



Curtin University

AUSTRALIAN RED CROSS PERTH HILLS EMERGENCY PREPAREDNESS PROGRAMS

IMPACT EVALUATION

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The suggested reference is:

Newnham, E.A. & Dzidic, P.L. (2022). *Australian Red Cross Perth Hills Preparedness Emergency Programs: Impact Evaluation*. Perth, Australia: Curtin University.

Whilst all reasonable care was taken in the preparation of this publication, no liability is assumed for any errors or omissions.

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Acknowledgments

We wish to acknowledge that this work was conducted on the boodja (land) of the Wadjuk Nyoongar people, the traditional custodians of the land on which Curtin University resides. Wadjuk Nyoongar boodja encompasses the area known as the Perth Hills. We acknowledge the ongoing connection of the Nyoongar people to culture, language, country and waterways, and pay our deep respect to Elders past and present, and leaders in the community. We are grateful for the learnings of land management and disaster mitigation taught to us by Wadjuk, Ballardong, and Yawuru Elders.

We wish to thank Dr Leanne Kelly, Claire Silveira, Erin Pelly, Andrew Maytom, Lauren Holmes, Johnathon Bubb, Lauren Lombardi and Karen Edmeades from the Australian Red Cross for their thoughtful guidance and support in designing and conducting this evaluation. Thank you to Dr Hoa Vu for her assistance with data collection.

We are most thankful to the community members who participated in this evaluation. We are deeply grateful for your insights, expertise, and openness in sharing your experience. Thank you.

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Executive Summary

The 2021 Wooroloo Bushfire caused extensive damage, with significant and enduring impacts for the Perth Hills community. The Australian Red Cross have delivered whole-of-community emergency preparedness programs and resources in the Perth Hills since 2015 to support community-led readiness in an area at high risk of multiple and compounding hazards.

This evaluation aimed to **investigate the community's perceptions of the Red Cross preparedness programs, their value in increasing household and individual disaster preparedness, and the extent to which preparedness skills were applied during the Wooroloo Bushfires**. Further, this report provides evidence-informed recommendations that seek to guide future Red Cross preparedness programming in the Perth Hills community.

Methods

A mixed methods study was conducted to determine community disaster preparedness and engagement with the Red Cross programs. The study was conducted between October 2021 and March 2022, spanning the first anniversary of the Wooroloo Bushfire, and comprised an online survey with 51 participants (62.8% female, mean age = 44.5 years), and in-depth interviews with 15 participants (80% female, mean age = 52.6 years). Ethics approval was granted by the Curtin University Human Research Ethics Committee (#HRE2021-0645).

Online Survey Findings

Survey respondents reported **high levels of emergency preparedness** with a large range of bushfire preparedness activities reported. The most frequently cited Red Cross resources and activities accessed were: preparing an emergency plan (21.4%), accessing information on the Red Cross website (14.6%), picking up handouts or booklets (14.6%) and attending a preparedness workshop or webinar (8.99%). A sizeable minority (41.1%) had not accessed any Red Cross preparedness resources.

Most participants (63.9%) had used their emergency plan during a bushfire, and reported that plans:

- **were effective in reducing harm to themselves and their family during the emergency,**
- increased confidence in responding to the emergency,
- increased knowledge about what steps to take, and
- prompted earlier evacuation.

The most frequently cited ongoing concern following the bushfires was mental health difficulties, although reported levels of psychological distress were consistent with Australian norms. High levels of community connectedness were reported, but some groups in the community were perceived to be less engaged.

Interview Findings

Almost all participants described repeated bushfire exposures. Perception of ongoing risk was high, and all participants reported **comprehensive knowledge of hazards, extensive household preparedness and strong connections within the community**.

Red Cross programs were highly regarded by community members. Among these, the Pillowcase Program for primary school students was described as an important and valuable resource for increasing knowledge and preparedness skills among children, improving psychosocial readiness, and supporting social connections.

Participants frequently reported that students had applied the skills and lessons learnt from the Pillowcase Program during the Wooroloo (and more recent) bushfires, and had remained calm during evacuation. The Pillowcase Program was also viewed as an important catalyst for household preparedness and community conversations regarding readiness.

Three key elements of the Red Cross community programs were identified by participants as beneficial and critical to preparedness:

1. Establishing an emergency plan
2. Creating survival kits and important document lists
3. Developing psychosocial skills for responding

Many participants had established emergency plans with contingencies for evacuation or defence (often elements of both), although few had developed written plans. Accessing Red Cross preparedness programs and resources had prompted participants to discuss their emergency plan with family members and neighbours; create survival kits and lists of important documents that ensured key actions were undertaken during disasters; and build psychosocial skills that supported more calm and effective action during recent bushfires.

The Red Cross was highly regarded by Perth Hills community members and key stakeholders. Many highlighted tremendous value in the preparedness programs run through schools, community events, and in collaboration with local fire fighter brigades, local government and the Department of Fire and Emergency Services. The focus on collaboration was noted as an important strategy for increasing access and inclusion, but at times contributed to confusion regarding specific roles for each stakeholder.

Focused attention to an all-hazards approach, psychosocial skills building, whole-of-community strategies, overlapping preparedness and recovery activities and building community connectedness were identified as unique advantages of the Red Cross programs.

In combination, the findings indicate the need for ongoing community-led emergency preparedness processes with continued support provided by the Red Cross. Greater coordination of preparedness programming and resources are needed to ensure clarity of messaging and improve inclusion and accessibility. The Red Cross plays an important role in advocacy and long-term disaster recovery, which insect with the growing need for disaster preparedness in high-risk communities.

Key Recommendations



1. **Australian Red Cross community preparedness training be continued** in the Perth Hills, with opportunities established for community-led delivery.



2. **Broaden access and inclusion**, by developing links with community groups and tailoring strategies to reach more isolated individuals within the community.



3. **Expand the Pillowcase Program** through a teacher training program, building a local volunteer base, or by embedding the program within the primary education curriculum.



4. Support greater **co-ordination of services and agencies** to reduce conflicting information and support a unified community-based approach.



5. **Advocate** for local and state government investments in community psychosocial preparedness, by funding household preparedness skills training and community events. **Advocacy for greater climate action** will be critical to support communities at high risk of repeated and compounding disasters.



6. **Support mental health initiatives** to ensure long-term recovery supports are delivered, and trauma-informed, evidence-based services are available to the community.

Introduction

The Wooroloo Bushfire occurred in February 2021, and caused extensive damage and destruction. More than 10,000 hectares were burnt, 86 houses were destroyed, and a further 100 houses were damaged (DFES, 2021). Animal lives, power infrastructure, water supply, communications and roads were lost; and more than 50,000 people were affected within the emergency warning area (City of Swan, 2021). The community impacts were significant and ongoing.

Located 45 minutes inland from Perth City and characterised by natural bushland, the Perth Hills is a high-risk area for bushfires, floods, and storm damage. Australian Red Cross Emergency Services have operated preparedness programs in targeted districts of the Perth Hills since 2015. A suite of programs, including the Red Cross Pillowcase Program for children, GetRedy! youth preparedness sessions, RediPlan presentations and community events have been implemented across the Perth Hills districts, often in collaboration with the Department of Fire and Emergency Services (DFES), local governments, schools, volunteer fire brigades, and community groups. The preparedness programs seek to empower communities to strengthen existing capacities and decision making, build knowledge and skills in household preparedness, and minimise the psychosocial impacts of disasters.

The whole-of-community disaster preparedness programs provided by the Australian Red Cross are unique. Globally, there are few high-risk areas that receive comprehensive household preparedness training and support (Ronan et al., 2015), although recent climate disasters have refocused policy attention on community preparedness (Watts et al., 2021). Preparedness training activities have demonstrated significant effects in increasing hazard awareness, preparedness knowledge, and social transference of learning (Levac et al., 2012). However, evaluations to date have focused on short-term outcomes, often assessed prior to disaster exposure (Newnham et al., 2017; Ronan et al., 2015). Evidence of the impacts of community preparedness training on response and recovery assessed following disasters is absent.

This evaluation sought to examine community perceptions of the Australian Red Cross preparedness activities, their impacts on bushfire response, confidence and competence to act, psychosocial outcomes and community connectedness.

Specific Aims:

1. Assess the relevance, appropriateness and effectiveness of Red Cross's preparedness programs for Perth Hills communities affected by the recent bushfires.
2. Assess progress towards outcomes as outlined in the Australian Red Cross Theory of Change.
3. Capture learning and provide recommendations to improve and inform future preparedness programs.

Research Design

An exploratory mixed methods design was employed to assess the perceived impact of the Australian Red Cross preparedness programs. Qualitative interviews were conducted with members of the Perth Hills community between November 2021 and March 2022, spanning the summer months, and the first anniversary of the Wooroloo bushfires.

A cross-sectional online survey was designed to complement the interview data and assessed household emergency preparedness, perceptions of the Red Cross programs, and community connectedness, within a wider proportion of the Perth Hills community. The survey was available online from October 2021 to March 2022, with most responses received during February and March 2022.

Ethics approval was granted by the Curtin University Human Research Ethics Committee (#HRE2021-0645). Written informed consent was obtained for all participants online via Qualtrics.

Part 1. Quantitative Study

Participants

Participants comprised Perth Hills community members affected by recent disasters. People were eligible to participate if they lived or worked in the Perth Hills, had been within the bushfire advice areas during recent fires, and were 16 years or older. Survey participants were recruited via printed posters distributed within the community and social media, specifically the Australian Red Cross Facebook page, several community-specific Facebook pages and Twitter. Community members were able to share the post within their own social media. Recruitment materials included a link to the survey and QR code.

Procedure

The online survey comprised scales assessing demographic information, sense of preparedness, preparedness actions, access and satisfaction with the Red Cross preparedness resources, disaster exposure, psychological distress, and community connectedness. Open ended questions were included to provide opportunities for participant voice on satisfaction with preparedness programs, and potential areas for improvement. Items were drawn from detailed coding of the Red Cross preparedness program elements, past Red Cross monitoring and evaluation questionnaires, and feedback from Red Cross staff. The Kessler Psychological Distress Scale (K10; Kessler et al 2002) was included to assess individual psychological distress. A 10-item Likert scale, the K10 measures symptoms of depression and anxiety with high internal consistency. The 5-item Community Connectedness subscale from the Regional Wellbeing Survey was administered to assess sense of community connection and belonging on a 5-point Likert scale.

Participants accessed the survey online via the Qualtrics platform. The webpage opened to the Study Information Sheet and Consent Form and participants were able to access the survey following provision of consent via a checkbox. Survey data were non-identifiable, and participants were able to exit the survey at any time. Data were analysed within Qualtrics and Microsoft Excel, and presented as descriptive figures, tables, and summaries.

Quantitative Results

Sample Characteristics

The online survey was accessed by 83 people, who all consented to participate. Three screening questions were included at the start of the survey ensure that participants:

1. Had lived, worked or spent significant time in the City of Swan, Shire of Mundaring, Shire of Chittering, or City of Kalamunda in the past two years;
2. Lived or worked within the bushfire advice areas during the 2021 and 2022 bushfires;
3. Were 16 years or older

As a result, 32 participants were screened out of the sample. The final analytic sample comprised 51 participants. Ages ranged from 17 to 72 with a mean age of 44.5 years, and genders included 32 (62.8%) females, 18 (35.3%) males, zero non-binary participants, and one (1.96%) participant who preferred not to say. One participant identified as Aboriginal, and all other participants were non-Indigenous. Most (96.1%) spoke English as their primary language, one spoke Mandarin, and one Cantonese. Mean age, cultural backgrounds and primary languages were consistent with the 2016 Census data for the areas, with a higher proportion of females in the sample (Census data indicated 49.2%-51.8% female gender across relevant local government areas; ABS, 2016).

Emergency Preparedness

Most participants reported feeling prepared for an emergency: with 26 (51%) stating that they felt 'mostly' or 'very' prepared (see Figure 1).

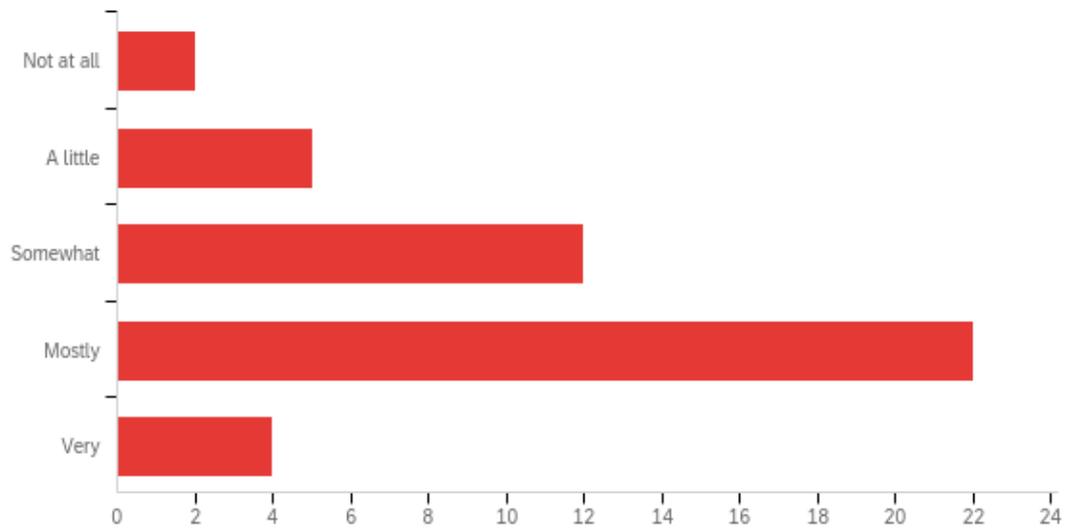


Figure 1. Current sense of preparedness (n=51).

Accordingly, most participants reported that they were maintaining their level of preparedness (49.0%), or currently undertaking preparedness activities (28.6%) (see Figure 2).

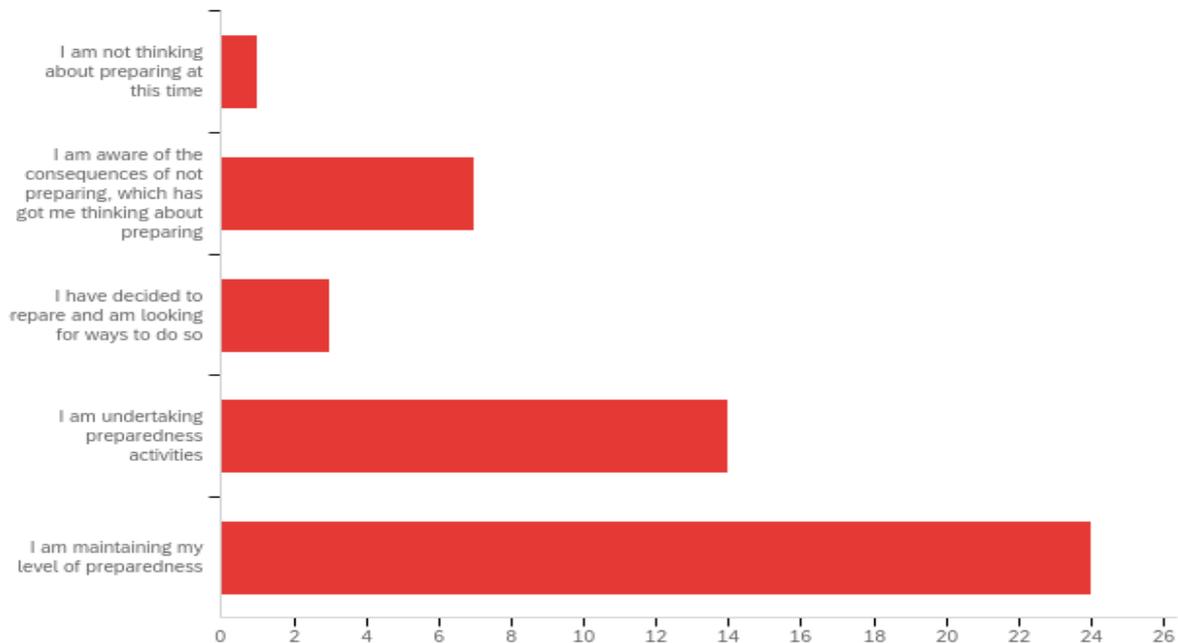


Figure 2. Stage of emergency preparedness action or contemplation.

Red Cross Preparedness Resources

Red Cross preparedness activities and resources had been accessed by most participants (see Figure 3). The most frequently cited activities were preparing an emergency plan (21.4%), accessing information on the Red Cross website (14.6%), picking up handouts or booklets (14.6%) and attending a preparedness workshop or webinar (8.99%). Twenty-one respondents reported not having accessed Red Cross preparedness resources.

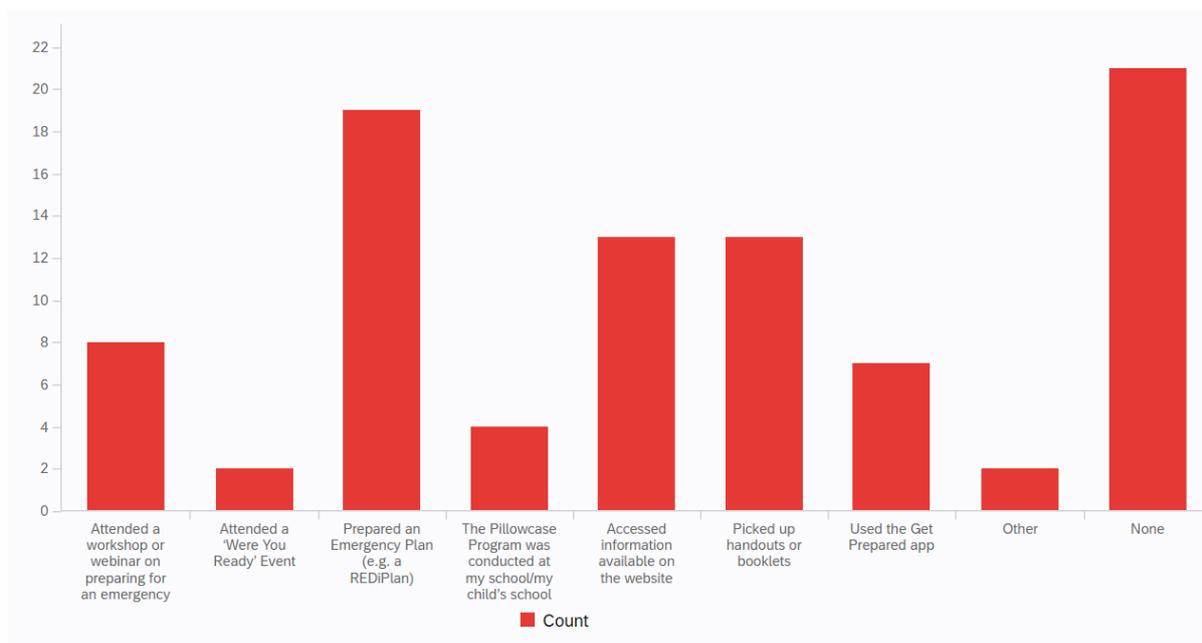


Figure 3. Red Cross resources and training activities accessed by participants.

Participants had engaged in a wide range of preparedness activities (see Table 1). Most frequently, participants reported having planned the best ways to exit the area, talked with family members about preparing, learnt about the hazards that affect their area, and arranged adequate insurance.

Table 1. Preparedness actions undertaken by participants, most to least frequently endorsed (n=51).

Preparedness Action	Count	Percentage
Planned the best ways to exit the area	41	80.4%
Talked with family members about preparing for an emergency	37	72.5%
Learnt about the hazards that may affect your area	36	70.6%
Ensured you have adequate insurance	35	68.6%
Prepared the house or property (e.g. installed sprinkler system, set up generator)	32	62.7%
Identified and taken measures to protect or back up precious items	31	60.8%
Talked with neighbours/friends about preparing for an emergency	30	58.8%
Swapped phone numbers with neighbours	29	56.9%
Put together an Emergency Kit	28	54.9%
Made an Emergency Plan (such as a REDiPlan)	26	51.0%
Thought about what impact an emergency would have on your livelihood	25	49.0%
Made a plan for pets/stock	25	49.0%
Decided on an alternative place to stay in an emergency	25	49.0%
Created contingency plans, in case the original plan is not suitable at the time	22	43.1%
Ensured access to essential medications for you or others	20	39.2%
Received fire advice from the council or DFES	19	37.3%
Created an emergency contact list	17	33.3%
Learnt about how you respond to stress and developed strategies to manage stress	13	25.5%
Run though an emergency drill	11	21.6%
Developed strategies to manage anxiety during an emergency	11	21.6%
Joined community groups to support emergency preparedness in your area	10	19.6%
Established where to meet if communication is lost with family or friends	9	17.6%
Made a financial plan	5	9.80%
Other	2	3.92%
None	0	0.00%
Total	539*	

* Note: Participants were able to select more than one item.

Many participants reported updating their emergency plan within the past six months (28.6%), or past year (26.5%). The majority of respondents (63.3%) reported having put their emergency plan into action during a bushfire. Among participants that had used their emergency plan in a disaster, it was most useful in: reducing harm to themselves and their family during the emergency (mean=3.78, SD=1.07), increasing confidence in responding to the emergency (mean=3.70, SD=0.90), increasing knowledge about what steps to take (mean=3.56, SD=1.13), and prompting earlier evacuation (mean=3.48, SD=1.23). (See Figure 4).

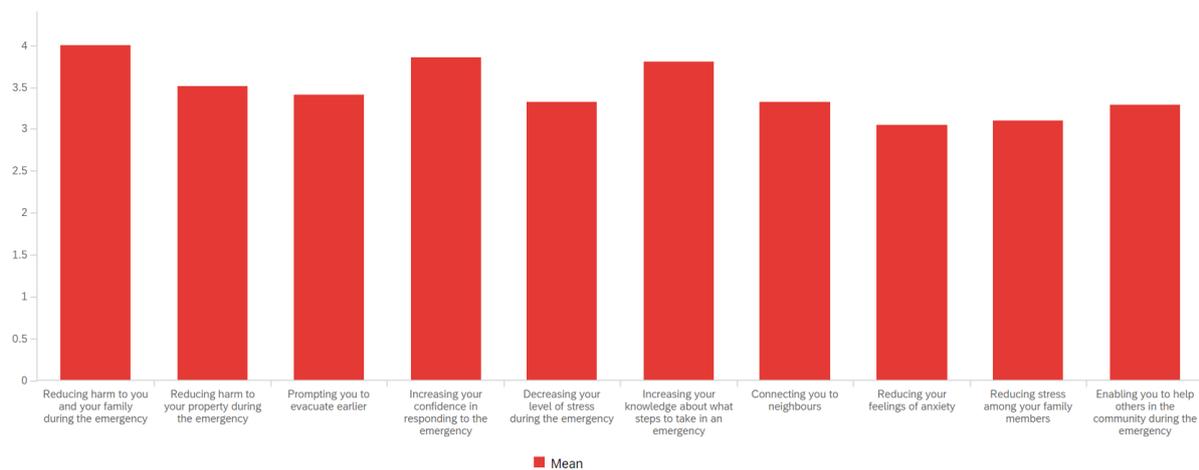


Figure 4. Ways in which using an Emergency Plan was useful during a bushfire (n=41).

In an open-ended question, participants were asked how the Red Cross preparedness resources and training had helped them. Many noted having access to updated information, having specific tools and strategies, and prompting motivation to get organised as key benefits. Ten participants provided responses to say that they had not accessed resources or been assisted by the Red Cross.

Verbatim responses included:

- 'I attended a prep seminar after the Stoneville fires some years ago. It was very worthwhile. It also encouraged me to participate in the Shire's online emergency prep exercises'
- 'Explained the bushfire watch and act; knowing when to leave; discuss with the family regarding leaving rather than fight for the house'
- 'Helping create an emergency plan to prepare for future emergencies'
- 'Made me better prepared and equipped with knowing what to do and what resources to use and have on hand. After the [prior] bushfire when our house burned down the Red Cross were amazing in being available and the help they gave.'
- 'Great information but I need to take action'
- 'While they have not helped me personally, they have allowed me a resource to recommend to people when discussions around fire preparedness take place'
- 'Regular information was provided during the Wooroloo fires so we felt well informed. Our emergency plan was already in place so we knew what to do if told to evacuate or had to stay and fight. The Red Cross were amazing for our friends that lost their homes during the fires, they received a lot of support for both themselves and their pets/livestock.'
- 'I know that preparedness would help reduce mental health impacts, but learned it after I was already impacted, and have struggled to put it into practice'.
- 'They have continued to pop up resources and touch base with local people in regards to stress, anxiety, depression, etc and have been there to talk to locals who need it.'

Similarly, participants were asked what aspects of the Red Cross preparedness resources and training could be improved. Responses included public information nights to bring the community together before bushfire season, and more promotion of the materials. Two participants noted that they were not aware of Red Cross preparedness programs, and five reported no improvements necessary or that they 'liked all aspects of the resources'.

Disaster Exposures and Impacts

Participants reported feeling most affected by the COVID-19 pandemic (mean=3.76, SD=1.66), bushfire (mean=3.69, SD=1.62), or smoke from bushfires (mean=3.62, SD=1.66). Smaller numbers reported having been affected by storms or other extreme weather events (see Figure 5). During the 2021 and 2022 bushfires, 23.3% of participants had evacuated. Many were active volunteers during the fires (n=14, 27.5%), largely in volunteer fire-fighter roles.

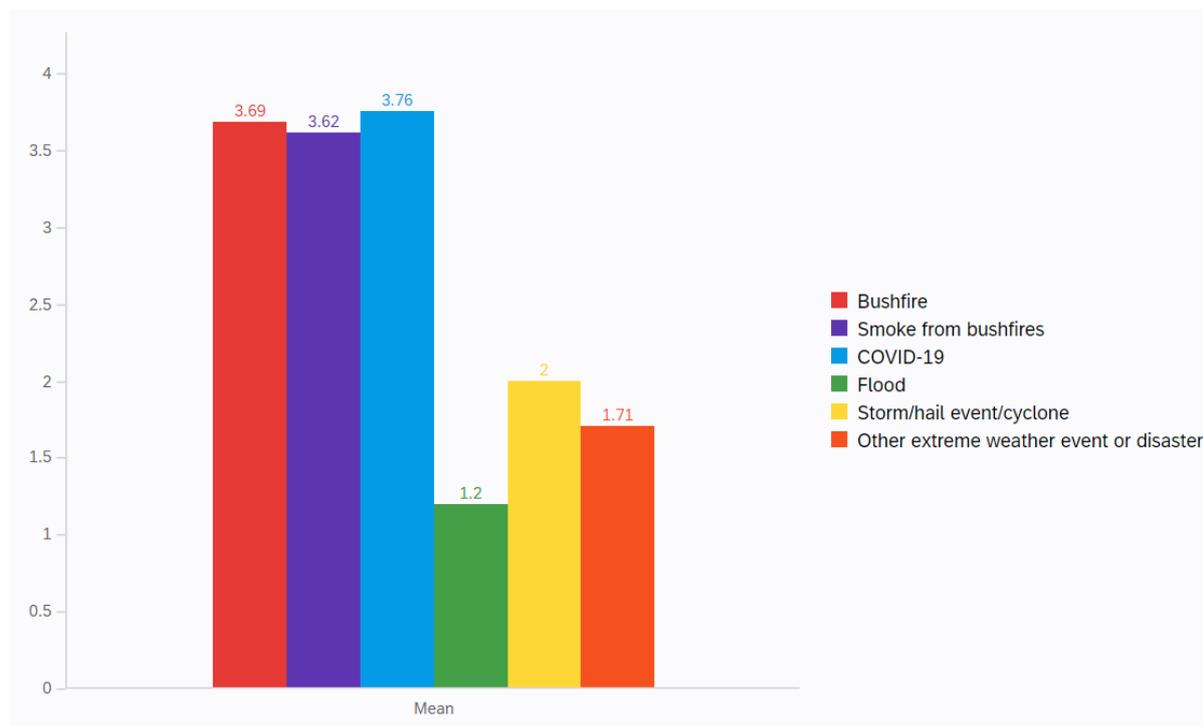


Figure 5. Extent to which participants felt that they were affected by recent emergencies (n=45)

Ongoing issues that continued to affect participants and their families after the bushfires were most frequently reported as mental health difficulties (21.1%). Rebuilding their home, loss of income, disagreements in the community about rebuilding, and feeling disconnected from the community were each reported by 2 participants. Most (63.1%) reported no current issues.

Mental Health and Community Connectedness

The mean psychological distress score for the sample was 16.79 (SD=6.14), consistent with Australian norms for samples with comparable age ranges and gender composition (Andrews & Slade, 2001; ABS, 2018), but lower than a recent online study of Australian norms (Klein, Tyler-Parker & Bastian, 2020), which indicated that people typically report higher levels of distress via online surveys.

As expected, scores were skewed, so that most reported low (n=20, 46.5%) or moderate (n=16, 37.2%) levels of psychological distress, with smaller numbers reporting high (n=5, 11.6%) and very high (n=2; 4.7%) distress (see Figure 6).

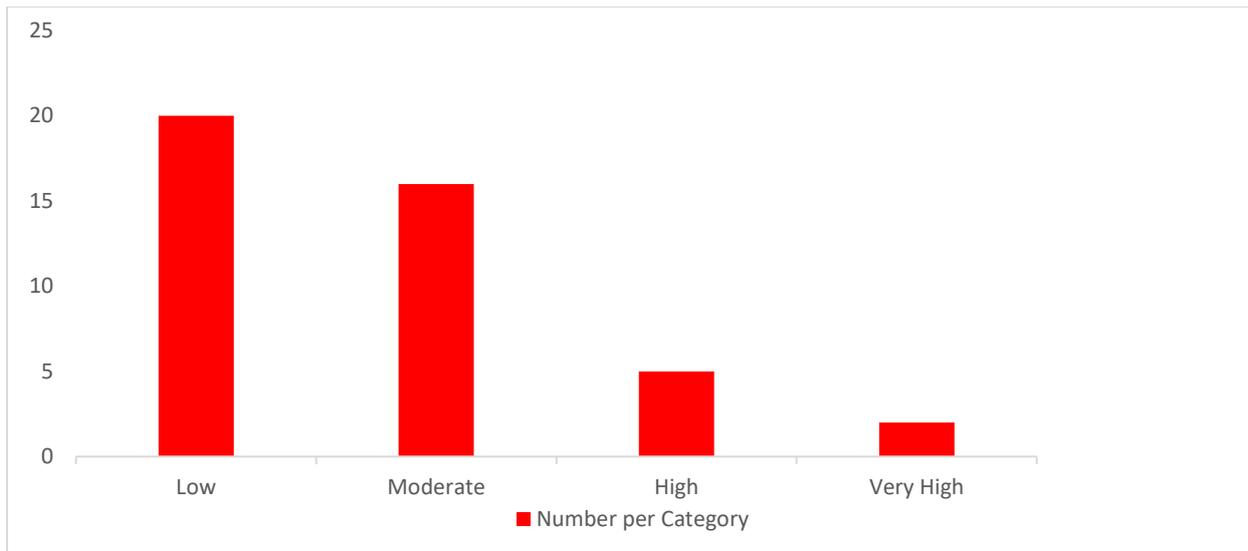


Figure 6. Psychological distress reported by normed category (n=43)

Participants largely reported feeling welcome and a part of their community (see Figure 7). Very few reported feeling like an outsider personally, but participants reported an awareness that some groups in the community kept to themselves, indicating a sense of disconnect or marginalisation for some.

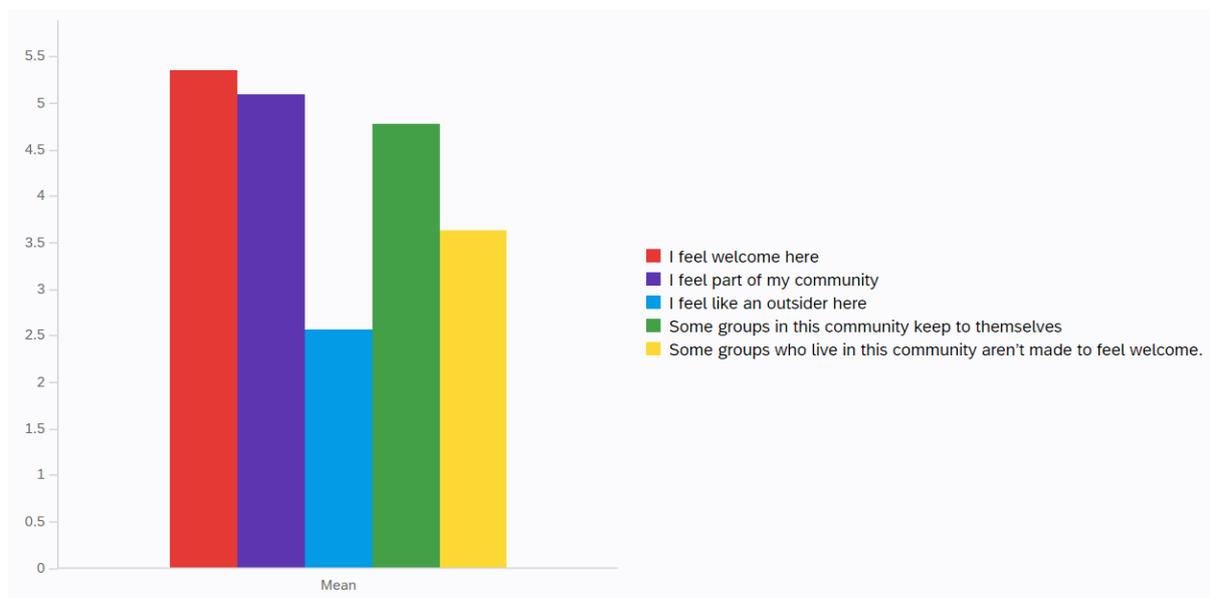


Figure 7. Sense of community connectedness (n=43)

Summary

The online survey data indicated high levels of engagement in preparedness activities within the community, and importantly, demonstrated effective use of emergency plans during the Wooroloo Bushfire. Participants reported moderate access and engagement with the Red Cross programs and resources, but high levels of satisfaction with their delivery. The findings indicate high levels of disaster exposure within the sample (largely bushfire, pandemic and storm exposure), a strong sense of community connectedness, and psychological distress consistent with Australian norms (ABS, 2018).

Part 2. Qualitative Study

Participants

The qualitative sample comprised fifteen participants, mostly women (80.0%) ages 37-67 (mean age = 53.6 years). Census data for the Cities of Swan and Kalamunda, and Shires of Mundaring and Chittering, indicate that the local population has gender parity and median ages ranging from 34 – 47 years, indicating that the current sample included more women and a higher average age for the Perth Hills area (ABS, 2016). The sample reflected a largely Anglo-European ancestry, consistent with the Census data (ABS, 2016). Most participants had lived in the area for nineteen years on average (range 5-31 years). Some participants worked or volunteered in the area and were invited to participate based on their experience and knowledge of the community and Red Cross programs. All participants voiced awareness of the Red Cross preparedness programs, and most had attended a session, either as a community member participating in the program or through a leadership or organizational role. Many community members in the sample held local volunteer roles, with local bushfire brigades or bushfire-related community groups.

Potential participants were nominated by Australian Red Cross staff, after giving verbal consent to being contacted. There were no cases in which people declined to be interviewed, but a small number of nominees did not respond to the invitation to take part. Interview participants were required to have knowledge of the programs to inform the evaluation, and as such were purposively recruited. Principles of saturation were applied to determine sample size, to ensure that a comprehensive data set was obtained. Although perspectives vary by individual and thus determining saturation is complex, we deemed saturation was achieved when no new themes were evident in the data.

Procedure

All participants provided informed consent via Qualtrics prior to participation in the interview. Before commencing the recording, the interviewer assured participants that their involvement was confidential, they had a right to withdraw at any time, could ask questions, or refuse to answer any questions. All participants were provided with contact information for psychological support helplines via the Information Statement, which could be downloaded from the Qualtrics site.

Interviews were largely conducted online, with one interview conducted in-person in the Perth Hills. A semi-structured interview guide was developed by the research team and revised in consultation with Australian Red Cross staff. The guide was designed to elicit discussion of participants' experiences with preparedness programs, current actions and sense of preparedness, implementation of preparedness plans during emergencies, psychological wellbeing within the community, and perceptions of community connectedness. Participants were also invited to comment on possible improvements or changes to the current programs and their delivery.

Interviews ranged in duration between 30-60 minutes and were audio recorded with consent. Due to rising COVID-19 case numbers in Western Australia during the data collection phase, all procedures followed Department of Health guidance, and including a transition to online interviews. Following completion of the interviews, each participant was sent a thank you card with a \$20 Coles Myer gift voucher (one participant asked not to receive the gift voucher). All interviews were conducted by the first author. Digital audio recordings were transcribed verbatim by a professional transcription service and cross-checked by the first author prior to analysis.

Data Analysis

An inductive and reflexive thematic analysis was conducted to identify key themes within the data (Braun & Clarke, 2019). The analysis was conducted by both study authors, with regular discussion of the coding structure and identified themes to determine validity of the thematic analysis. Coding was conducted independently, and themes were identified in collaborative discussion of the codes and latent patterns of meaning within and between the interview transcripts.

Qualitative Findings

Overview

Perth Hills residents have faced multiple severe hazards in the past decade. Although the interview focused on preparedness and impacts related to the 2021 Wooroloo Bushfire, almost all participants described repeated bushfire exposures, with varying degrees of severity, closeness, and personal loss. References to the major bushfires in the area, including the 2014 Parkerville, Stoneville and Mount Helena Bushfires, as well as smaller fires that may have affected properties, caused destruction and amplified psychological responses, were common across most participant reports. Participants shared their experiences of living in a high-risk bushfire setting, perceptions of participating in preparedness programs and the impact of community preparedness in responding to bushfires.

The thematic structure is outlined in Figure 8. Themes identified in the data reflected Perth Hills residents' high levels of bushfire risk perception, and the need for extensive preparedness planning and action (*Perception of Risk and Preparedness*). Several themes illustrated community perceptions of value and excellence regarding the Red Cross programs (*Reputation and Trust*), with specific program elements that informed household preparedness (*Australian Red Cross Prepared Programs; Barriers and Community Recommendations*). Participants also discussed community connectedness (*Community Dynamics*) and its intersection with preparedness, and the mental health impacts of repeated bushfire exposure (*Post-Disaster Mental Health Concerns*).

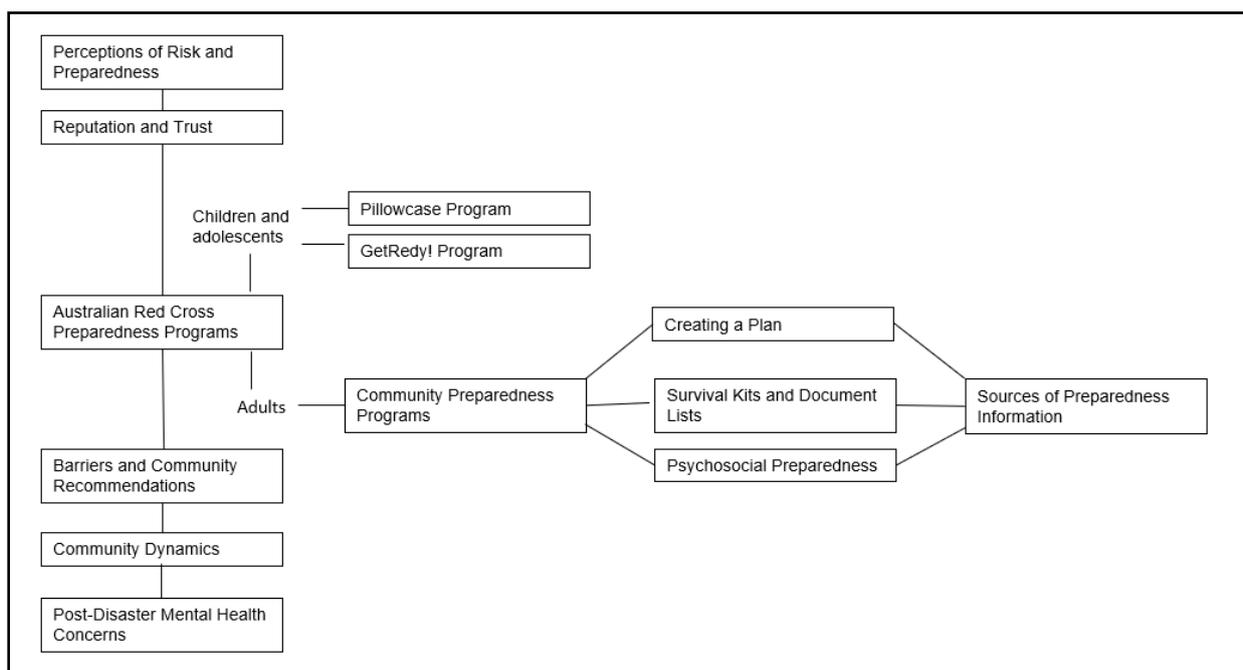


Figure 8. Thematic Map of Community Perceptions of Preparedness in the Perth Hills

Perceptions of Risk and Preparedness in the Community

Participants' language reflected a high level of threat, and an ongoing sense of risk in living in the Perth Hills. Most participants noted that they had not been as badly affected in recent bushfires as others in the community, and that preparedness had assisted in their ability to cope with the high risk. Perceptions of threat were integrated with descriptions of community identity. Several participants noted that their children had experienced bushfires, and discussed the risk regularly as a family.

Further, participants voiced concern about the changing climate, which is creating difficult conditions for bushfire preparedness, including extended bushfire seasons, shorter and less reliable timing for burn-offs.

Many participants described their experience of preparedness and response with reference to a range of relevant health emergencies and disasters, that sometimes occurred simultaneously with competing public health requirements. For example, the Wooroloo Fires occurred during a COVID-19 pandemic lockdown, creating difficulties for evacuation and recovery.

'I had family members saying do we stay or do we go? How does it relate to lockdown? I said well the first thing you do, is you defend yourself. And if that means you breach lockdown, and drive to another suburb, then, so be it because you wouldn't be expected to stay. You don't have to ring a government department to ask them that. So I think, there is some confusion as to what happens in that situation.' (P8)

Reporting of multiple and co-occurring hazards highlighted the importance of the Red Cross's all-hazards approach in preparedness programs, and this was seen as a highly valuable component: *'So we can be dealing in the southwest here with major bushfire campaigns right next door to major flood emergency campaigns'* (P2). Another participant stated, *'It tends to be centred very much around bushfire, because that is predominantly the biggest risk that we've got here. We also have flooding. We did have quite a major flood in 2017 and the Red Cross came to our support there as well, which is great'* (P11). Participants recognized the relevance of preparedness learning for multiple types of emergencies, and highlighted that this focus was unique to the Red Cross programs (where alternative programs delivered in the region tend to focus on bushfire preparedness only).

Reflecting a high level of risk perception, all participants voiced awareness of the importance of bushfire preparedness. Most participants described having undertaken a range of actions for physical household preparedness specific to bushfire risk (including fire breaks, lopping trees, installing sprinklers, buying a generator, regular sweeping of leaves, designing gardens with fire-retardant plants). Discussions with family members and neighbours regarding decisions to stay and defend their home or leave early were frequently reported.

Although a deep engagement in preparedness was common to the sample, many noted that their experience was not reflective of the whole community, citing concerns that some in the neighbourhood did not understand the high level of fire risk, or were ambivalent to it. For example, one participant voiced concern regarding neighbours' inattention to preparedness activities that had potential to place their own household at risk:

'I think for some people, it's feeling like there is inaction within the other sections of the community. And feeling like you could have neighbours with overgrown blocks and a sort of ignorance, if you like. And feeling very powerless to action anything on that.' (P7)

Others were concerned that some preparedness action had been taken but that residents were not psychologically prepared to respond:

'There's clearly groups, that are not large sections of the community, that are not prepared... Some people have done little bits and pieces, some people have done property, practical preparedness, as opposed to actually preparing psychosocially.' (P3)

Reputation and Trust

The Australian Red Cross was viewed as a reliable and trustworthy organization, with strong expertise in disaster preparedness and recovery, which framed participants' perceptions of the value of the preparedness programs. Many noted the ongoing presence of Red Cross staff and volunteers at community events, and the longevity of the relationship with the community.

'The Red Cross is so well known, I think, whatever you do, people are going to sit up and take notice because you're a respected organization, I think that helps. When they say 'Red

Cross, disasters and emergencies' I think that holds you in good stead. You know, you've got a history and longevity behind you, with your reputation'. (P4)

'And the fact that people know, by attending these events that there is, you know, someone there in support, and I suppose preparedness wise, it's not just for this event, they know that the Red Cross - they can rely on them, being at future events as well. So I think that's really important.' (P11)

The Red Cross's strong reputation fostered trust, with participants noting that they were likely to turn to the Red Cross for reliable information. Red Cross staff are highly respected in the community, and their delivery of programs was considered to have heightened community engagement. Given the overlap of preparedness and recovery cycles as the Red Cross respond to the Wooroloo fires in the region, many noted the important role of Red Cross recovery teams also.

'We had a raft of events up here, all supported by the Red Cross, every single one. And that's been the common thread all the way through. At every single event, we've had the Red Cross there, at every recovery event.' (P11)

Red Cross Pillowcase Program

The Australian Red Cross Pillowcase Program is a child-focused school-based program designed to increase knowledge, psychosocial readiness and preparedness actions among primary school children (ages 7-9). The Pillowcase Program was discussed by respondents whose children had participated, school staff that had invited the program into their class, or those in leadership roles within the community who were aware of the program delivery and outcomes. Teachers and school staff all reported a deep appreciation for the program, and recognised its tremendous value in preparing children for emergencies,

'All of the teachers that have participated, students that have participated, really enjoyed the program. They seemed to get a lot out of it. It stays with the children long after the actual event which is really good' (P8).

All teachers and school staff noted that once aware of the program, they had requested that the Australian Red Cross deliver it every year.

'We will absolutely keep doing it every year. Some activities you can't fit in the calendar but we will always do this... Because in a catastrophic risk area like ours, it's not - if it happens, but when. It is one of our fundamental programs' (P15).

The program was considered to be a good fit with the Year 3 and 4 curriculum, and suitable for delivery in schools. Teachers appreciated the opportunity for students to learn about emergency preparedness in a calm and informative environment established within the session.

Value of Psychosocial Skills Training

School staff valued the level of information provided in the program, which they described as appropriately targeted and engaging. Many noted the value of teaching psychosocial skills for emergency preparedness: *'They [the children] understand, it's not too much information, and it doesn't scare them. It actually gives a little bit of control over what's happening' (P8).* Another school staff member stated: *'It empowers them to take ownership of their own evacuation' (P15).*

It was reported that the program enabled honest and open conversations with children, while reassuring them that the adults in their lives know what to do and will support them in an emergency. *'The program also, I think, assures them that responsible adults have everything under control. I think that's really important too. That it's not their responsibility to control everything' (P8).* One parent noted the psychosocial effects for her children who were now teenagers: *'The fact that they still have them [the pillowcases], I think it must provide them with some sense of security' (P1).*

Longevity and Transferability of Learning

Encouraging students to write and draw on the pillowcase was described as reinforcing the messages learnt in the program, with a tangible product to support longer-term learning. *'I thought it was really good. It was very hands on and made the kids really think about things and discuss it. I thought it was very positive'* (P5). It was reported that many children continued the activities at home, with some keeping their pillowcase next to their bed, most discussing the lesson with their parents, and one child made lanyards with her name and parents' contact details for herself and each of her siblings, which she later used in the Wooroloo fires. Some teachers extended the session, by incorporating the learnings into that week's writing exercises, and discussing household dialogue resulting from the session in the next day's class.

One school staff member reported that she had incorporated bushfire preparedness into her school induction procedures for new parents, given the critical importance of bushfire knowledge for the school. The school also runs Red Cross preparedness sessions for parents.

Connectedness Through Participation

Multiple respondents described value in the children discussing their experiences and perceptions of bushfires with their peers. It was asserted that participating in the Pillowcase Program may have been the only time that children discussed their own experience in evacuating or responding to bushfires with their friends or class, and the program was considered a safe space for young people to explore their feelings and thoughts.

'The opportunity just to sit and work with the pillowcase, draw on it, gives those kids who've been through the trauma a reason to chitter-chatter about, "oh well, I took my teddy or I'm really sad because my teddy got burnt in the bad fire that we had." So it gives them just something very specific to talk about with their friends which maybe they have not talked about necessarily with their friends. They might have talked about it with a counsellor or adults, but not necessarily just with their own classmates. So that's been something that was really quite positive-- just to pair them up with one of their really good friends and just to see them open up. Yeah, that's been good. And I think for kids who have not gone through that trauma, I mean, they're never going to really understand how bad it was for the other student. But at least they have already had some experience to know, "oh, I remember that pillowcase thing that we had to do, and I know that I need to be prepared."' (P9)

For those who hadn't yet experienced a bushfire, teachers saw it as a valuable opportunity to learn from peers with lived experience and explore their own feelings. Peer-to-peer learning was thus considered important to normalise psychosocial reactions and build social connections that would support later preparedness.

'Drawing it makes them think. It's done in a relaxed setting, with their friends, not done in isolation.' (P15)

'While they're doing their drawings, you can just hear them chattering with each other about what they would take and if they were in an emergency, what kind of things they would just grab to take.' (P9)

Teachers reported that parents valued the opportunity for their children to learn about emergency preparedness from experts, and welcomed the sessions. An additional benefit of the program was that it appeared to help parents and caregivers understand the necessity of engaging children in preparedness strategies and offered insight into the developmental stages at which this can occur. Many parents and teachers suggested that the program played an important role in teaching parents the value in preparing children, and that children could be actively involved in preparedness process and planning. A cascading benefit was the transference of skills and knowledge to household members, through discussion of the lesson with family (a core component of the program).

'My younger one ... did the pillowcase project at his local primary school. That was late last year and he very proudly came home with his decorated pillowcase. And we had discussions

around the fire season coming up to make sure they were prepared mentally more than anything.' (P11)

Long-term Application of Preparedness Skills

Important examples of sustainability and transferability in learnings were reported. Participants highlighted the targeted and appropriate use of the preparedness learnings by children who had completed the program and implemented the pillowcase learnings in recent bushfires (sometimes up to seven years later). *'The kids I've talked to, since the more recent fires, there's a sense in which they kind of knew what they were doing'* (P5). School staff reported that many children used their pillowcase during evacuation for the Wooroloo Bushfires, and multiple respondents involved in the response described hearing of children in the evacuation centre with their pillowcase, having put the lessons into action. *'When the time came to use it, [students] knew what to do. None of them panicked.'* (P15). Participants' reports indicated that young people were able to retain the key messages, put the learnings into action during periods of extreme stress, transfer the skills to support siblings and their parents, and enact psychosocial skills to remain calm.

'Another thing that the presenter does with the students, is teach them how to breathe and keep calm when they're facing a situation like a bushfire. And so, I think that that has been very helpful... I have heard from parents [who have evacuated their families during bushfires] that they said it was good that they'd actually done some sort of emergency preparedness training when they were in year three. So, that was good.' (P9)

'It [the Pillowcase Program] is extremely effective. I heard from ex-students' families. [Students] who were in Year 10 when the fire happened. And they used their pillowcase.' (P15).

'My kids have all done the Pillowcase Programs with their schools, and funnily enough – and they did these a number of years ago – they're teenagers now, but they all remember what they learnt from that. And my girls actually still have their pillowcases... and one actually still used that to pack her stuff that she really wanted to take with her, even for this Wooroloo fire, and she's sixteen.' (P1)

'In all cases when kids evacuated, they had a plan, they were aware. They're told to keep their pillowcase close to their bed. In most cases, parents were surprised it was the first thing they picked up. Parents wouldn't have thought of it.' (P15).

Two children that had completed the Pillowcase Program at school were recently awarded Lions Club Bravery Awards for their actions in implementing the preparedness lessons learnt during the Wooroloo Fires. Several participants commented on the courage and competence of the two children in responding to the fires, and attributed their actions to participation in the Pillowcase Program.

'Two young people there from separate families, who had previously done the Pillowcase talk through the Red Cross in partnership with the Primary School. And those children implemented their action plan. They packed their pillowcases; they helped their parents refuel generators - these are primary school children - helped their parents to refuel generators during the fire. Helped them load up the horses and connect the trailers to the vehicles. And they also had, they made up little information cards that they wore around their necks with their names, addresses, phone numbers, next of kin, just in case they became separated. So they'd actually been taught by one of the Red Cross ladies up here, Claire. So we were able to invite Claire along to a presentation that the City facilitated with the Lions Club and gave these young people, they both got a bravery award for their actions on the day' (P11).

At a school with an established history of delivering the Pillowcase Program, a staff member reported that many students had enacted the preparedness skills learnt during Pillowcase: both practical elements (e.g. packing a pillowcase) and psychosocial skills (e.g. remaining calm). Reports of students enacting the Pillowcase strategies were frequently relayed to the school, and had occurred in multiple bushfires.

Potential Improvements

When asked, teachers and parents were reluctant to suggest any changes to the Pillowcase Program. All re-affirmed the value of the session when asked if it could be improved. In a school where there had been difficulty arranging annual sessions, one teacher indicated potential for teachers to be trained to deliver the program in class, with a view to lessening the burden on Red Cross resources, increasing access, and engaging teachers that bring their own experience as community members.

'I actually think schools could probably do that as part of a health program, or more a homeroom program, but it wasn't actually made accessible to schools. So, it stopped when a Red Cross facilitator could no longer come. So, it hasn't continued, whereas my feeling was that it could easily hand over the program and suggest that it's something that should be running in schools. It would be a really good thing to do in schools, such as in this area.' (P5)

This respondent also highlighted the value in having external experts deliver emergency preparedness messages, and the authority that they bring to the class, but highlighted the potential sustainability in embedding the Pillowcase Program within the school curriculum. Another suggested including more male presenters:

'I'd love to see some male presenters perhaps because I think a lot of our teachers and our presenters are generally female, and it would be great to see Red Cross put some males upfront into the school to do these sorts of programs.' (P9)

One respondent noted the need for older students to be included in the program should they join the school after Year 4. Their school had invited new students to attend, and found that the messaging was appropriate for all primary school ages.

Overall, the Pillowcase Program was seen as tremendously valuable in providing age-appropriate preparedness information, enabling child-led decision making in evacuation preparation, and supporting social connectedness within the classroom. The number of examples provided of children and young people implementing the knowledge received in the Pillowcase Program to stay calm, pack their belongings, and enact their household evacuation plan indicated that the learnings were sustained over time and supported psychosocial coping in emergencies.

Get Redy! Program

The Get Redy! Preparedness Program (formally Redy Set Go!) was designed and delivered following the 2014 Parkerville Fires, although its implementation was limited. As such, only two participants reported knowledge of the program, but their reports reflected the impacts of the Pillowcase Program.

'The Year 9 Program, I thought, was excellent. I mean, at that time, I think that came about after the [2014] fires - the Parkerville ones... It was teenagers that were at home when the scary stuff was happening. Interestingly, I remember talking to a parent this year ... when she arrived [home], [her teenage son] had a case all packed, he'd actually packed her clothes and everything. They actually didn't need to evacuate, but I've reflected at the time. This is the kind of thing that the program, the Red Cross Program, had been promoting.' (P5)

The child and youth focused preparedness programs delivered in schools demonstrated relevance, applicability and longevity in learnings. Multiple examples of their use, often many years later, highlight the value of the programs in preparing young people, and the significant capacity of children and adolescents to prepare and respond to emergencies with their families.

Red Cross Community Preparedness Programs

The level of emergency preparedness in the sample was high. Most respondents had attended the Red Cross programs, or been involved in a professional or volunteer capacity, and some were able to attribute preparedness messages or actions that they'd undertaken during the Wooroloo Bushfire to learnings from the Red Cross.

'We went there [the Red Cross Preparedness Session] and that was when we had this bushfire, it was really helpful because all the information we got there, that was very helpful.' (P10)

Participants described feeling calm, inspired, relieved and better prepared after attending the programs, with multiple participants stating that they found the programs *'really useful'*, and *'fantastic'*. Participants outlined their experience in the programs, the extent to which they had enacted lessons learnt, and resulting preparedness actions that had been implemented in emergency scenarios. The most frequently reported components of the community programs that participants had retained knowledge about and enacted in emergencies were: creating a preparedness plan, packing a survival kit and documents list, and practicing psychosocial preparedness.

Creating a Plan

The importance of creating a preparedness plan was described by most participants, usually in reference to their household, but also with consideration of workplaces and schools. Many reported having thought about their plan, discussing it with household members or their partner, and preparing their properties to enact the plan.

Only a small proportion of respondents had written plans. *'With young children at home, we have a written bushfire emergency plan... We all have a defined process and wherever possible, you know, we stick to that. And it identifies the triggers for staying and going'* (P11). Another stated, *'We have got a checklist for what we do which is stuck on the fridge through summer'* (P1).

Some were aware of the RediPlan and found the format and scope useful, but very few had completed it.

'The RediPlan... it's very user friendly... even for someone for whom English is not their first language, the diagrams are really useful' (P4).

'The RediPlan... I found that really useful because of the fact that it wasn't limited to bushfires... I found that the benefit with the RediPlan was that it actually covered a whole range of other scenarios, which potentially are more likely to happen than a bushfire – even here in the Hills' (P1)

'We have put some notes down but it's not as complete as I'd like it to be. We know that our plan is to go. That we know that our trigger is Watch and Act. And yeah we know where we would go.' (P7)

For most, the planning described was verbally discussed and comprehensive – with decision markers for staying or leaving, and contingencies for escape, evacuation or defending if unable to leave: *'We know that we've got a few different plans'* (P14). Some participants voiced a need to check and adjust plans each year, with changing conditions, knowledge and developmental stage of their family. Most had discussed it with family members, and one participant reported discussing it with all overnight visitors, including her grandchildren.

Many had discussed plans with their neighbours, including evacuation plans, what to do if a neighbour was not home, and how to rescue animals. In addition, some participants reported having developed a phone tree with neighbours, so that each would be contacted in the event of an emergency. The level of communication among neighbours indicated an awareness of the importance of community connection in emergency preparedness, and that many residents had implemented preparedness steps within their social networks. *'The thing that will save you is the community. You know, because everyone is very connected and wants to support each other, and that will be the difference.'* (P7)

In addition, several participants noted that learning to speak with children about preparedness through the community sessions provided residents with confidence in holding discussions:

'Certainly in terms of how we approach the subject with the kids. That was really quite a relief because we had felt that we didn't need to talk to them, we shouldn't talk to them about that kind of thing for fear of upsetting them or worrying them. And to hear that the evidence said yeah, you

know, you do need to talk to kids and prepare them and have these kind of difficult conversations, and that's actually more healthy, it was quite helpful to us.' (P7)

Several participants described putting their household plans into action during recent bushfires, including the Wooroloo Fire. Others noted the use of RediPlan in the community, *'We just heard so many stories... of people who'd come to a RediPlan, particularly in Gidgegannup, who were able to save precious items as a result'* (P3). One participant noted that discussions within the family had prepared her children to respond quickly and calmly:

'The kids were good, they were really good... My eldest [primary-school aged child] was very pragmatic and he's quite sensible and he was, you know, got himself organized quite quickly. And he knew what he wanted to put in and was quite serious about it. I felt like I froze for quite a long time and I felt quite panicked and I was just kind of fixated on looking at the maps and the, you know, the weather and kind of what was going on and sort of wondering and thinking and not really acting as quickly as I needed to be perhaps. So, yeah, I guess that underlined for me, that we need more stuff written down because, in the moment, I was not quick' (P7).

Survival Kits and Document Lists

Creating a list of important documents and packing a survival kit was cited by most participants as one of the key messages they learnt from participating in Red Cross preparedness sessions. Creating a survival box and accompanying list was highly valued, and described as necessary to ensure that important items would be remembered and saved when operating under pressure. Many participants described high levels of stress, anxiety, feeling overwhelmed and unable to focus when the Wooroloo Bushfire had approached (as well as other bushfires in the area), and that the documents list and survival kit had enabled important actions to be undertaken without using valuable cognitive resources.

'When you're in the event, you tend to be overwhelmed and don't know which one to prioritize. You might pick up things that are not necessary. But if you have this information in your head like, "This is the most important thing, so this is my priority," that helps. Now that we have that experience as well, to put that experience into action. Now, we have a list for ourselves that during the bushfire, this recently, another scare of having the bushfire close to us. So, we already have the list of which one to go first to put in a box because we already have that experience. So it's much easier.' (P10)

'A little bit of adrenaline, and things get forgotten. So, it's more about those checklists and having them in place, in the [Wooroloo] fire situation my wife had to get [many] horses out in a space of 45 minutes. So it was a mad rush, and a number of friends and family got involved and they did that, they got them out, but having the boxes and having the checklists and so forth meant that she could get the essential things out and evacuate.' (P12)

Most had created a list or packed a box, and some had updated or changed the items after discussing it with household members, practicing evacuation or having experienced evacuation. A number of participants described feeling more confident, calm and prepared having enacted this measure at home. The tangible nature of a packed box and physical list enabled participants to identify a completed preparedness action that contributed to a sense of control.

'The important thing is understanding stress, it helps motivate people to write those lists that they need and get them laminated. Get them and put them on the fridge.' (P14)

Some participants had integrated their learning of survival kits and document lists from the Red Cross with messages from DFES and local fire brigades. Accordingly, people were able to retain the Red Cross messaging, adapt it with new information, and enact it at home to maximise emergency preparedness. Some participants noted that the list was useful not only for bushfire preparedness, but a range of other emergencies, and had prompted broader discussions and actions within their household. One participant described the added value of a survival kit when evacuating during the Wooroloo bushfire that occurred during a COVID-19 lockdown, highlighting the longevity of learning and applicability across multiple emergencies.

'At least we have a few clothes to wear in a few days to survive, because that was really hard. Because of the lockdown, your access to things is limited. That was really helpful. I got all of that information from the Red Cross Preparedness Program that they conducted maybe 4 years or 3 years ago.' (P10)

Psychosocial Preparedness

A focus on psychosocial preparedness was viewed as important and unique to the Red Cross programs. The process of preparing increased participants' reported confidence in being able to cope during a bushfire.

'I found with the RediPlan, there is a little bit more about - how do you prepare yourself mentally and emotionally, and what you need to do well in advance of actually getting to it to be able to be prepared. It was really, really useful... and to keep calm during it [the Wooroloo bushfire] really helped.' (P1).

Many described having greater confidence in dealing with an emergency after acquiring more knowledge and putting specific planning in place.

'I feel confident saying, we have everything with us before we go and also, I think that's what it is -- psychologically, it makes me feel confident because I feel prepared. Especially the documents, I didn't realize how important this is when there's a bushfire... That's the thing that I think makes me feel psychologically [prepared].' (P10)

'The more you know about what you need to do, the easier it is to be calm... it's that repeated learning, or repeated discussion that really helps' (P1)

In addition, participants described being more aware of the psychosocial risks of disasters, both immediate and long-term, and an improvement in their capacity to identify and mitigate psychological concerns.

'Bushfire is one form of emergency. It's psychological preparedness, a plan for what you're going to do, leave the area or stay and defend your home, whether it's from flood or from fire or storm for example.' (P2)

Almost all respondents described household conversations regarding preparedness and planning for fire evacuation or defence. Some also described sharing the lessons learnt with work colleagues or the broader community. *'It was an opportunity for me to learn and then share that information with my team and my colleagues which we did, and then transferred it out to the members'* (P4).

Having an opportunity to talk about preparedness with other community members was noted as an important component of the preparedness sessions also. *'Gives them an understanding that we're all going through those things. That's a big part of it, is just being able to talk about it.'* (P12).

Participating in the session also provided an opportunity for social connection.

'I don't think anyone at the end of the session left straight away. They hung back. They talked to firefighters. They started discussing their plans, they got advice. It got them engaged and I think that's one of the reasons people went there to get that engagement' (P14).

Sources of Preparedness Information

Despite high levels of participation in the Red Cross programs across the sample, some participants had difficulty discerning specific learnings or actions derived from the Red Cross. There were a number of reasons identified in the data for this discrepancy. First, many noted that a plethora of preparedness information is available to the community, from a range of online and in-person sources, which can create conflicting or confusing messaging. Some participants reported that they had attended other programs as well, including bushfire preparedness sessions run by the Department of Fire and Emergency Services (DFES), local fire brigades, and local government events, and were unsure where each preparedness message had been learnt.

Second, the discrepancy reflects a deliberate strategy enacted by the Red Cross to deliver preparedness programs in collaboration with community groups and organizations. Red Cross Preparedness staff have developed significant collaborative networks and delivered the programs in partnership with local fire brigades, DFES, or at local government and community events. This collaborative delivery ensured greater dissemination of the Red Cross messages, higher visibility, and coordination across services in the Perth Hills region. Through recognition of the synergy in messaging, this strategy conserved resources, while providing an opportunity to deliver the messages unique to Red Cross's programs (specifically psychosocial preparedness, an all-hazard approach, and preparing a documents list). It created a unified approach that participants recognized as embedded within the community. This strategy was described by participants who had engaged with Red Cross through their roles in local fire brigades, local government, and as key stakeholders.

'So [overwhelming stress] happens to everybody but I think I'm pretty sure that the sorts of discussions we're having with the general community, as the Red Cross and the fire brigade combined, are putting some stark facts in front of people. So, it's not just being there and having the equipment, it's the psychological preparedness' (P2).

'It's great that the Red Cross works with the local firefighters' (P14).

'We encourage them [Bushfire Ready Groups] to have a group meeting at least once a year in the lead-up to the fire season and we volunteered to come along and talk to them about firebreaks and preparedness. And what's changed? What the seasonal outlook is? What we can expect this summer? That sort of thing. That's often done ... with Red Cross participation' (P2).

It was also a strategy noticed by community members who attended preparedness information sessions:

'I think having the different kind of representatives of the fire brigade and I think there was somebody from DFES and the volunteers and then there were Red Cross representatives and there was sort of community, Shire representatives there as well. And so hearing from several different kinds of voices about the different aspects of being prepared was useful and also the fact that it was a community kind of consultation meeting. So people asked good questions, you know.' (P7)

Barriers and Community Recommendations

Barriers to Engagement in Programs

Most participants voiced concern that the broader Perth Hills community was not sufficiently aware of, or committed to implementing, the emergency preparedness actions needed to mitigate bushfire risk. Many noted complacency and ambivalence in the community, which heightened their concerns for bushfire risk.

The value of the Red Cross programs was highlighted, and participants called for broader accessibility and coverage.

'I understand, obviously, the Red Cross have got limited resources, HR and finance-wise to roll it out across the whole of WA, but it would be nice to think that everyone had a little bit of a clue about what to do in some of the emergencies, particularly in this day and age' (P11).

'It was a real eye-opener for people who went there. But the challenge is getting people to go' (P14)

When asked about the barriers to engagement in the programs, participants suggested that insufficient time, not setting it as a priority, and child-caring responsibilities limited people's capacity to attend the sessions. There were some concerns that the people who attended the Red Cross preparedness sessions were already engaged, and thus the messages were failing to reach more marginalised or ambivalent groups.

I don't know how you get around that because there are people I've spoken to, you know, and who would really benefit from it. And they can't bring themselves to do a RediPlan session... they're probably the ones who'd benefit the most from doing it'. (P1)

'It wasn't taken up that well. You'd have all these brochures and manuals, and you'd have evening talks, and all those kinds of things, but the uptake was always pretty low.' (P12)

'The barriers of time and not having the space to do that, but also perhaps the fear of it is creating a barrier' (P1).

Ongoing public health restrictions related to the COVID-19 pandemic were also raised as a barrier to engagement, although participants were keen to state the value in meeting in-person, and had concerns that online programs would not be as effective.

'There are some of the activities they did that involved connecting within the group. I think that lets the social aspect of physically being there and interacting with your neighbours and connecting, it's a good icebreaker because a lot of people who live up here are very private, they move up here for privacy and they avoid connections' (P14).

Salience of Fire Threat

Multiple participants raised the need to act while the community was focused on fire threat. Holding preparedness events immediately following bushfires in the area, or during media coverage of major bushfires elsewhere.

'It seems there's a bit more uptake. I guess since the fires there's been a recency effect, and people are kind of reminded of how important those plans are. But there was a lot of complacency and a lot of ill-preparedness here.' (P12)

'If you're going to do any promotions, if you're looking at TV advertising, you need to highlight the fact that this could happen to you. It's not the case of if it's going to happen, it's when it's going to happen... You can be affected so easily and you need to be prepared. Like you might've thought you had a plan last year, can you improve on that plan?' (P4)

Some noted that their own motivation to start preparing for emergencies was sparked by exposure to fires in the area:

'So we actually attended one of the Red Cross information sessions after that fire happened... so that kind of helped us to get informed initially because we were very new to the area and didn't really know much about what kind of preparations we needed to do' (P7)

Others indicated that frequency of messaging was important: *'I think you've got to keep hammering away at it... People are going to become complacent'* (P4). However, an overload of information was considered problematic for people starting on their preparedness actions, *'There is a lot of information around. It's very difficult to know, what applies and what doesn't'* (P7). This participant described finding the joint Red Cross/Fire Brigade session useful for asking questions and discerning information tailored to their circumstances.

Coordination and Collaboration

Accordingly, the implementation of family-friendly events, more frequent sessions, and the delivery of programs in places where people met regularly (such as schools, church groups, community events), were proposed as options to increase uptake. Despite efforts to collaborate across community and government departments in the Perth Hills, some participants called for greater coordination to ensure that gaps were filled and a cohesive strategy for community preparedness is implemented. One stated, *'there would be a better opportunity for DFES and Red Cross to work a little more collaboratively'* (P12), noting a duplication in preparedness materials and resources.

The same participant called for more practical preparedness measures to be incorporated into Red Cross sessions, *'It was an effort to get those people to actually give us the attention for that period of time, why not make it a little more all encompassing?'* (P12). They were concerned that although

people attended the social gatherings and community events that the Red Cross had organized, they felt that people failed to implement the preparedness lessons and actions that had been taught. This participant called for greater use of experiential skill building (e.g. training in conducting a hazard reduction burn).

'To me, important information was being exchanged but at the same time wasn't as cohesive or as all-encompassing as it probably could have or should be. And again, I guess that the elephant in the room for me was always the practical application of these things. There were a number of instances or examples where the people may have had the theory but putting theory into actual practice, is two different things. And so, I know of several examples where people had fire stuff ready to go and their plan was to defend, and through lack of awareness, lack of exposure, and experience, just didn't have the skills, the confidence, tools, or the usage of the tools to actually go through and defend their properties.' (P12)

Through collaboration with DFES, local fire brigades and local government partners, there may be opportunity for more practical preparedness elements to be run in conjunction with the Red Cross psychosocial preparedness training.

Community Dynamics

Community dynamics played an important role in participants' reflections on preparedness, response and recovery. Many participants described their community as highly connected, with language often reflecting an extended family. Several described the community as what they liked most about living in the Hills.

'The people here, we have a close community and very helpful. Even though our distance is very far from each other, like the closest is 50 meters, we always know each other. That connectivity, that's what I love [about] living here.' (P10)

'It's the environment, plus the community. It's a big family here.' (P2)

Community Connection for Preparedness

It was evident that participants perceived community connectedness as a foundational component of emergency preparedness. Bushfire Ready groups developed by the local bushfire brigades, and supported by Red Cross messaging at their events, fostered community connections.

'And I think that's why, you know, having those things like the Bushfire Ready groups in the streets gives you connection to your neighbours. They may not participate. But if they do, at least participate in a phone tree, and you perhaps have a conversation with them when you drop a leaflet off to them or get their phone number, that you at least feel like you're connecting and sort of raising the subject, whether people choose to act on it. None of us can control that, but if you then identify as you connect with those neighbours, we said, for example, you identify an elderly neighbour, whose property is in fact, very overgrown. And you look at that and you think well, actually, they're never going to sort that out. And they need help from the community to do that.' (P7)

Many described high levels of preparedness across their neighbourhood, *'it is a very active community on all levels'* (P7). It was common for participants to report connection through neighbourhood Bushfire Ready groups, phone trees, and social media groups. Most had discussed preparedness with their neighbours, and were aware of efforts within their street or district to prepare and mitigate fire risk.

'Our closest neighbours, we still keep in touch and let them know when we're burning off' (P4)

'Sometimes we spend more time preparing other people's properties than our own.' (P14)

'They [Bushfire Ready groups] have their own networks. So for example, we were doing a hazard reduction burn for somebody nearby. And I said, well can you please advise your

neighbours: It's happening on this day. She said that's already done, I just sent an email out on our Facebook Bushfire Ready group. It's being used for that sort of purpose.' (P2)

Participants were active in sharing preparedness messages within their networks, and supporting community members. On occasion, preparedness formed a point of connection:

'Just recently, I visited another neighbour, a new neighbour, who has only quite recently moved in and gave him some information that we picked up from a recent community meeting. I just took him one of the preparedness folders and magnets and stuff and knocked on his door and said, you might want to look at this, which he was amazingly grateful for.' (P7)

Social media was cited as an avenue for sharing preparedness information, fire warnings, and response notices. Many described accessing district-specific Facebook pages for information and to share support. The availability of curated information was considered helpful for community connectedness, and some noted that Red Cross preparedness messages had been shared on social media forums and platforms. However, more recently, some noted the occurrence of disagreements and disrespectful communication via social media, which was distressing for the community, and fatiguing for those who administrated the pages.

'I do believe it's a healthy thing for people to be able to talk about it. I guess it's making sure that it's in a healthy and respectful kind of way because I manage [a community social media] page. There's been a few times where I've had to put people on blocks or restricted access because they literally were just getting so vindictive and destructive and the only thing you can attribute it to is stress. And them just acting out, them just, letting their frustrations out on other people, but at the same time, we're all going through the same thing.' (P12)

Community Response during Bushfires

Community support was evident and reported across all stages of the emergency cycle. During the Wooroloo fires, the community had supported each other in responding, and ensuring safety and comfort.

'We had a week of 24-hour operations, three shifts per day, and talking about the community, everybody pitched in, so. It was hard to keep people off the [fire]trucks. You know, they come back from an 8-hour shift and want to go straight back out again. My wife looked down and said no, go get some sleep.' (P2)

'I'd got my tractor out and I was driving the tractor around just lifting trees and power lines off the roads, and getting them all sorted and chopping things up, and people coming around with fire trailers, or fire units on the back of the utes and putting out spot fires here and there and all that kind of stuff. So, that side of things, the community side of things. It was pretty amazing.' (P12)

'Oh, there's also a general community awareness of the volunteer bushfire brigades. For the Wooroloo fire in particular, just had masses of donations.... Coffee shops providing free coffee and cards coming in. We found a basket full of flowers at the entrance to the station that said, "Thank you fire guys." No name attached so we don't know who it was from. Lots of cards saying you're heroes etc. So in other words, the local community really values the volunteer bushfire brigades.' (P2)

Community Recovery

The community found practical ways to help during the fires, and supported each other afterwards. One participant described the practical and thoughtful efforts of their community to ensure that she was supported in the clean-up of burnt debris on her property:

The other thing that I would like to share is after the bushfire, so we lost our deck and it was burnt and stuff like that, and all the chairs standing there. I thought I'm a strong person

but every time I see those debris, all the burnt stuff, something deep inside of me made me feel uncomfortable to see those. And then one night, because every first Friday of the month, they have this men's night, and then my partner shared that to one of the boys, and all of a sudden, he said, "Who wants to volunteer for tomorrow to clear up [name]'s—all the burnt stuff?" Then, maybe four or five of them early in the morning, maybe 6 o'clock came here and cleared all the stuff. That was like an instant relief as well to me to see that it was clear already and clean. Those type of things make you feel—my goodness, I can't see this [happening] anywhere else. Only here. Especially in this area. It was really helpful. It makes you feel comfortable, no matter what. We're prone to bushfire, so that's life. We can't just keep hiding. So, just be aware of what type of community you're living with. (P10)

A heightened awareness of the psychological impacts of the fires within the community was spoken about positively by participants. One recalled a story from a community member who had been overwhelmed by anxiety during a trip to Bunnings hardware store.

The management got involved with her, and spoke to her about it and how she was feeling. And then it went out on one of the Facebook pages to say, "If you need something, just talk to the concierge at the front of Bunnings and tell them what you want, because you don't need the extra stress of not being able to find something. We're here to help you." And so they were offering extra customer-, like one-on-one support for them to get what they need and then get out. (P4)

The Red Cross's role in restoring a sense of safety and community connection was identified by some participants. One noted:

People who are going through this disaster recovery are all at different levels, but one thing that's been completely knocked out of whack for them is their feeling of community safety. The fact that many of them, some have been rebuilt, but many of them lost their fences. Many of them felt that there was maybe more they could do, or had it been more catastrophic and we'd lost lives, you know, with people injured and maybe there was more they could do around that. So that's been identified and that's filled that gap. And I think that's, you know, been really well received. And I'm sure that the team up here and Andrew and Lauren and everyone will have the feedback from that. It's all pretty good, I'm led to believe. So that's restored their sort of their preparation, their sense of well-being, and safety, which is great. (P11)

However, despite many positive reports of community connectedness and support, some shared descriptions of discord. The closeness of community resulted in comparisons in access to funding, or capacity for recovery. Some voiced frustration, annoyance and fatigue, suggesting a lack of appreciation from others and sense of entitlement during the lead up, response, and recovery.

'It's a blessing and a curse. Yeah. So blessing is that the people are pretty close and they can kind of lean on each other. The problem is when they lean on each other in an unproductive way, it kind of again becomes draining and exhausting... The flip side of having a close community is whenever something like this has happened ... [there's] bickering, fighting, complaining, and whinging.' (P12)

It was evident in participants' reports that community connection supported preparedness across the area, and that the connections formed in neighbourhoods improved people's sense of safety and wellbeing.

Post-Disaster Mental Health Concerns

Strength and Resilience

The mental health needs of the community were discussed with all participants. Most noted that the vast majority of people are functioning well and returning to a sense of normalcy after the Wooroloo Bushfire. Evidence of resilience in the community was noted by several participants, highlighting the strength of community and capacity for people to rebuild and recover.

'I'm so inspired by how resilient they [the community] are and the messages they're giving their kids... 'they could be saying "life sucks"... and instead they're pushing through and saying "Look, let's get this done, and let's find what we need to do, and what we can do," (P1).

Trauma and Loss

However, a number of participants noted high levels of ongoing distress. This was particularly apparent in reports from participants located in severely affected areas and those in community roles. Residents that had lost homes and properties were thought to be at greatest risk of psychological difficulties. However, participants impressed the importance of also considering the impacts for those who did not experience personal loss, but were witness to others' loss. One participant described the pain of a neighbour's relocation after their house was destroyed, and living with the constant reminder of their lost house and disrupted friendship. The emotional toll of rebuilding and recovery was evident, and many noted incidence of post-traumatic mental health concerns, *'I think there's a lot of stress, a lot of post-traumatic stress'* (P12).

'They've gone through the trauma of the day, whether they stayed and defended or had to leave with their animals, or lost animals, almost lost their families, lost their homes. Even if they lost fencing and retic[ulation], you know, it's a big hit for some people. And being part of the community, even though some people may not have been directly impacted with losses, they've been impacted in their communities being pretty much shattered by the event' (P11).

'There's still a lot who are really struggling to get on their feet, after having lost everything' (P1).

Post-traumatic stress reactions were often described, consistent with the pattern of psychological symptoms expected in disaster-affected settings. Seasonal changes associated with summer presented a trigger for post-traumatic stress reactions. Higher temperatures, hot winds, smoke from hazard reduction fires, and the sounds of helicopters were noted as traumatic cues, that were heightened in the lead up to the anniversary of the Wooroloo Bushfires. Some participants described the avoidance of traumatic reminders, such as children covering their eyes when they drive past burnt structures.

'I have a close friend who lost everything, and every time she hears the helicopter, her anxiety kicks in.' (P10)

'That was a big trigger for them. It was warming up. There were a few large controlled burns within the district up here... And there was a whiff of smoke in the air and starting to warm up, that had a significant impact on people.' (P11)

'They're still living in that space, they're still driving past friends and neighbours' homes that have been burnt down, you know, still looking at charred paddocks and all the rest, for a long time. And I think that bit is overlooked' (P1).

Several participants described times that they had struggled with the psychological upheaval, and noted similar occurrences for friends and neighbours during the recovery.

'I think little by little, they are getting there, but there are still people struggling, still traumatized, and can't even look at their property or go back in there because they are really extremely traumatized' (P10).

In addition to post-traumatic stress, a range of emotional responses were described. Anger within the community, particularly in areas that were perceived as less prepared for bushfire, was raised, as well as guilt and sadness. Many described fatigue and exhaustion.

'There are some people that were probably angry... they were deeply shocked by their experience because they were evacuated in the middle of the night.' (P7)

'I can understand how much of a struggle it is, and how hard it is, because you also feel a little bit of guilt about the fact that you're still all fine... We're really lucky because we haven't lost our house. But we're really sad.' (P1)

'After the bushfires had gone, people were still in grief, stress, anxiety and anger.' (P4)

Ongoing Daily Hardships

Mental health difficulties were often discussed in the context of ongoing daily hardships in the post-disaster environment:

'It's a stacked event when you've got so many things conspiring against people, where you've got COVID, you've got building and labour shortages, you've got issues with insurance companies, and all kinds of things stacking up against people. We had a very cold long winter and now we've had a very hot long summer. And I guess that drains on people... It's not all roses. It's certainly a lot of pressure and a lot of community frustration... and call it what it is: post-traumatic stress disorder or stress from the event. I think that's normal, it's just a matter of understanding that people just don't turn it off. You keep getting reminded, it's in your face every day if you live around here. Realistically it's going to be another couple of years before people really move on from it.' (P12)

'Building and planning is a little bit of a hurdle for anyone, but when they've got all the other complexities of having lost everything and having to try and adjust to the new normal. The new challenges that life's thrown at them. You know, school runs have been affected because they're no longer living at home or they're living in a pod and the stresses of insurance companies. Are we going to rebuild? Aren't we going to rebuild? Can we afford it?' (P11)

'After the last fires, there certainly were a few parents who reached out to me, who wanted me to touch base with their children. And the ones that lost their homes, others that were very close by, and others that that had just added to a general sense of un-ease, I suppose, about life. That was probably partly because it was mixed up with a lockdown as well. So, it added to the anxiety-provoking nature of it all.' (P5)

Ongoing hardship created significant difficulties for many community members, and participants were often insightful and thoughtful about the potential impacts on others. Concerns for the community were compassionate, and often paired with descriptions of efforts to mitigate stress, and to support people as they recovered.

At-Risk Groups

Key groups of concern included children and young people. Caregivers described efforts to provide care for children and adolescents, and their mental health needs were identified as a gap that local governments and agencies have been working to address. As is a common component of recovery, children were described as incorporating fire-related events into imaginative play (including dress-ups, pretending to be a fire-fighter). However, there were concerns noted by participants regarding the need for attention to children and young people's mental health.

'The trauma of the whole thing for my son even though he was [young] and he didn't, I don't think he actually saw the fire... It's still quite relevant for him. And so, my wife and I, we kind of sit and talk to him about it and kind of go through things and let him kind of just talk about it.' (P12)

'Young people who have been traumatized, young people who were suffering because of the pressures at home. Fire season and going back to school, all those little things amplified.' (P11)

School leadership were acutely aware of the impacts for children and young people, and spoke about the ways in which they collaborated with the Red Cross in addressing concerns.

'The Pillowcase Program has been really important. We've also been talking about the Aboriginal seasons and the relevance of fire. It's important for the students to recognise different types of fire and their roles. For example, some kids were worried about fires in the winter last year, so parents lit fires outside so they could hear the crackle and see that it's safe. Preparing for bushfires in the Summer was another trigger for kids.' (P15)

'There's been a few triggers for some of our older kids. And I guess, partly, it's very hard to work out what parts were [due to] the fire, what parts pandemic, or you know, climate change. All those kinds of factors that I think are linking in to make it sort of a stressful time for some school leavers, and those getting near to that. The majority seem like they're managing quite well. There's definitely much more anxiety around.' (P5)

Others noted the need for recovery spaces and services specific to young people's needs:

'I see kids acting up, whether it's in reaction to that fear that it's going to happen again, or for all sorts of reasons. And I guess in that situation, I sort of feel that the only thing you can do is just make sure that there are lots of opportunities to connect, which is really hard for that Wooroloo area because it's a bit remote from everything else. It's a bit isolated and there are not as many activities where kids would just go along to normally.' (P1)

'In relation to the young people, we found it very hard to engage with them early on. Most of the interactions were with their parents there... This was a gap that was identified by the Red Cross and the [Department of] Communities and the City [of Swan]. So we worked with the community development team and at the monthly dinners now we have a specific youth zone... Young people can go and hang out, play Nintendo, have a game of pool, arts or craft... We've also had a series of Summer events, specifically for young people.' (P11)

Call for Mental Health Services and Support

An increase in services and responsiveness of related government departments was noted by some respondents. However, a number of participants called for more mental health services in the area, and greater attention to trauma-informed care. It was highlighted that mental healthcare was important, not only for those who had lost houses, but also the many community members who were affected and continue to be impacted by reminders of the fire: *'it's a delicate and complex thing to be going through'* (P12).

Discussion

This impact evaluation presents clear evidence for the value of preparedness training, and the sustainability of preparedness in supporting psychosocial outcomes following disaster. The delivery of preparedness programs in the Perth Hills community has supported the mitigation of psychosocial risks arising from exposure to repeated and compounding disasters. High levels of household preparedness were evident, although participants highlighted the increasing level of bushfire risk, and reduced opportunity to prepare with changes in climate.

Evaluation findings are synthesised and mapped according to the Australian Red Cross Theory of Change. We set out to evaluate four key outcomes relevant to the evaluation, namely:

- People can cope with the psychosocial impacts of disasters and changing climate.
- Communities are taking localised, community-driven action to build resilience and recover from disaster.
- People feel empowered and in control of decision making
- Services are coordinating and collaborating to meet people's psychosocial needs.

Evidence was associated with other Change Model outcomes also, and further demonstrated the value of the preparedness work facilitated by the Red Cross in the Perth Hills community. Given this, attention has been made to selected outcomes relevant to the evaluation and are circled in Figure 9.

For brevity, relevant outcomes are discussed simultaneously. Commentary provided on the evaluated outcomes is structured in two parts. *Evidence of Impact* describes the effective delivery of the outcome and *Opportunities to Strengthen Delivery* offers considerations as to how delivery could be bolstered to help the Red Cross achieve their overarching goal to see communities that are strong and resilient and have capacity to anticipate, respond to and recover well from disasters.

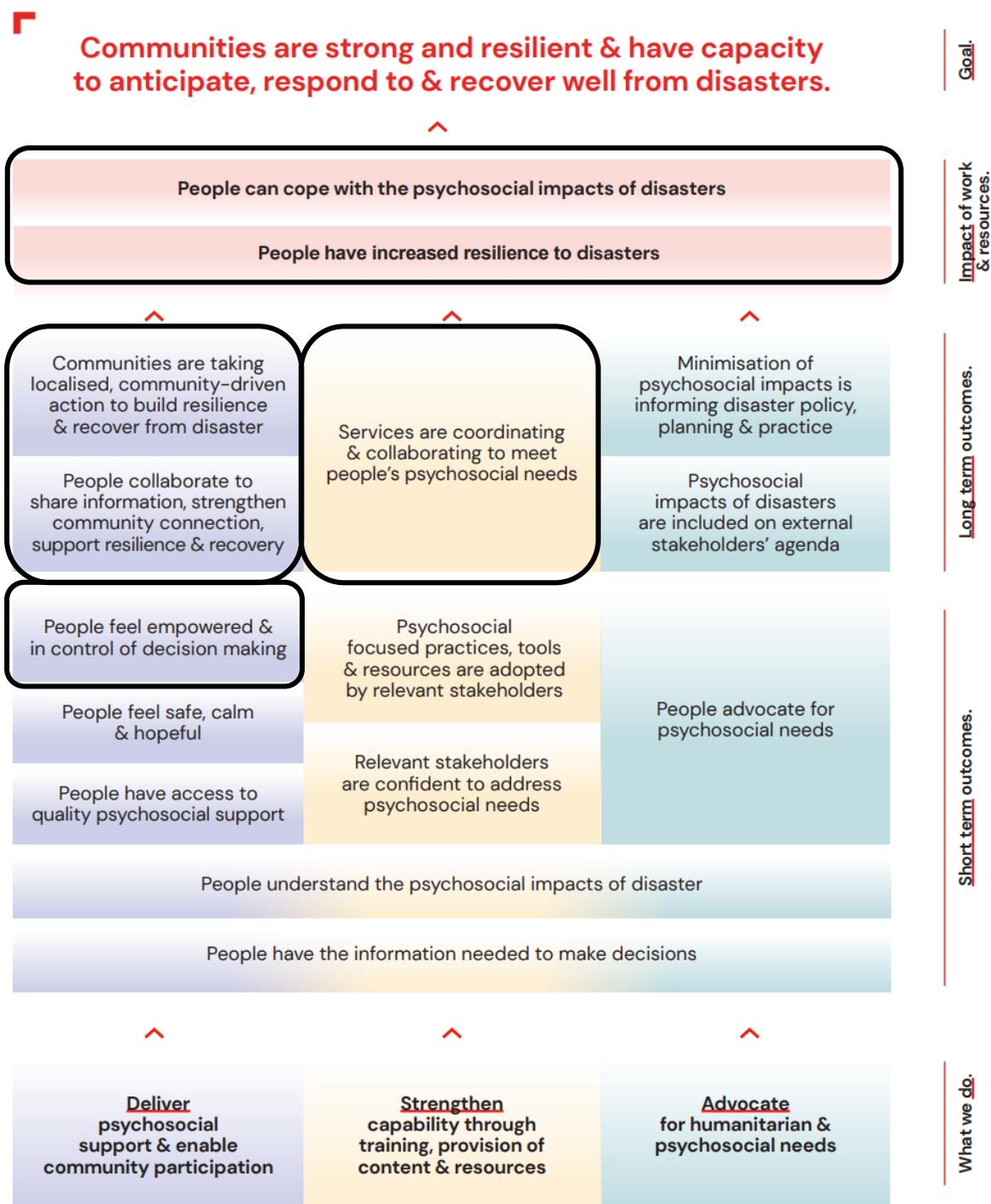


Figure 9. Australian Red Cross Theory of Change Model with evaluated outcomes circled

People can cope with the psychosocial impacts of disasters and changing climate

People have increased resilience to disasters

Evidence of Impact

The study presents significant evidence that Australian Red Cross programs assisted the Perth Hills community in understanding and preparing for the psychosocial impacts of disaster. It was apparent that the psychosocial components of the programming addressed what would otherwise be a gap in preparedness service provision in the region. Interview participants described learning about the psychosocial impacts of disaster and valued this as something special and unique to Red Cross programs.

Among qualitative participants, *Creating a Survival Kit and Documents List* was viewed as a particularly important strategy for preventing community members from becoming overwhelmed during a bushfire emergency. Participants noted that this Red Cross strategy had equipped them to anticipate how they might emotionally respond during a bushfire emergency, and developing a kit resulted in greater confidence that they would be able to cope and save precious items. Among survey respondents, a larger proportion noted the value of creating an emergency plan, and noted that it was valuable in increasing knowledge of what to do in an emergency, increasing confidence, and reducing harm.

Reports of community members' response to recent bushfires acknowledged the necessity of being able to remain calm during an emergency to enact plans and respond to the evolving circumstances. Participants attributed these psychosocial skills to their participation in Red Cross preparedness programs and initiatives, and experience with past bushfires. Recognising and understanding psychosocial impacts appears to help motivate intention to prepare, and support actions. Noteworthy is that participants often described feeling calm, more confident and prepared after attending Red Cross preparedness programs and initiatives.

The Pillowcase Program addresses a critical need for engaging children and young people in bushfire preparedness and was reported by participants as crucial in supporting children and young people's psychosocial wellbeing, for example:

- Engaging in the classroom activities provided children the opportunity to talk peer-to-peer about bushfire preparedness and recovery.
- Affords the opportunity for children to reflect on their own experiences of bushfire and be viewed as an expert of their lived experience by their peers.
- Participation translated to calm, effective action among young people who were required to evacuate during the Wooroloo Bushfires.

The findings provide evidence that the short-term outcomes identified in the Australian Red Cross Theory of Change Model were achieved, for much of the community. Namely, that people understand the psychosocial impacts of disaster, and that people feel calm, safe and hopeful. However, the findings revealed additional needs for access to psychosocial support in the recovery phase.

Opportunities to Strengthen Delivery

The findings indicate that the Australian Red Cross preparedness programs fill an important gap in psychosocial preparedness for emergencies. It will be vital that the Red Cross resources and training continue in the community, and ongoing skills training in psychosocial preparedness be supported.

Despite evidence of community members' calm, responsive, and competent emergency actions, the findings indicate that there are significant and substantial mental health needs to be addressed.

Reports of post-traumatic stress symptoms were common in the qualitative data, as were feelings of guilt and sadness. The preparedness programs supported psychosocial coping in the short and medium term, but current reports suggest that long-term mental health concerns will require sustainable psychological services. The survey findings indicated that mental health difficulties were the greatest ongoing concern following recent bushfires. Broader access and engagement with the preparedness programs will be important for whole-of-community psychosocial resilience. Australian Red Cross Emergency Services are supporting communities, local government, businesses and agencies to navigate the recovery space, and ensure that initiatives delivered in bushfire-affected areas are trauma-informed. The findings indicate a substantial need for long-term recovery programs to be delivered in the community, and that further advocacy and support for mental health services, including for children and young people, will be needed.

Communities are taking localised, community-driven action to build resilience and recover from disaster

People collaborate to share information, strengthen community connection, support resilience and recovery

Evidence of Impact

A high level of community connectedness was evident, and close social networks supported preparedness, response, and recovery. Participants valued community support and described the importance of these relationships as being akin to those they held with family. This shared community identity was reflected in participants' high level of risk perception that in turn appeared to contribute to the community perceived value in, and necessity for, a local approach to preparedness, response, and recovery. The survey data complemented this theme, with high levels of community connectedness and belonging reported.

The Red Cross's encouragement of collaborative community driven action was evidenced in how participants offered explicit individual and community level examples of strategies enacted across the disaster cycle that were informed by Red Cross programs and initiatives. Many Perth Hills community members reported working collaboratively in disseminating information and encouraging adoption of Red Cross preparedness strategies, with some community volunteers particularly active in bushfire preparedness, response, and recovery. Such individuals worked diligently in not only ensuring their own bushfire preparedness, but in supporting others in their community by disseminating Red Cross preparedness information (e.g., sharing Australian Red Cross messaging via social media, sharing Pillowcase practices with siblings, volunteering in outreach), in initiating conversations and engaging in strategies to encourage others to similarly engage in preparedness (e.g., talking to neighbours and developing a phone tree, discussing plans regarding evacuation/defence etc.). Such practices demonstrate the mid- to long-term effectiveness of the work by the Red Cross, and the longevity of program initiatives.

However, at times participants also referenced a level of discord and potential disconnection experienced within the Perth Hills community, further reflected in the survey data. Although participants rarely reported feeling like an outsider, many endorsed that some groups within the community kept to themselves. Among qualitative interview participants, concerns related to patterns in social media use, and a sense of frustration with neighbours' ambivalence for preparedness. Further concerns were raised over the dependence and demands placed on the facilitators of community social media groups, and for aggressive posts and comments. In response, some smaller closed groups have formed as a means of protecting impacted individuals from unwelcome dialogue.

There were also concerns raised regarding more isolated members of the community, for example those who may not have the resources or inclination to use social media, or who may need additional support in actioning preparedness measures, or recovery from the bushfires.

Opportunities to Strengthen Delivery

The strong social cohesion described within some parts of the community will support ongoing sustainability of the Red Cross preparedness messaging. Building on community connections and established social groups to deliver preparedness programs presents an opportunity to deliver messages to people who have not yet contemplated preparedness actions. Community-driven action provides multiple perspectives and peer-led experience that a number of participants described as helpful in tailoring the preparedness information. It will be important that the Red Cross seeks to broaden community engagement, to ensure that more marginalised or isolated individuals are supported in engaging with the sessions and materials. The need for more inclusive practices was raised by participants, and was evident in the homogeneity of the sample. It may be valuable to expand on current practices of reaching out to established community groups and services to reach less-prepared community members. Engaging with high schools, services for new migrants, parents' groups, and religious services will broaden access and delivery of preparedness messages.

People feel empowered and in control of decision making

Evidence of Impact

There is evidence that Australian Red Cross preparedness programs assist Perth Hills community members in making informed decisions regarding bushfire preparedness and when experiencing an emergency. Reports from community members indicated that creating a plan, developing a kit, and practicing psychosocial skills supported calm and competent responses during the Woorloo Bushfire. However, many participants reflected on the plethora of preparedness information available to them, noting that the information across the different support agencies and governing bodies was at times contradictory and confusing. Despite this, specific Red Cross programs and initiatives were valued by participants; evidence of their impact is noted as follows.

The Pillowcase Program addresses a critical need for engaging children and young people in bushfire preparedness and was reported by participants as impacting decision making in the following critical ways:

- Normalises children and young people as being a part of bushfire preparedness, recognising them as having the capacity, interest, and necessity to also make preparedness decisions.
- After completing the program, some children were noted to have initiated bushfire preparedness conversations and actions at home with their parents and siblings.
- Assists parents and caregivers in determining how to engage their children in age-appropriate and meaningful bushfire preparedness within the home.
- Retention of the skills developed appears long-lasting with some teenagers noted to either still use their pillowcase, or, at the very least still adopt principles of the program (e.g., prepare by identifying and packing special things, remaining calm during an emergency).

RediPlan Community Preparedness Programs were recognised by participants as central to ensuring their household's bushfire readiness. Although not all participants were able to specifically name the Red Cross program they had participated in that prompted making a plan, participants readily attributed the Red Cross as contributing to having the information necessary and for supporting them in their intention to prepare for disaster.

Creating a Survival Kit and List was noted by most participants as an important part of their bushfire preparedness. The strategy was evidenced to inform intention to prepare in the following ways:

- Prompting households to engage in conversation as to what was deemed special.
- The impact of the strategy appears to have longevity as some participants reported reflecting on, updating and changing their list over time.
- Many participants spoke of the value in having a list and kit, which enabled them to stay calm and respond effectively during the Wooroloo Bushfire.

The combination of findings highlights the psychosocial benefits of preparedness, and community capacity to make effective decisions based on the information available.

Opportunities to Strengthen Delivery

Building a local volunteer base would support localised training delivery, and expansion of the Pillowcase Program in schools. Some school staff indicated a desire for local teaching staff to be trained in delivering the program, which would minimise organizational challenges each year. Additionally, while the expertise of Red Cross facilitators was valued, opportunity for local delivery of the program would afford community further agency.

Given the emphasis on household discussions in the data, and few reports of written plans, it may be useful to shift attention towards *ongoing discussion* of household preparedness. Providing a range of tools and resources online, and continued engagement with community events may foster additional conversations. Promotion of preparedness materials during recovery outreach will be important as preparedness and recovery periods increasingly overlap.

Services are co-ordinating & collaborating to meet people's psychosocial needs

Evidence of Impact

Community members' experiences of preparedness training and events reflected high levels of collaboration between the Australian Red Cross, local governments, volunteer fire brigades, and schools. The high level of coordination between Red Cross and local organizations was recognized and appreciated by many community members. Delivery of the Red Cross Pillowcase Program through schools, and psychosocial preparedness messaging at local fire brigade events were seen as particularly valuable and supported longer-term retention of knowledge. Opportunities to ask questions with a range of experts and fellow community members who were already engaged in preparedness activities was highlighted as a strength of collaborative practices. However, this collaborative strategy at times resulted in confusion regarding the source of messaging – with participants noting Red Cross preparedness actions and decisions, but voicing a lack of clarity regarding their source.

Opportunities to Strengthen Delivery

To bolster the effectiveness of Australian Red Cross preparedness information provided to the community, there may be value in investing further in inter-agency coordination. Building on the already strong history of the Red Cross successfully working alongside DFES, the fire brigades, and local government, heightened collaboration will help to ensure greater consistency in preparedness messaging communicated across the agencies. Heightened inter-agency collaboration may be particularly important given the way in which preparedness, response and recovery appear to be changing. For example, there appears to be increasing incidence of Perth Hills community members experiencing multiple hazards simultaneously or in short succession. Additionally, climate change is influencing the community's opportunity and time frame to engage in preparedness work, and phases of disaster response appear less distinct and more likely to overlap.

The Pillowcase Program is very well received by currently engaged schools in the Perth Hills community. There is ongoing demand for program facilitation, and it is perceived as highly relevant, necessary, and of high quality by participating schools. In addition, delivery of the Pillowcase Program has cascading effects for household preparedness and acts as a catalyst for whole-of-community preparedness. There has been suggestion for further integration of Pillowcase into the curriculum. In parallel, it was suggested that there may be benefit in developing a 'train-the-trainer' program to allow appropriate teachers and school staff to facilitate delivery to students.

Conclusions

The Wooroloo Bushfires had devastating effects for much of the Perth Hills community. Disaster preparedness, driven by Australian Red Cross Emergency Services in collaboration with local governments, schools, fire brigades and state agencies, have supported household readiness for bushfire, enacted by community members. These findings indicate the long-term value in supporting community preparedness, and that strategies for psychosocial preparedness, delivered within an all-hazards framework, were successfully applied during the Wooroloo Bushfire. Investment in child and adolescent preparedness is particularly valuable, with long-term application of skills, and transferability to other members of the household. Community connectedness has supported the translation of messages across mediums (including via social media), and to less-engaged members of the community. Accordingly, we propose that the preparedness programs be expanded through community-led delivery, advocacy, and strengthened co-ordination of services.

Key Recommendations



1. **Australian Red Cross community preparedness training be continued** in the Perth Hills, with opportunities established for community-led delivery.



2. **Broaden access and inclusion**, by developing links with community groups and tailoring strategies to reach more isolated individuals within the community.



3. **Expand the Pillowcase Program** through a teacher training program, building a local volunteer base, or by embedding the program within the primary education curriculum.



4. Support greater **co-ordination of services and agencies** to reduce conflicting information and support a unified community-based approach.



5. **Advocate** for local and state government investments in community psychosocial preparedness, by funding household preparedness skills training and community events. **Advocacy for greater climate action** will be critical to support communities at high risk of repeated and compounding disasters.



6. **Support mental health initiatives** to ensure long-term recovery supports are delivered, and trauma-informed, evidence-based services are available to the community.

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