FISEVIER

Contents lists available at ScienceDirect

International Journal of Disaster Risk Reduction

journal homepage: www.elsevier.com/locate/ijdrr



Are you ready? Emergency preparedness in New Zealand schools



Karlene Tipler^{a,*}, Ruth Tarrant^b, David Johnston^a, Keith Tuffin^b

- ^a Joint Centre for Disaster Research, Massey University, PO Box 756, Wellington 6140, New Zealand
- ^b School of Psychology, Massey University, PO Box 756, Wellington 6140, New Zealand

ARTICLE INFO

Keywords:
New Zealand
Schools
Emergency preparedness
Plans
Drills
Stakeholders

ABSTRACT

Schools have a responsibility to ensure that students in their care are kept safe during and after emergency events. This paper describes the results from a survey that explored the emergency preparedness activities of 355 New Zealand schools. The survey identified current preparedness levels for schools, the majority of which had undertaken a range of emergency preparedness activities such as developing plans, conducting drills, and providing hazards education to students. However, differences exist between schools in the extent of their emergency preparedness efforts, suggesting that many schools may be under-prepared to respond to future emergencies, especially if that response requires family reunification. The study also provided evidence to support the premise that previous emergency experience increases preparedness. The findings identified a need for clarification of the legislative requirements of schools, and also support the establishment of benchmarks and standard operating procedures for emergency preparedness activities to ensure consistency across schools. In addition, increased engagement with stakeholders, both parents and emergency management practitioners, is suggested to enhance school preparedness efforts. The present study is expected to inform policy decisions relating to school safety in New Zealand, suggest priorities for future school-based emergency management efforts, and contribute to international school safety research.

1. Introduction

Children are identified as among the most vulnerable populations during a disaster, particularly if they are attending school at the time [70]. As a result, the well-being of children at school has been a focus of global safety efforts. The Hyogo Framework for Action 2005–2015 [71] and the Sendai Framework for Disaster Risk Reduction 2015–2030 [72], have prioritised the safety of school sites, children's continued access to education, and the use of education to assist countries in improving their disaster risk reduction efforts [59].

School safety efforts have been further enhanced by the Comprehensive School Safety framework [17], which has integrated international research from within the education sector. The Comprehensive School Safety framework has provided the global education sector with guidance on disaster risk reduction by identifying strategic goals and priorities to consider when planning for the safety of students at school, and children's continued access to education after disasters. Three pillars provide the foundation for the Comprehensive School Safety framework: (1) safe school facilities; (2) school disaster management; and (3) risk reduction and resilience education. Each pillar includes a range of preparedness activities that can be undertaken prior to disasters and emergencies to ensure the safety of students (e.g.,

retrofitting buildings to make them earthquake safe, developing emergency plans and testing them in drills, and integrating hazards education into school curricula). The Comprehensive School Safety framework reflects the priorities of both the HFA and SFDRR. All three frameworks provide inter-related instruments to guide government policy and planning within the education sector.

Schools are focal points within communities as they provide a direct link with children and families [51]. In addition to their primary role as education providers, school leaders also have responsibilities to ensure that students are provided with a safe learning environment and protection should an emergency occur while students are at school (e.g., [4,70]). This duty-of-care responsibility necessitates that schools develop emergency plans safeguarding student (and staff) safety (e.g., [8]), including having student release and family reunification procedures in place that ensure children are returned to their custodial parent in an emergency [18]. Schools can also have a significant role in helping students, their families, and the community recover from emergencies and disasters by providing a stable and familiar environment for students, allowing them to re-establish some of their core routines (e.g., [44,52]).

A vast amount of information is accessible on the internet to aid schools with their emergency preparedness efforts, most commonly in

E-mail addresses: K.S. Tipler@massey.ac.nz (K. Tipler), R.A.Tarrant@massey.ac.nz (R. Tarrant), D.M.Johnston@massey.ac.nz (D. Johnston), K.Tuffin@massey.ac.nz (K. Tuffin).

^{*} Corresponding author.

the form of checklists and templates, often with little or no supporting evidence. Less common, but arguably more useful to schools are the guidelines and advice provided by government agencies (e.g., [73]) or United Nations affiliated organisations (e.g., [21]). For the most part, preparedness advice to schools encourages the development of emergency plans, response training to staff, frequent emergency drills, and the evaluation of school-based preparedness efforts.

In contrast to the plethora of information available on what schools should be doing to prepare for emergencies, the research examining the nature and levels of emergency preparedness efforts in schools is limited. The majority of research has been conducted in the USA. However, since the mid-2000s more of an international perspective has developed with studies available from: the UK and Europe (e.g., [31,75]); the Middle East (e.g., [19,37]); Asia (e.g., [13,60]); and Australasia (e.g., [5,28]). In addition, researchers in the USA have moved their attention from a focus on school preparedness at a state or district level (e.g., [6,7,61]) to collecting data from individual schools (e.g., [30,47]) in an effort to more accurately reflect actual school-based preparedness levels

The international research to date, has identified common weaknesses relating to preparedness across schools and school districts including: content of emergency plans varying greatly between schools, districts, and states (e.g., [5,74]); limited testing of plans through emergency response drills (e.g., [18,47]); little evaluation of emergency preparedness activities (e.g., [19,23]); and a lack of collaboration between schools and their stakeholders (e.g., parents, emergency management agencies) when preparing for emergencies (e.g., [1,3]). As a result of these variations in preparedness, it is possible that not all schools have the capabilities to respond effectively to an emergency event, to ensure student safety.

1.1. Emergency management in New Zealand schools

In New Zealand, historically school-based emergency management has had a relatively low profile. Early research focused on students' access to and participation in school-based hazards education programmes (summarised in Ronan et al. [54]). Due in part to the 2010–2012 Canterbury New Zealand earthquakes, attention given to emergency preparedness in New Zealand schools has experienced somewhat of a renaissance. The Canterbury earthquakes reinforced the importance of ensuring schools are adequately prepared to respond to both large and small-scale emergency events. As a result, school leaders throughout the country sought advice from their colleagues in Canterbury about preparing for and responding to emergencies [12,68].

The earthquakes also acted as a catalyst for researchers wanting to gain insights into how schools could be better prepared to respond and recover from future emergencies. There have been several studies undertaken with Canterbury schools exploring: preparedness for students with special needs [55,56]; the influence of the earthquakes on curriculum-content [22,67]; and how staff and students responded to and recovered from the earthquakes (e.g., [16,38,40,46]).

In parallel with research undertaken in Canterbury, another small group of researchers has looked at New Zealand school-based emergency management efforts outside the Canterbury region. Several of the studies have examined preparedness, in particular hazards education programmes (e.g., [25,53]), and emergency drills (e.g., [27,68]). In addition, two studies have explored how schools responded to specific emergency events, in an effort to learn lessons from their experiences. Stuart et al. [63] investigated the experiences of eleven school principals who were required to temporarily close their schools in response to an emergency (i.e., H1N1 influenza outbreak – 4 schools; a winter snow storm – 7 schools). Tarrant [64–66] has produced a series of articles exploring leadership, and faith in a school tragedy where six students and a teacher died during an outdoor adventure fieldtrip.

There is no doubt that schools care for the welfare of their students on a daily basis, but it is uncertain whether schools are also adequately

prepared to respond effectively in an emergency event. To date, only two small studies, both set in the Wellington region, have explored aspects of school preparedness in New Zealand. Coomer et al. [9] surveyed 101 school principals regarding hazards education programmes conducted in their schools. The survey also included general preparedness questions. For example, principals were asked if they: discussed emergency procedures with students; conducted emergency drills; had emergency supplies (e.g., food and water) on site; and engaged with external stakeholders (e.g., Civil Defence and Emergency Management practitioners). The second more recent survey [28] conducted with principals and teachers from 17 schools located in potential tsunami inundation zones around the Wellington region, explored what tsunami preparedness activities were undertaken in their schools. Findings from both Wellington-based surveys echo what is seen throughout the international literature - schools vary in the extent and type of their preparations for emergencies, and as a result may be under-prepared to keep their students safe in an emergency.

These two Wellington studies have provided some insights into potential response capabilities of the schools surveyed, but more information is needed. Therefore, the aim of the present study was to determine if New Zealand schools were ready to keep their students safe in emergencies by investigating current preparedness levels. Such an investigation was expected to identify gaps and weaknesses in existing practices. In addition, knowledge of existing preparedness levels could be used to inform policy decisions and suggest priorities for future school-based emergency management efforts.

1.2. Research questions

- What types of emergencies have schools experienced?
- What emergency preparedness activities are undertaken in schools?
- What methods do schools use to evaluate their emergency preparedness?
- To what extent do schools engage with stakeholders to assist their emergency preparedness?

2. Method

2.1. Background to the present study

On September 26th, 2012, a nationwide earthquake drill, the '2012 New Zealand ShakeOut', coordinated by the Ministry of Civil Defence and Emergency Management (MCDEM), was conducted to enhance preparedness and response capabilities of New Zealand communities [42]. The New Zealand ShakeOut was based on the very successful 2008 Great Southern California ShakeOut earthquake drill, which has subsequently resulted in millions of people globally participating in annual community-wide earthquake drills [57]. The New Zealand ShakeOut exercise was promoted to businesses, schools and individuals through an extensive multi-media campaign including mainstream and social media, paid advertising, government communication networks, and a dedicated ShakeOut website. As a result, more than 1.3 million people took part, almost one-third of the country's population (New Zealand population: 4.43 million – [62]).

Schools in particular were targeted by organisers, and encouraged to register their participation on the official New Zealand ShakeOut website. By registering, schools received regular ShakeOut updates and tips to help them prepare for the exercise. When registering, schools were asked if they would be willing to be contacted by a researcher after the exercise. The 2012 ShakeOut exercise, involved in excess of 2000 schools (< 80% of all New Zealand schools), representing more than 650,000 staff and students [34]. The exercise provided an unprecedented opportunity to gather survey data from throughout New Zealand to investigate the emergency preparedness activities currently undertaken in schools. Approval for the present study was granted by the Massey University Human Ethics Committee.

Download English Version:

https://daneshyari.com/en/article/7472269

Download Persian Version:

https://daneshyari.com/article/7472269

<u>Daneshyari.com</u>