queensland Department of Agriculture and Fisheries, as another strong symbol of the collective Queensland engagement for recovery. The building of the pavilion is a collaboration between engineers, architects and building designers from Griffith University.



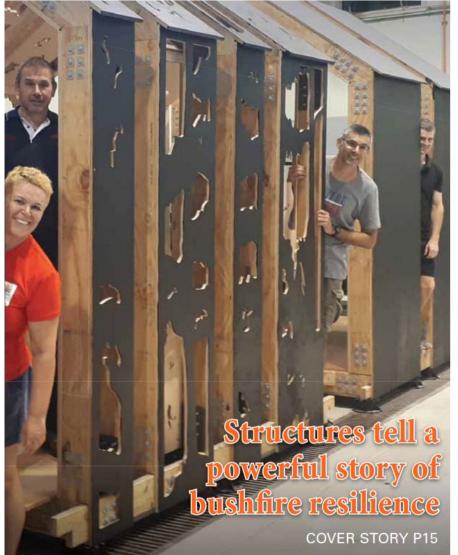
Figure 4: The Pavilion at Binna Burra Lodge @Karine Dupre

The Pavilion attracted genuine support from the providers, who often gave discount prices. The engineered wood products were locally manufactured by Austral Plywood and the Big River Group. Wesbeam kindly supplied all the LVL beams of this pavilion for free.

Additionally, the Pavilion attracted the interest of the industry as it exemplifies the combination of timber innovation and community engagement it also seeks to achieve.

Figure 5: Pavilion on the cover page of the *Timber & Forestry enews* February 25, 2021.











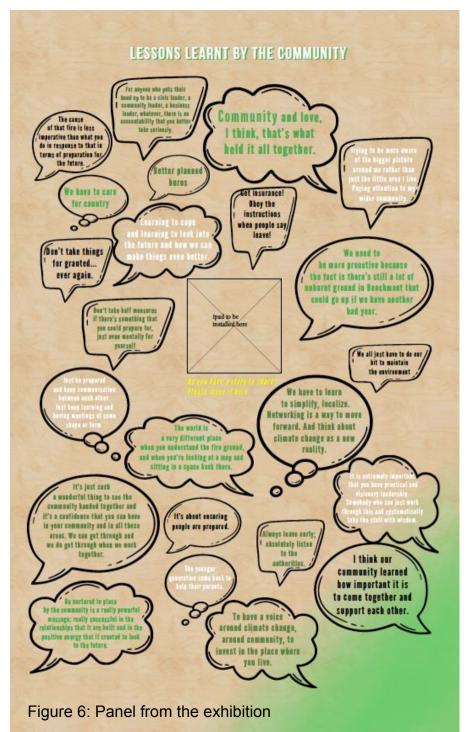


The exhibition is divided into three main sections (all the panels are displayed in the appendices).

The first section includes four panels. The first panel presents the partners and the context of the exhibition, as well as a TV playing the 1.5 hour video of selected extracts of the interviews from the community. Two subsequent panels report on the little things that made a big difference to the community during and after the bushfires. These included genuine empathy and help received from locals but also from interstate and overseas persons. The last panel shows the significant contribution of volunteers, which was highly praised. This included the firefighters who braved the flames, as well as the various organisations, including the Queensland Country Women's Association and the Red Cross, that supported the community throughout the crisis.

The second section also includes four panels and provides general information about disasters, fire resistant species, how to build resilience and get prepared, with facts and small quizzes.

The third section represents the most interactive part of the exhibition as it provides the opportunity for the visitor to give feedback about the exhibition and tell their own story with the displayed iPads. It also concludes the exhibition with summary of what this community learnt from the bushfires and how they are travelling in terms of recovery.



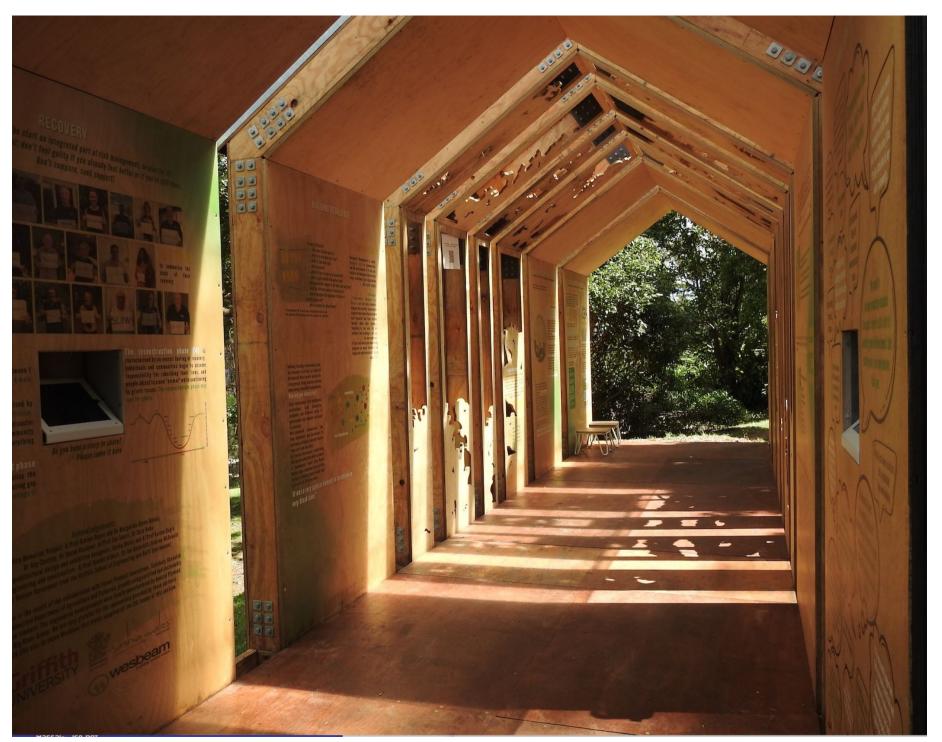


Figure 7: Picture of the exhibition inside the Pavilion @Guy Castley

### 5.3 Workshops

The second stage of the project involved the development and delivery of community workshops. Three workshops were organised to actively engage the community in the discussion of the strategies and actions that can promote resilience:

Workshop 1: Community Resilience / March 20, 2021

Mount Barney Lodge (fig. 8)

Workshop 2: Community Resilience / May 8, 2021

Beechmont (fig. 9)

Workshop 3: Community & Business Resilience

July 30th, 2021- Online

Workshops were designed and delivered to maximise the discussion between participants and structured in two main parts.

The first aimed at discussing characteristics of resilient communities and organisations, as well as identifying the strengths and weaknesses regarding resilience against natural disasters. The second part focused on developing recommendations to address the previously identified weaknesses and enhance the strengths of the communities. Participants suggested specific actions that could be fostered and implemented in order to enhance resilience. These actions were assessed using an Impact/Effort matrix (Figure 11) in order to prioritise actions and strategies.







Figure 8 (top left):
Community workshop
1, Mount Barney
Lodge; Figures 9 and
10: Community
workshop 2,
Beechmont @Dupre
Figure 11: Impact
Effort Matrix
(http://www.wepush.org/en)

HIGH IMPACT	HIGH IMPACT
LOW EFFORT	HIGH EFFORT
LOW IMPACT	LOW IMPACT
LOW EFFORT	HIGH EFFORT

### 5.4 Media coverage

This project attracted media coverage at local, state and national levels, as well as on social media, from its inception to the current touring of the Pavilion. A website was also developed to inform, interact and archive the project. Link:

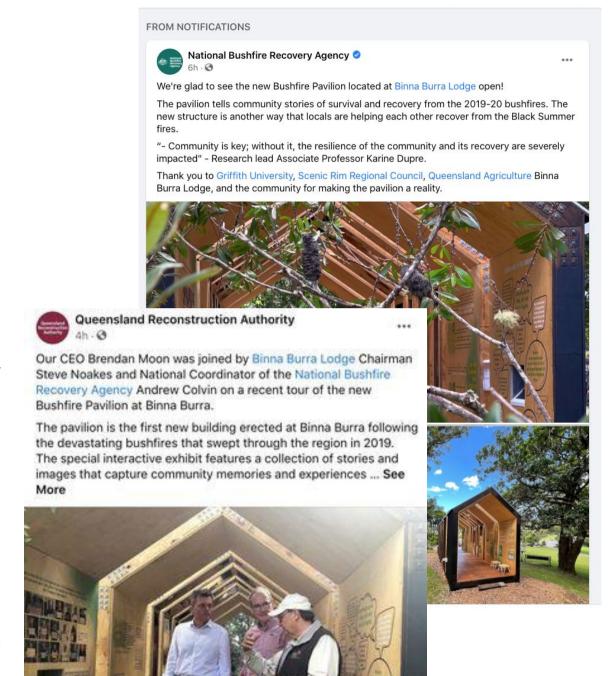
https://www.griffith.edu.au/institute-tourism/our-research/bushfire-stories

The inauguration of the Bushfire Pavilion on March 26, 2021 with Andrew Colvin, Coordinator of the National Bushfire Recovery Agency, and Brendan Moon CEO of Queensland Reconstruction Authority, was aired on several TV and radio channels (including ABC radio, Channel 7, Channel 9, Gold Coast Bulletin).

#### Please find extracts here:

https://www.griffith.edu.au/institute-tourism/our-research/bushfire-stories/bushfire-stories-project-outcomes

Figure 12: Examples of social media coverage (Facebook)





#### Kuweni Dias

Well done and Thank you **Karine Dupre**, so proud of you! The stories and the pavilion bought so much needed healing to our community.

The Governor General of Australia, David Hurley, also visited the Bushfire Pavilion on May 21st, 2021 to hear more about the community bushfire experiences and recovery.

This also attracted media coverage and interest for this project. More recently, the Pavilion was visited by the Honourable Shane Stone Coordinator-General of the National Recovery and Resilience Agency (29/09/2021).



Figure 13: The Governor General and his wife visiting the Pavilion, with Scenic Rim Mayor Greg Christensen and his wife Denise Christensen @Michael Adams

### 5.5 Other outputs

Some of the collected data were used and synthesised in a scientific peer-reviewed journal article, which has been submitted to the highly-recognised international tourism journal, the *Annals of Tourism Research*. The article, titled 'Tourism business post-disaster recovery through the lens of a disorientation and reorientation framework ' was well received and has been re-submitted following minor revisions. It should be published before the end of 2021.

#### **Abstract**

As research on disasters and their management in the tourism context matures, more holistic approaches are required to understand how individuals, businesses and communities recover. Using the lens of a disorientation and reorientation framework, this study explored recovery as a place-based process. It investigated the recovery of a tourism business, Binna Burra Lodge, which lies at the heart of a community deeply affected by the devastating bushfires of 2019-2020 in South-East Queensland, Australia, The perceptions and memories of key stakeholders were investigated through in-depth interviews and the analysis revealed two themes of disorientation and four of reorientation. It is proposed that various reorientation mechanisms can be deliberately activated to foster a smoother recovery process. Furthermore, this study shows that tourism-enabled social capital can assist disaster recovery in communities and that, through embracing traditional heritage, communities can not only deal with the loss but also prepare more effectively for future disasters.

A short article was also submitted upon request to the Beechmont Regeneration Publication Project, providing a summary and responses around the sense of community during and after the fires in 2019 (copy in Appendices). This contribution also demonstrates the complementarity of our project with others stemming directly from the community.

# 6.KEY FINDINGS

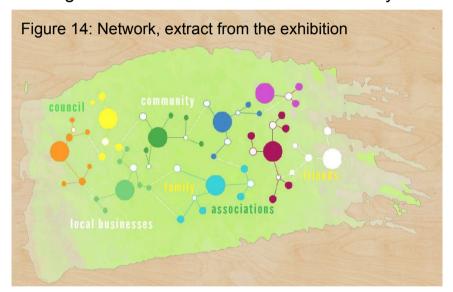
Six main findings emerged from the analysis of the interviews and three main findings from the workshops.

### 6.1 Interviews findings

From a social perspective, the following were noted

- The importance of social capital and network. Participants highlighted how, in times of crises and disasters, everything matters - even the smallest gesture, such as hugs, a glass of water, etc. "People's willingness to get in and help and do whatever they can. That was just brilliant" said one participant, while another mentioned the humbleness of helpers: "he just dumped the carrots [for the horses] and left and he didn't want the prize. He didn't want anything from anybody. He was just a man that cared about animals." Many community members also mentioned the important support they received through social media, as Ronda recalls, "we were getting emails from all over the world. From Costa Rica Germanv. England, Africa, Japan... asking us how were...and, emotionally, that was very nice."
- The importance of better preparation for recovery. Although the majority of participants mentioned how sharing stories is a way of recovery by increasing the sense of belonging in the community, most didn't think/ care enough about their mental health, even after the bushfires.

- The need for more support for social capital.
   Volunteers were unanimously praised as pillars of the community "How amazing the local fire brigades worked together" said one participant, yet, the difficulty of recruiting and retaining volunteers for important preparedness activities was also highlighted.
- The community's capacity to rally under same values. The interviews shows that participants share common values about the place where they live, creating a common sense of loss and recovery.



From an environmental perspective, it was found that

- There is a strong awareness of climate change, yet this was not necessarily followed up with actions that would enhance mitigation.
- Reference to traditional land burning practices were common, thus indicating a need of shift in risk management.

### 6.2 Workshops findings

The characteristics of resilience that emerged from the workshops are the following

- Awareness and preparedness to the various risks that can affect individuals and communities were reported as a crucial element of resilience.
- Interdependence: a resilient community is comprised of interdependent individuals who are committed to their preparedness but who also possess a strong sense of community to be able to work and cope together in time of crisis. The capacity to act without external support in the short-term was highlighted, while accepting external help in the long-term was also acknowledged.
- Social capital was seen as fundamental in the ability of a community to prepare and recover from disasters. Individuals need to come together and reflect as a community, and significant bonding and learning can be fostered from connecting with others experiencing the same events. Many of the participants mentioned the support gained from the wider community, which extends beyond the geographical boundaries of the region. This shows the power of empathy and the impact of the digital revolution.
- Leadership and interdependency with other agencies were also seen as fundamental to build and sustain resilient communities

• Communication, information and education were reported as crucial in resilience. Noticeably, the importance to prepare the younger generations and their own influence were also mentioned, as one participant said: "the government should be starting to incorporate some sort of fire education in primary schools and schools because the kids come home and they will have a pretty big impact on the parents (...)". Learning from the community history and experiences, along with continual education, was also agreed upon as way to enhance resilience.

For businesses specifically, key concerns and considerations related to the ability to prepare, manage and recover from bushfires and other disasters reported by participants included:

- Information as a critical concern (importance of multiple back ups)
- Managing guest/customer relations during disasters as a fundamental part of the response
- Reviewing customer needs in the aftermath of a disaster as crucial during recovery
- Disasters/crises provide an opportunity to shift thinking
- Documenting recovery efforts is important for future preparedness
- Public liability concerns perceptions of international insurers that the entire country is affected by bushfires

Several specific community strengths and weaknesses related to resilience against natural disasters were revealed and are presented below in order of importance as expressed by the participants.

#### **Strengths**

- Willingness of community members to work together and be part of the community
- 2. Sharing common ideals
- 3. Coming together in times of crisis
- 4. Group variety allowing multiple belongings
- 5. Existence of leaders and influencers to provide the big picture and care for the community, supported by a formal organisational structure
- 6. A love for the area residents live in

#### Weaknesses

- 1. Lack of preparedness/ knowledge/ understanding
- 2. Lack of infrastructure and technological networks
- 3. 'It won't happen to us' attitude
- 4. Splitted community due to jurisdiction boundaries and geographical features (isolated areas)
- Lack of services for mental health and vulnerable community members
- 6. The self-interest agenda of some members of the community affects the whole community
- 7. Few actions taken to mitigate climate change

Final results concerned the use of the Impact/Effort Matrix by the participants to prioritise the actions they had identified for implementation when addressing the mitigation of weaknesses (W) and enhancing of strengths (S).

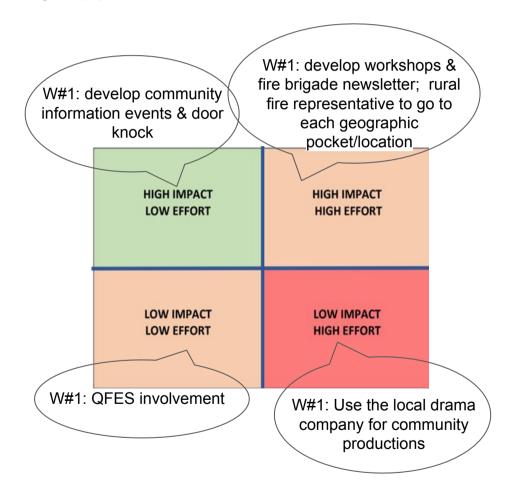


Figure 15: An example use of the Impact/Effort Matrix during the community workshops

### 6.3 Psycho-social analysis findings

A disorientation and reorientation framework (Cox & Perry, 2011) was used to capture the psycho-social processes following the bushfires. According to the framework, disorientation following a disaster occurs because there is direct and indirect loss of man-made and natural markers within a place, as well as psychological losses (e.g. displacement, distress) through the disruption to one's home and identity that are shaped by that place. Contrastingly, the reorientation phase is a process of reconstructing one's identity and getting one's bearings within a previously familiar landscape or community that has been changed by a disaster.

Six themes, two of disorientation and four of reorientation were found (fig. 16).



Figure 16: Themes of disorientation and reorientation emerging from the Black Summer Bushfires in the Scenic Rim Region @Margarida Abreu Novais

### 6.4 Findings summary

The collected data was analysed with the specific **nine core elements of community resilience** developed by **Patel et al. (2017)**, as follows (direct extracts from their paper):

- Local knowledge (community understands its existing vulnerabilities) It includes; 1) information, education and experience acquired in relation to a disaster, such as knowledge about first aid, and other issues translatable to disaster preparedness, mitigation, response, and recovery; 2) training and education; 3) collective efficacy and empowerment Chandra et al. (2011) highlight the importance of strengthening personal and community preparedness, as well as civic responsibility. They propose that effective bystander responses and self-and community-reliance are essential.
- Community network and relationships (members are well connected and form a cohesive whole through strong ties)

#### Effective Communication

Communication to be understood as "the creation of common meanings and understandings and the provision of opportunities for members to articulate needs, views, and attitudes (Norris et al., 2008 p. 140)." It includes risk communication (before and after disaster) and crisis communication.

- Health includes physical and mental health issues, and looks at the pre-existing health of a community and delivery of health services after a disaster
- Governance and leadership include infrastructure and services, as well as public involvement and support
- Resources concern both tangible (e.g. food, water, first aid kit, machinerie, etc) and intangible supplies (social, natural, etc) and should be fairly distributed within the community
- Economic investment regards the cost of a disaster and economic planning
- Preparedness (vulnerabilities addressed prior to a disaster)
- Mental outlook (defined as attitudes, feelings and views when facing the uncertainty that typically occurs after a disaster or when contemplating a future one)

Although our interviews and workshops did not specifically investigate these 9 core elements, all of them emerged from the data gathered, whether as a strength or a weakness. The analysis allows a mapping of the community resilience in this specific region as illustrated in the table on the next page.

Core elements of community resilience	From the interviews, workshops and online survey	
Local knowledge	Well established in terms of information and experience, as well as collective efficacy and empowerment, but education and training were voiced as a concern	
Community network and relationships	Well developed, but undermined by failing technologies	
Effective Communication	Quite strong at the local level, but state and federal levels still felt distant and disconnected	
Health	Unanimously underestimated and under addressed (specifically mental health)	
Governance and leadership	Infrastructure and public transport emerged as weak points, but elements of local leadership were praised	
Resources	A majority of comments regarded the natural environment and the need to change risk prevention and management	
Economic investment	Strong references to failing technologies that would need proper investment, as well as for community groups and volunteers	
Preparedness	Various references to climate change and land care traditional practices emerged as a paradigm shift that needs to occur	
Mental outlook	Quite positive as the sense of community is strong	

Table 1: Mapping the community resilience against Patel et al. (2017)'s nine core elements

In conclusion, what emerged from the community engagement with our research is a strong sense of community, that reinforced the connectedness with both the place and community members, as well as social networks and capacity to heal together. Self efficacy and self awareness about community preparedness and capacity to recover acknowledged that long-term help is needed for this community, as well as better targeted support.

# 7.RECOMMENDATIONS

Based on the findings, **18 recommendations** are proposed, stemming either directly from community members or from our analysis. These have been categorised according to the nine core elements of community resilience as defined by Patel et al. (2017).

#### **LOCAL KNOWLEDGE**

- Increase the communities' awareness of vulnerabilities related to bushfires in various ways, such as
  - develop a fire brigade newsletter, a serie of fire brigade community information events and workshops with fire experts.
  - 'door knocks': rural fire brigade representatives to go to each geographical location within the community to maximise the educational opportunities and strengthen self- and community-reliance.
  - It is also recommended that these educational efforts extend to school programs so that children gain a better understanding of natural disasters.

#### **COMMUNITY NETWORK & RELATIONSHIPS**

- 2. Encourage individuals to get to know their neighbours through local events and gatherings
- 3. Facilitate community communication using both tangible and intangible means such as:
  - mailbox drops
  - physical noticeboards to be located in strategic places
  - enhancement of the use of digital newsletters and social media groups and pages
  - collaboration between key community groups so that communication is unified.
- 4. Promote participation in community initiatives with the creation of an event calendar.
- 5. Creation of community hubs, using existing infrastructure such as local cafés and shops to enhance the connectedness of a community through bonding, bridging and linking.

# 6. Establish better links with the Indigenous community and cultural heritage.

This can be facilitated by the promotion of events that enhance understanding of the Indigenous approach to fire and country. In addition, the use of traditional techniques such as cool burning can be expanded.

A first step here would be for the community to identify members from the Aboriginal Communities who may be able to assist. These could be Aboriginal Community representatives on the World Heritage board and group that work closely with Department of Emergency Services for instance.

#### **EFFECTIVE COMMUNICATION**

# 7. Enhance crisis communication to avoid mixed messages.

This can be done through the use of a single professional body acting as the main communicator, the development of a mobile app for Emergency Disaster warnings and daily briefings at the identified Community Hubs (see recommendation 5). The key messages are then disseminated through the various communication channels. Influential community members can also have official roles to liaise with agencies.

Inaccurate communication can also impact on businesses as there were reports of the whole area being affected and closed for business when it was only particular parts of that area. A coordinated media and public relations approach and leadership from key agencies are needed.

# 8. Promote communication within the wider community.

Given the importance of support from people in other parts of Australia and the world, establishing networks that go beyond the local community are recommended. Initially these networks can continue to share information and news about the recovery following the bushfires using social media platforms (e.g. Facebook, Twitter, Instagram), but mechanisms can also be established to disseminate newsletters to these networks. For those within the wider community that are eager to make tangible contributions to the recovery efforts, there may be opportunities to set up charitable trusts, crowdsourcing websites etc. where people can make donations. The concept of community "talking circles" should be explored to allow people to form connections with others in the community. This can contribute to sharing knowledge to prepare for an event, but also to help with dealing with the tragedy of a fire afterwards.

#### **HEALTH**

# 9. Develop and promote mental health programs for individuals.

Mechanisms to provide such support to communities affected by disasters needs to be emphasised. These services need to be accessible to everyone but importantly community members need to know that these services are available. In the first instance, information about the support services needs to be shared with community members (e.g. https://www.qld.gov.au/community/disasters-emergencies), and a list of contact details should be available at the Community Hub (e.g. Beyond Blue, Lifeline, etc.)

**10.** Supporting vulnerable community members. It is important to ensure that the entire community has the ability to access transportation and communication.

#### **GOVERNANCE & LEADERSHIP**

# 11. Re-evaluate and reframe coordination at local, state and federal levels

Our research shows that there is some discrepancy between what is done and when it is needed. There is no doubt the government is sending support, yet the timing is not always perfect for some individuals. For example, it was reported that some residents who had lost their homes were unable to deal with the administrative work prompted by the officers who came on site guickly after the disaster. In these early post-fire stages, residents were still struggling with shock, stress and devastation, unable to find the meaning to have to prove their identity, process their claim, etc. Once they were ready to attend to the logistical challenges of the recovery (e.g. insurance etc.), officers had gone. This finding is important as it shows that responses to disaster need to be flexible and adapt to the local circumstances. Just ticking the boxes is not enough as it decreases efficiency in the system.

#### 12. Implement interdependent leadership

It was suggested that to develop an interdependence with agencies dealing with crisis at all stages (such as the central emergency services, police, health department, the employment government, etc) would be beneficial and relieve the burdensome on a single leader.

#### 13. Long-term agenda

Successive leaders need to keep preparedness as a long-term element of their agenda, to prevent it from fading away after the bushfires. Communities grow, change and might lose the immediate knowledge and experience of the crisis if they have not lived through the bushfire events.

#### **RESOURCES**

# 14. Enhance understanding of the effects of climate change on fauna and flora.

The effects of the bushfires on Australia's biodiversity were devastating. Raising the awareness within the community, and visitors to the region, can be achieved by sharing these details (e.g. from research and monitoring, fire severity mapping) in the Community Hub. Researchers working in these disciplines can also be invited to share their knowledge at community events. Stakeholders commented on the importance of documenting regeneration of the environment post-disaster. Providing tools and resources to help them do this would enable this data to be captured. This will provide information on the regenerative timeline and capacity of the environment to recover post-event.

#### **ECONOMIC INVESTMENT**

# 15. Improve communication infrastructure with underground power and phone.

Improve the telecommunications network coverage (e.g. mobile towers, broadband coverage) of the region so that communication can be more efficient. Importantly, it was noted that the reliance on a sole provider proved to be problematic. Community members remembered that during the 2019 bushfires, this provider's mobile towers went out and people did not have phone communication anymore.

# 16. Develop and promote training programs for managing guest/customer relations during disasters.

These programs can assist business managers in dealing with customers during times of crisis. Issues such as dealing with difficult customers, getting essential medication if stuck in a location during the disaster, etc. were identified. This training is particularly relevant for accommodation providers given that often guests stay during a situation of crisis/disaster. Establishing a grant to assist visitors to the region evacuate or wait-out the disaster should be considered. Who pays for this period is often undetermined.

#### **PREPAREDNESS**

#### 17. Enhance the community preparedness

A number of initiatives are suggested such as

- Maintenance of fire trails and establishment of control burn plans with clear responsibilities and timelines.
- Use the Indigenous way of caring for the land.
- Infrastructure to track and monitoring the impacts of climate change on the environment would help to identify potential risks and potentially mitigate those risks in preparation for the summer fires.
- Rebuilding of infrastructure destroyed by previous disaster events is critical. For example, one participant mentioned that a bridge was destroyed in a flood and wasn't rebuilt and therefore this property had no alternative escape route when the fire occurred.
- Planning regulations and policies to prevent new constructions in high-risk areas and to secure appropriate level of risk-resistance for older constructions. This type of information could be conveyed through a new program that would involve real estate agents for new buyers and a welcoming committee for new residents.
- Keep the memory alive of the previous bushfires through community events to facilitate knowledge transmission and preparedness.

#### 18. Enhance personal responsibility

Participants all agreed that preparedness at a property level is crucial. This is a personal responsibility which can be enhanced by regulations, education and communication. It includes regular gutter cleaning, clearing trees around the house, planting native fire resistant species, installing sprinklers and having full water tanks on the property, for instance.

Emphasis was also given to inform/educate new residents, who might be totally unaware of the existing risks.

Personal responsibility also includes having ready emergency plan and kit, as well as an identified network on which the person can rely in case of crisis. This should imperatively include mental health preparedness.

#### **MENTAL OUTLOOK**

No recommendation emerged from our study in this category

# 8.CONCLUSION

The Scenic Rim Region was significantly affected by the bushfire events from September to December 2019, which included the destruction of thousands of hectares of pasture and bushland, massive losses of stock and wildlife, as well as the destruction of the heritage-listed Binna Burra Lodge and 11 private homes.

This project, in giving voices to community members, showed that local specificities need to be acknowledged and taken into account to allow more flexibility and efficiency in preparedness, recovery and resilience.

Sharing stories of resilience also proved to be a pathway to recovery, while tangible outcomes such as the Pavilion provides a 'shrine' for remembrance, education and community pride.

Findings and recommendations show that there are issues that are consistent with those observed following other disasters, and while many may not be 'place-based' they still need to be addressed. The issues that are specifically place-based also demonstrate that generic disaster management and resilience planning need to better embed the fine-grain of community experience and knowledge.

Finally, the overall spirit of the Scenic Rim communities and the appetite to understand, know more and recover together show that a resilient community contributes to individual resilience. In the same way, individual resilience contributes to support community resilience when connectedness and empowerment are present. Communities should be better supported through all stages of the disaster recovery process, but more importantly these communities should be empowered to be agents of change to drive the recovery process and in so doing build a more resilient community.

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### 10.APPENDICES

The next pages will present the following appendices

- Interview protocol
- Exhibition panels in the Pavilion
- Photographs of the tour of the Pavilion in the Scenic Rim

#### Interview protocol

Name:	<del></del>
Gender:	
Age:	
Place of living:	
Organisation/ Position:	

Which of the following best describes you: Local resident | Visitor | Local Government | Tourism Operator | Other local businesses

#### Experience with the 2019/2020 fires

**Preparedness** (beforehand and specifically in the month and days before the event)

- 1. What memories/stories do you have of the events leading up to the bushfires?
- 2. How did you feel about natural disasters like storms, floods or bushfires before the 2019/2020 bushfire season?
- 3. Do you think that you and/or your organisation/community were well aware of the risks from bushfires before 2019/2020?
- 4. Do you feel that you and/or your organisation/community were prepared for the bushfires?
- 5. What actions did you and/or your organisation/community take to prepare for the bushfires?
- 6. Do you think anything was missing in the preparation?
- 7. How did your preparation for the 2019/2020 fires compare to previous seasons?

#### The bushfire event

- 8. Can we start by you telling me a little bit about your experience with the 2019 fires that impacted southeast Queensland in 2019/2020?
  - How have you been affected by the bushfires of 2019/2020?
  - How has your organisation (if applicable) been affected by the bushfires of 2019/2020?
  - How has your community (if applicable) been affected by the bushfires of 2019/2020?
  - Was there a particular fire that affected you? (N/A if interviewing people related to a particular fire)

#### Response to the event and Community

- 9. What was your immediate reaction to the bushfires?
- 10. Would you mind talking a little bit about how you were feeling during these events?
- 11. What people and organisations assisted you and/or your organisation and/or community during the event? How?
- 12. In your opinion, what was the most important support you received?
- 13. In your opinion, what support was missing?
- 14. In your opinion, which aspects worked the best during the response to the fires?
- 15. In your opinion, which aspects worked the worst during the response to the fires?
- 16. Overall, do you think people have worked together in responding to this event? How so?
- 17. Do you feel that these sorts of events bring people together? How? Was this the case for the bushfires and your organisation/community?
- 18. Do you feel that there is a strong sense of community when faced with these kinds of disasters?

Was this the case for the bushfires and your organisation/community?

19. Were new groups/links formed in the community as a result of the bushfires?

#### Interview protocol

#### **Values**

- 20. What do you personally miss most about the areas that were burnt?
  - Do you think these [things] have been lost forever, or can they be replaced or substituted for?
  - If there is a possible substitute, will it be quite the same?
  - If not, what do you think might be missing?
- 21. What did you value in the areas that were impacted by the fires in Southeast Queensland in 2019/2020?
  - Cultural Heritage? What exactly? (e.g. historical buildings, records, tourism potential, etc.)
  - Natural Heritage? What exactly? (e.g. rainforests, threatened species, tourism potential etc.)
- 22. About Binna Burra: did you know about its World Heritage value? How do you feel about 72% of BB being burnt?
  - Do you think changes made at Binna Burra during the re-building might make the community think about how to become less vulnerable and better able to adapt to other natural disasters in the future (e.g. storms, floods and other bushfires)?
- 23. Do you feel that the media captured your own feelings in reporting on the bushfires? If not what was missing?

#### **Impact & Recovery**

- 24. Since the event, what has happened? How does that make you feel?
- 25. How are you/ how is your organisation/community now?
- 26. How do you think these events changed you?
- 27. How do you think these events have changed your organisation and/or community?
  - What is the same or different about you and/or your organisation and/or your community?
- 28. Have these events altered your thinking about disaster management?
  - o How?

#### The Future

- 29. After these events, how well prepared do you think you and/or your organisation and/your community will be for the next bushfire season?
- 30. What are your suggestions for improvements in how people work together to prepare, manage and respond to disaster events?
- 31. What education or support is needed to help the community improve their response to future disasters?
- 32. What are your thoughts on how climate change may affect bushfire preparedness in the future?
- 33. What lessons do you think this has for yourself and the local community?
- 34. What lessons do you think this has for other communities, tourism operators and other local businesses in dealing with similar disasters (e.g. cyclones, floods and bushfires) in the future?

**Concluding question:** Is there anything else you would like to say about these events, what happened, what are the future implications?

Thank you for your time to participate in this interview. We really appreciate it and will share the final summary report with you.

### THE PHOENIX PAVILION

Stories of Resilience and Recovery

We acharologic the Traditional Controllers of the Lord on which the positive charts. We pay respect to the Mains, part, present and every ling and extend that respect to other then given and former Thank historic basels.

The 2019-2020 husblires were a never-seen-before event. They offected so many of as across Australia. In Queensland specifically, extensive portions of the Condwana Rainforests World Heritage were burned, including Il homes and the icanic Sinna Surra Ludge.

Some people may have been directly affected, others indirectly, but each person has a story to tell. The 'Phoenix Pavilion' captures some of these fire memories to learn from them, and provides an apportunity for others to share their stories.

This exhibition is part of a Griffith University Fire Memories research project that aims to build community resilience to disasters, by gathering and sharing first-hand experiences of the community responses to and recovery from, the disaster. This contributes to building collective learning.

#### **LISTEN TO THEIR STORIES**



We would like to worshy these all the persons who shared their stories with an Ann. Rardare, Rarry, Letty, Brad. Canseru, Rood. Boslice, thus, Rardar, Greg. Inc. Innot. Indices, Ionne, Ionide, Lower, Loydton, Lin, Mary, Mark. Rood. Fatelitis, Richard. Rande, Ran, Roon, Iony and Verginie.

This project is jointly funded under the Communicath/State Disactor Recovery Funding Arrangements 2020, in pattentility with Scanic line Regissal Council, Binas Borra Lodge and Mount Ramely Lodge. It is undertaken by rescatchers from the Griffith Incillate for Thorrison and the School of Environment and Science at Griffith Disversity, Albergh hadres for the product have produced by the Incident and Disactor for mount; the mount described by the Incident Communication Council Counci





Australian Government







#### THE LITTLE THINGS THAT MADE A BIG DIFFERENCE

In responding to crises and disasters, everything matters - even the smallest gostere.

Discover what the communities of Binna Borra, Reachmont and the wider Scenic Rim valued most when disaster struck and how they were able to get through the crisis.

#### THE POWER OF HUES

Scientists have shown that hugging helps lower

OUT STRESS and might even lower heart rates and blood pressure. No wonder hugs were among those gestures most appreciated during the bushlines!

Leighton, from Binna Burra, recalls how every time staff were in line at the local café, there would be someone who would recognize their justed logs or their same hadge and would just give them a bag.

Firefighters were also grateful for a hug and a cup of tea that volonteers from the Country Wamen's Association would welcome them with at the fire shed. Even police officers were stopping residents while driving home to inquire about their well-being and giving hags, as lisa recalls.

This car se a long my

#### LOVE FROM ALL AROUND THE WORLD

After the news of the bushfires spread, best wishes started pooring in from all over Australia and around the globe as many railing to empathize with those affected. Social media was a powerful instrument to spread that support. As Banda recalls.

'we were getting emails from all over the world. From Costa Rica, Germany, England, Africa, Japan... asking us how we were... and, emotionally, that was very nice.'

#### TODAY IS TUESDA

Reging track of time during natural disasters can be challenging. In a husblire, amidst the threat of the fire, the chaos of the evacuation and the enhanction from flighting the fire, hours can turn into days and days into weeks. Several members of the fire brigade recall but the simple fact of seeing the sign with the day of the

week when coming back to the fire shed, helped them to keep their feet on the ground.

#### SANING THE ANIMALS

Many studies have demonstrated the importance of animals in our lives, as they provide companious hip and emotional support but also services and food. During a disaster responsibility for animals lies with the owner, however, not everyone is prepared. This is when the community can step

Greg even recall how there was a team of geogle who came forward and took charge of coordinating the removal of animals from the fire risk,

including a tiger!

Others came to feed the 180 horses there were evacuated. Cameron remembers a man turning up at the Canungra showgrounds with a full truck:

'he just dumped the carrets and left and he didn't want the prize. He didn't want anything from anybody. He was just a man that cared about animals.' Panels of the exhibition nested in the Pavilion

#### THE GREAT VOLUNTEERS OF OUR COMMUNITY

There is immense gratitude and respect for all the volunteers that stepped up across Australia

In Queensland, 828 interstate and international professional and volunteer firefighters came to give a hand. Nany groups, such as the farmi fire brigate, the farmitis Queensland Environ Wanna's Association, the Rayld Boilef Form, the Salvation Army and the Scout Girls, just to name a few, have left a legacy in the Scout Girl. The totality of the Australian and New Zealand camaraderic really impressed many.

#### LINES AND LINES Of Meleow Trocks

The Rural Fire Brigade was instrumental in the response to the bushfires. As Stere said

they did a fautastic job, still do... And they're all relunteers; they leave their jobs and go

Various local firefighters, including lan, praised the incredible support from the others brigades "Airly as Harry past our stallow, faste was tree flow and flow of wallow track?"

Mark remembers how it was a difficult time to be first officer, but wouderful to have such a great group of members. One year later, he is still very keen to valuateer and help out. In fact, since the fires more than 10 new members joined the fire brigade.

Some firelighters like Som had the staming to report their anger and irrestration or nacial media while still on the fire front

#### Mr Morrison

Do you think! wanted to watch an accommissible fire front race toward a bountained?

Do you think I wanted to hight a fire standing next to the charmed remains a my best main's childhood board.

Do you think I wanted to opend every space moment I want't lighting firms scrounging up shills just to be shir to pay my rent, to make up for the time I had less protecting my community?

And do you little I want to spend days and days away from my partner lighting these firm in Queensland and New South

Mr Morrison... do you thin

U



#### HE FAIRY COOMOTHER

The contribution of the Boschmuntain homosland Country Wanni's Aspeciation was normous. These women were immediately able to harness the support of their members, the wider community and beyond to make sure the hitchen at the Beechmont fire shed

.All emergency workers had access to beautiful home-made hot meals at any time.

The "fairy flodnothers", as aicknamed by many, have not only been praised and deeply acknowledged for their coordination and tireless efforts during the bushfires, hat they also provided immediate support after the event.

Creating a new sub-committee, they reached out to the victims of the bushfires, praviding support, distributing funds donated, helping with the filling in offorms, sourcing immediate needs, listening, and,

being there.



#### THE LITTLE THINGS THAT MADE A BIG DIFFERENCE

In responding to crises and disasters, everything matters - even the smallest gesture.

Discover what the communities of the Scenic Rim valued most when disaster struck and how they were able to set through the crisis.

#### DINANTERS BRING THE BEST OUT OF PEOPLE FLORES

David was blown away by

'People's willingness to get in and help and do whatever they can. That was just brillant.'

The overall feeling is that everyone was there for each other. At the fire shed in Beechmont, local residents such as Ethan took on the tasks of directing traffic of the dozens of fire trucks constantly arriving and leaving, answering the incessant phone calls,

and most importantly, organising the chaos to make sure the volunteers got the much needed

Across the region, strangers welcomed evacuated neighbours or simply spent the time to chat to them. As Denise recalls, the local chaplain was brilliant, making binself out and around.

at the refuge center in Canongra is also foodly remembered by Jessica - how a woman went to great lengths to beig her find clothes and a downy to soothe her son, gave her a bot meal and checked on her the next day. More than one will agree, as Barbara concludes that

'everybody tries to do their best.'

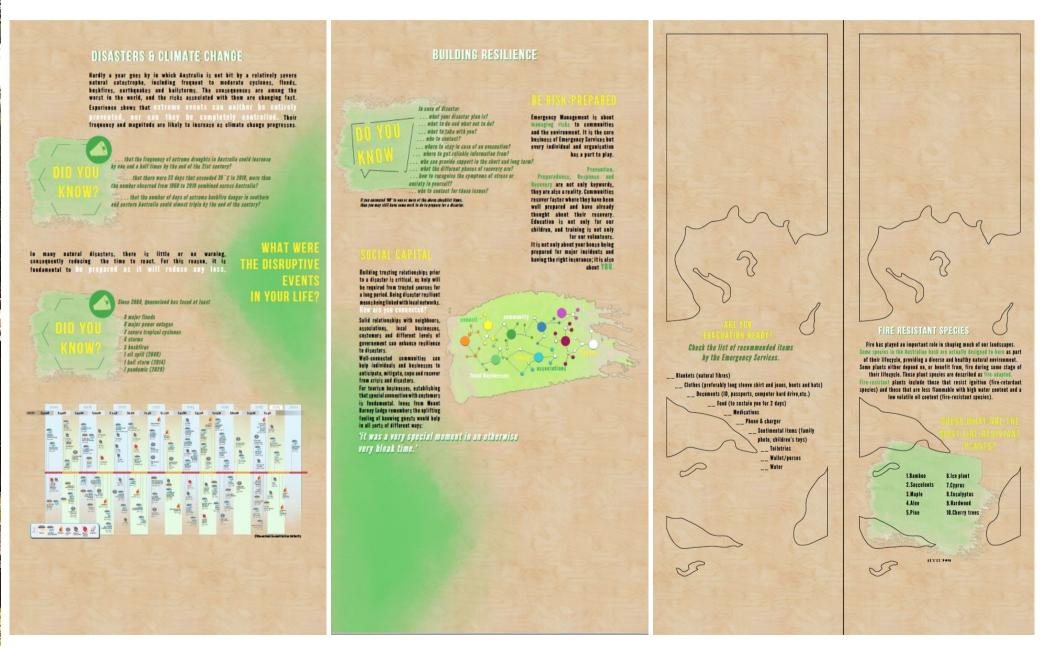


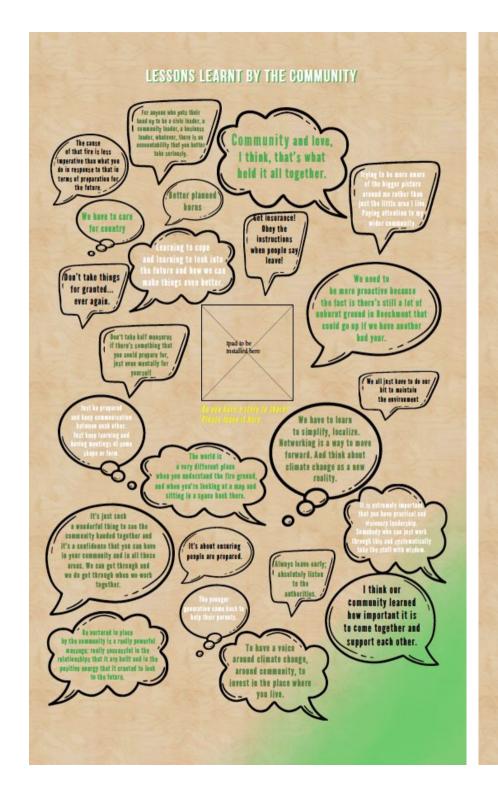
The bushfires ignited a stronger community bond. People made more concerted efforts to know each other in their neighborhood, listen to everyone's experience and have a in the community.

Several initiatives emerged. For example, Jankees from the Frima's of Name arm organised a gathering for the volunteers to share their stories to unpact the trauma. Facebook was used as a platform to organise regular gatherings of neighbours; the Arectmonth of their packets are the several properties in the area, the Little Facebook Armoniative is now beging the community to process a creative recovery through

All these show how resilient the community is to respond and recover from such a disaster. As Marg said.

'I think that's a good legacy for our kids just to see how we all cope and to keep that going.'





#### RECOVERY

Recovery is from the start an integrated partof risk management, so plan for it!
Every journey is personal; don't feel guilty if you already feel better or if you're still down.
Don't compare, seek support!



#### HE PHANTER OF MEDUVE

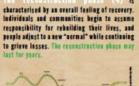
Recovery is a lengthy journey, usually between to 5 years, and scientists have identified 4 main phases post-disaster.

is characterised by a high level of activity and a sense of altraism. Ouring the Assistance is readily available. Community bending occurs. Optimism exists that everything will return to aurmal quickly.

However, during the listillusion ment that (c) communities and individuals realise the limits of disactor assistance. The increasing gap between need and assistance leads to feelings of abandament.



Do you have a story to share? Please leave it here



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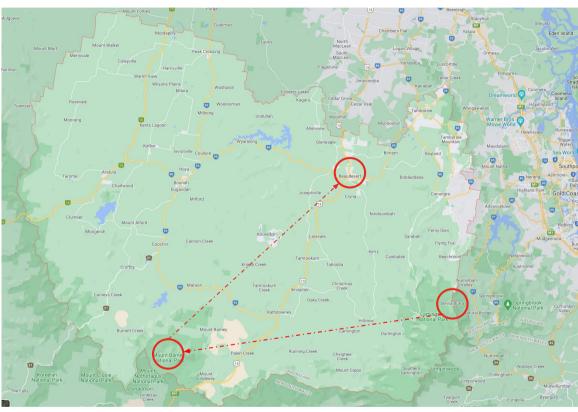






Map of the Scenic Rim showing the locations of the Pavilion tour with pictures at each site © Karine Dupre

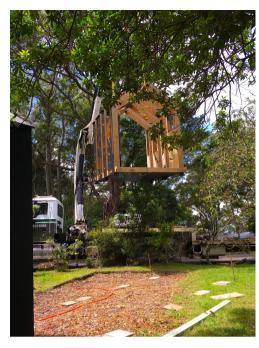
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Mount Barney Lodge

Binna Burra





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