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Committee Civil Defence Emergency Management Group
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Community Preparedness Survey 2010

1. Purpose

To inform the Civil Defence Emergency Management (CDEM) Group of the results of the recently commissioned community preparedness survey.

2. Background

Over a four-year period between 2004 and 2007, the Greater Wellington Regional Council (GW) commissioned Peter Glen Research to undertake an annual telephone survey (usually in May) among a random cross-section of residents 16+ years of age. The purpose of the survey was to gather information that could help quantify the Region's level of preparedness for a major civil defence emergency.

The primary objectives of this research are:

- To gather information to help quantify progress towards specific goals set in the *GW Long-Term Council Community Plan (LTCCP)* and the *Wellington Region Civil Defence Emergency Management Group Plan*.
- To obtain an updated measurement of public awareness, attitudes and behaviour relating to their preparedness for a major emergency, against the benchmark results obtained in 2004.
- To gather new insights from the public on the information sources they would likely use in the event of a major emergency, as well as preferred media for information about preparing for an emergency.

3. Methodology

3.1 Sample size and scope

The research was undertaken among a randomly selected sample of n=1,100 residents aged 16 years or older who live in the Wellington Region. This sample size also enables results to be analysed with a degree of confidence at sub-region level.

3.2 Method of contact and sample selection

The survey was undertaken by way of telephone interviewing using a structured quantitative research questionnaire. Residents were recruited by way of random telephone enrolment, using the local telephone directories as the sampling frame.

The margin of error associated with this survey is ± 3 percent for 50 percent at the 95 percent confidence interval.

3.3 Timing

Fieldwork for the research was conducted from 21 March to 15 May 2010.

4. Recommendations from 2007

The following recommendations were identified following the 2007 survey results. Progress on these recommendations is identified (in *Italics*) below:

- The results show that there is a need to continue to and further develop public information that includes the potential impacts or consequences for each hazard, in an attempt to try and reach those that do not feel that the risk posed by hazards is specific to them and are therefore complacent in adopting preparedness behaviours (Apathy). Magnitude and frequency of information may also need to be included for some hazards, particularly for those hazards that occur relatively frequently such as once every 50 to 100 years.

Update - This is an extremely difficult issue to address, particularly as there have not been any significant events over the past three years. There have been many tsunami warnings, which have not eventuated and there has also been a lack of large flooding events. This tends to reduce the public's perception of the risks they face. Adopting an "all hazard" approach to our public education messages impresses upon the public that they need to be prepared for all types of emergencies, but in reality "out of sight, out of mind" is a very real issue for emergency management.

- Fatalism also accounts for approximately 10 percent of those that were not prepared. Therefore, it is essential that residents feel empowered, i.e., they can take action and have some control over how an event may impact on themselves and their family.

Update - All public education campaigns and publications now have a more positive slant. Instead of identifying all the negative impacts of a disaster, we are now encouraging community resilience and focusing on the benefits of being prepared. The use of visuals has also changed, with "death and destruction" pictures no longer used in preparedness messaging.

- The household emergency plan is an area that will continue to need to be pushed in public education, as this has shown to have low recall and action. Such measures may include a continued push on how events are

just as likely to happen when residents are at work as at home and highlight the consequences of not having one in place.

Update - Over the past few years many of the publications have focused on planning. The most significant push in this area is the development of the new “It’s easy! Get prepared for an emergency” booklet. This is a step-by-step planning booklet that households can work through to get prepared. This booklet is simple and easy to use and includes essential information to reduce information overload and encourage those who have found time a barrier to get prepared.

5. Major hazards in the Wellington Region

5.1 Awareness of major hazards

Residents were asked to recall at least one hazard that might affect the Region. Not surprisingly earthquakes was most often recalled (95 percent) followed by floods (42 percent) and tsunami (41 percent). Interestingly, the spontaneous recall of flooding has continued to decline since 2004, which is likely to be attributed to the absence of a large flood event since 2004.

Hazards	Year	Most top-of-mind (i.e. recalled first)					Freely recalled				
		2004	2005	2006	2007	2010	2004	2005	2006	2007	2010
		%	%	%	%	%	%	%	%	%	%
Earthquakes		63	68	64	63	73	87	95	93	89	95
Floods		27	20	20	17	11	76	67	66	61	42
Slips/landslides		4	2	2	4	1	28	15	17	21	10
Fire/Bush Fires		1	1	1	2	x	19	21	17	17	18
Tsunami/Tidal Wave		-	5	11	6	6	12	37	47	40	41
Hurricanes/cyclones/major storms		1	1	x	1	1	7	12	11	15	21
High winds		-	-	-	1	x	6	18	15	19	8
Terrorism		1	-	-	x	x	5	1	2	5	2
Major power blackouts		-	-	x	3	2	5	9	7	12	7
Pandemic (H1N1)		-	-	-	1	1	-	-	11	5	2
Miscellaneous hazards		1	1	2	2	4	12	8	7	4	13

5.2 Perceived impact of major hazards on people

Residents were asked to rate the level of *effect* a particular hazard would have on themselves and their family. The rating scale used was a five point scale where one was “a minimal effect” and five was “an extremely large effect”. The hazards that were included in this survey were the six hazards that pose the most significant risk to the Wellington Region in accordance with the *Wellington Region Civil Defence Emergency Management Group Plan*.

The results suggest that, whilst the majority of the population in the greater Wellington Region are concerned about the possible impact of an earthquake, a substantial percentage believe that the other major hazards are less likely to affect them.

T This highlights the need for continuing an “all hazards approach” to public education identifying the effects that all major hazards could have on the people of the Region.

Major hazards	% Rating “4” or “5” (i.e., a large or extremely large effect?)	Average (mean) rating given	% Rating “4” or “5” (i.e., a large or extremely large effect?)	Average (mean) rating given
	%		%	
Earthquake	81	4.3	86	4.4
Pandemic	50	3.4	56	3.6
Storm	43	3.4	36	3.1
Flooding	41	3.1	36	2.9
Landslide	39	3.0	36	2.8
Tsunami	31	2.7	34	2.7

5.3 Public information about hazards

Seventy-seven percent of residents in the Greater Wellington area currently consider themselves “very” or “quite well informed” about the major hazards that could affect their region. This is up slightly on the 74 percent recorded in 2007.

Area:	Well informed	Not well informed
	%	%
Kapiti	83	17
Upper Hutt	80	20
Wairarapa	79	21
Lower Hutt	76	24
Wellington	76	24
Porirua	74	26
Region	77	23

Interestingly, younger residents in the 16 to 29 years age group (61 percent *well informed*) continue to regard themselves as less well informed compared to older residents (78 percent 30 to 49 years and 85 percent 50+ years *well informed*).

6. Preparedness

6.1 Perceived public preparedness

There has continued to be an upward trend in the overall percentage of residents that consider their level of preparedness to be ‘good’ or better, with two-thirds giving this rating.

Year of survey	Level of preparedness	
	"Good" or "better"	"Fair" to "very poor"
	%	%
2004	56	44
2005	59	41
2006	63	37
2007	65	35
2010	68	32

Again, those aged 16 to 29 years consider themselves less prepared for an emergency (44 percent "good or better") compared to older residents (67 percent 30 to 49 years, 82 percent 50+ years "good or better").

6.2 Items needed to survive an emergency

Residents were asked to identify what items they felt they would need to survive a major emergency¹. Positively, when asked to recall emergency survival items, both food and water recorded high levels of spontaneous recall (93 percent and 92 percent respectively). Over three-quarters of residents (80 percent also mentioned other emergency supplies and equipment (does not include food and water). Unfortunately, only 12 percent were able to recall the household emergency plan.

Residents were then asked whether they had each of the four main emergency survival items (food, water, other supplies and equipment, and a household emergency plan)². As with the spontaneous recall, food (72 percent), water (71 percent) and other emergency supplies and equipment (77 percent) were most often identified as currently available in the household specifically for use in a major emergency. Surprisingly, the proportion of household emergency plans was higher for actual completion (39 percent) (residents have these plans in place), compared to spontaneous recall (12 percent). This is probably because of many of these plans being in the form of a *verbal agreement* between household members.

The GW LTCCP targets for 2009-2019 are that 80 percent of all households will have food and water supplies. The GW Annual Plan (2010/2011) provides short-term targets of 75 percent of all households having food and water supplies. We will endeavour to meet these targets with the implementation of the 2010/2011 Public Education Programme.

Percentage of households that to have:	2004 %	2005 %	2006 %	2007 %	2010 %
Emergency food supplies	61	65	70	72	72
Emergency water supplies	68	69	71	71	71
Other emergency supplies and equipment	69	69	75	74	77
An Emergency Plan for the household	31	26	27	38	39

¹ This question was unprompted; therefore all responses that were given were recalled and not a "yes or no" answer when asked.

² This question was prompted with each resident asked whether they currently had water, food, other supplies and equipment, and a household plan specifically intended for the use during a major emergency.

Residents who did not have a particular survival item were asked why they did not have each of these items. Across all items *not getting around to it and haven't thought about it* were the main reasons provided.

It seems that many of the “barriers” to preparation remain “attitudinal” in nature. That is, people do not act, because they are complacent, unaware, or not cognitively engaged with the risks that exist in relation to a possible major emergency.

This reinforces the need to educate and remind people of the severity of the impact that could occur and the risks that exist by not being prepared.

7. Information sources

7.1 Emergency preparedness information

Residents were read a list of possible information sources that could be used to inform the public on a **regular, ongoing basis** about preparing for a major civil defence emergency. They were asked to select the preferred channels for this purpose.

Opinion varied but the overall order of preference that emerged was as follows:

Preferred source of ongoing information	Total %
	%
Brochures and pamphlets	38
Letters in the mailbox	36
Radio broadcasts	22
Internet messaging	19
Newspaper articles and advertising	19
An emergency preparedness website	13
Text messaging	8
Television	8
Other sources	7

Not surprisingly, 16 to 29 year olds recorded a higher level of preference for the use of the internet and websites compared to older residents. However, overall they still preferred brochures and pamphlets and letters in the mailbox.

Interestingly, the Yellow Pages only recorded 3 percent indicating that this is not used as thought. Every year GWRC invests a significant amount in Yellow Pages advertising compared to other methods. This may need to be reviewed to ensure a better return on investment.

7.2 Verification of emergency information

Residents were next asked to freely identify the *main* and *secondary sources of reliable information* that they would use to confirm a major emergency,

such as a tsunami warning. **Radio** emerged as the most prominent source, with **television**, the **internet** and **word of mouth** also gaining significant mention.

The full range of choices was as follows:

Information sources that would be used to <i>confirm a major emergency such as a tsunami</i>	Main source %	Second choice %
Radio broadcasts	60	20
Television	13	17
Internet	11	11
Word-of-mouth (including friends, family, neighbours)	2	13
Telephone/telephone alert/cell phone	1	9
Text messaging	5	3
Civil Defence	3	5
The emergency services (police, fire, ambulance)	2	5
Other	3	7

As with the preparedness information 16 to 29 years olds recorded, a higher level of preference for the use of the internet and websites compared to older residents. However, radio was still clearly their most preferred source for verifying information.

7.3 Other emergency information

Residents were asked to then choose the information sources that they would use to keep themselves informed for other emergencies, such as a major earthquake. Again, radio featured most prominently, with other sources being nominated in the following order:

Information sources that would be used for <i>other emergencies, e.g., a major earthquake</i>	Total %
Radio broadcasts	74
Word-of-mouth (friends, family, neighbours)	13
Telephone/cell phone	12
Television	11
Internet	8
Text messaging	4
The emergency services (police, fire, ambulance)	3
Civil Defence	3
Newspaper articles and advertising	3
Local council	2
Other	3

The results of the information sources highlight the importance of radio in emergency management, both in terms of preparedness and during an emergency.

8. Conclusions and future actions

The 2010 survey results have revealed that further progress has been made on community preparedness for a major civil defence emergency in the Greater Wellington Region. Key results that reflect this progress are:

Seventy-seven percent of the survey participants considered themselves “very” or “quite well-informed”, which is up on the 74 percent recorded in 2007.

Sixty-eight percent of residents now consider their level of preparedness to be ‘good or better’, up from 65 percent in 2007.

Over 70 percent of householders claim to have emergency food, water and other supplies, and equipment that are intended for use in a major emergency. These figures remain similar to the 2007 results. However, the average number of supplies has increased to 9.2 items, up from 8.9 in 2007.

There is a marked difference between the perceived risk from an earthquake and all other major hazards. This is likely to have occurred as there has been an absence of events (such as a major flood) over the past five years.

Future actions - It is essential that all public education materials persist with an all hazards approach, to continue to raise awareness amongst the general population. Where possible, anniversaries or events outside the Region could also be publicised to illustrate that such events can happen.

The number of households who have a household emergency plan is still low compared to water, food and other survival items. Whilst this has gradually increased over time, the household emergency plan is not readily identified as being part of the actions required to get prepared.

Future actions - “It’s Easy! Get prepared for an emergency” booklet was developed in June 2010 to address this issue. As this booklet makes its way into the community, this should increase not only awareness but also the completion of the household plans. For this to be successful, it is important that all territorial authorities promote this booklet, and make it readily available to the public.

New information has been gathered in the latest survey regarding preferred sources of information both for preparedness and during an emergency. Radio has emerged as the constant, with all residents indicating this was their preferred source of information during an emergency and rating highly behind brochures and mail drops for preparedness information. Only a very small proportion of residents indicated they would use the Yellow Pages for any type of information.

Future actions - A significant amount of money is put into Yellow Pages advertising each year and, in light of these results, this money would be best used on other forms of media. For example, regular radio advertising across key regional radio stations where a variety of messages can be rotated and changed depending on what is happening at the time. This flexibility in the

messages will help to achieve one of the above recommendations regarding publicising anniversaries and events that occur outside the Region.

9. Recommendation

That the CDEM Group:

- 1. **Receives** the report*
- 2. **Notes** the content of the report.*

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