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## **Extending a Helping Hand in Child-Centered Disaster Preparedness**

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# **Extending a Helping Hand in Child-Centered Disaster Preparedness**

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## **Abstract**

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Eastern Visayas State University (EVSU), Tacloban City, Philippines has a strong formal partnership with Save the Children, an International non-government organization, in technical assistance and capability building program for Local Disaster Risk Reduction Management Officers (LDRRMO's) to help communities avert loss of lives during the occurrence of natural hazards. This study employed a descriptive research design to determine the usefulness and applicability of the EVSU-initiated extension activity on mentors' capability building on comprehensive Community-Based Disaster Risk Reduction Management (CBDRRM) which highlighted the role of children in Barangay (village) DRRM plans. Through a survey questionnaire it was found out that 71% of the respondents strongly agree that the approach was useful in understanding the situation of the children during emergencies, 62% strongly agree that they understood the basic rights of a child anchored on the United Nations Convention on the Rights of Children and how this can be protected during disasters, while 57 % strongly believe that they can apply what they have learned. However, only 10% strongly feel that they have resources and equipment to roll out to the barangay level what they have learned in the activity. Therefore, the mentors' capability building initiative is useful and applicable but there is a need to generate more resources to be effective in their ability to mentor LDRRMOs in CBDRRM Planning.

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**Keywords:** child-centered, disaster, capability building, Tachloban City, Philippines

# **Echar una Mano en la Preparación Centrada en la Infancia Desastres**

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## **Resumen**

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Este estudio evalúa los predictores sociales, políticos, económicos, y relativos al tráfico y viajes del número de efectivos de la policía estatal en Estados Unidos de 1981 a 2015. Mis estimaciones, según el modelo de efectos fijos, y basadas en diversos análisis de 1.635 casos, indican que los acercamientos teóricos fundados en la teoría de amenazas raciales, y la política partisana y de género explican en parte la variación en estos números. Mis hallazgos sugieren que los cambios en la densidad de población, la base imponible, el porcentaje de población sin título de bachillerato, el índice de crímenes violentos, y el gasto en prestaciones sociales a nivel estatal, así como las fluctuaciones en los números de la policía local, también influyen en los números de la policía estatal durante este periodo. Sorprendentemente, las fluctuaciones en el número de fatalidades en accidentes de tráfico estatales por millón de millas viajadas, y el número de carnets/licencias de conducir por 100.000 habitantes del estado—dos factores relativos al tráfico o viajes que parecen importantes—no tienen ningún impacto en los números de la policía estatal.

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**Palabras clave:** policía estatal, patrulla estatal, efectivos policiales, vigilancia policial, control social

**A**t the outset, before any extensive treatment of the subject is made, it is necessary to define “disaster”. A useful definition is found in the Philippine Disaster Risk Reduction and Management Act of 2010 (Republic Act 10124) which considers disaster as a serious disruption in the way a community functions characterized by widespread losses in terms of human, economic and environmental aspects which go beyond the capability of a community to cope on its own. This definition conforms with the finding that most researchers view social disruption as the feature that defines a disaster (Andersson, Kennedy & Ressler, 2007).

To quantify the impact of disasters in Asia in the last ten years these facts may be cited: 1,730 natural disasters have hit Asia, resulting in a loss estimated at USD 752 million. This constitutes 39% of natural disasters worldwide and almost 50% of losses due to disaster (Chatterjee, Shiwaku, Gupta, Nakano & Shaw, 2015). Each year, without warning, disasters disrupt hundreds of thousands of lives all over the world. Disaster-related emergencies have profound effects on people and property. However, there is a reduction in the fear, anxiety, and losses when people are prepared. It is, therefore, important that communities, families, and individuals have a plan on what to do if and when a disaster occurs (Washburn & Saunders, 2010).

Given the broad and debilitating consequences of disasters, it would be beneficial to look into effects on education and children. Among the effects of disasters is the disruption of education thus causing psychological distress. This situation leads to child exploitation and to an upsurge in vulnerability. Data from Save the Children Fund confirmed that children are exposed to high risks, with an estimated 175 million affected worldwide each year. Children affected by disasters suffer from post-traumatic stress disorder and disruption of their educational progress (Peek, 2008). It is therefore not surprising that disaster education has been the focus of efforts to reduce the vulnerability of children to disasters.

The attention given to disaster education cuts across all the four priorities in the Sendai Framework on Disaster Risk Reduction 2015-2030 adopted in March 2015. Specific issues are those on curricula, to include content, tools, and materials, training of teachers and linking schools to their respective communities (Shiwaku & Shaw, 2016). Moreover, it is acknowledged that schools are useful avenues for teaching disaster resilience to the youth by

embedding learning activities that form part of the curriculum (Dufty, 2014). On a broader scale, the schools influence the development of people's values, knowledge, skills, attitude and behavior that result in the resilience of a community (Mutsau & Billiat, 2015; Oktari, Shiwaku, Munadi, Syamsidi & Shaw, 2015).

A positive result of this attention has been shown in children who were taught how to react to disaster situations and have been able to respond promptly and appropriately by warning others and protecting themselves during times of emergencies (Shaw, Takeuchi, Ru Gwee & Shiwaku, 2011). At the community level, numerous researches cite varied reasons why schools have the potential of contributing to the ability to respond to and recover from a disaster (Mutch, 2015).

In light of the essentiality of disaster education, an object of study is the way by which a key player in the education scene performs its role. This key player referred to is the university. Universities can conduct extension activities. An analysis of various countries with varying economic, political and geographic characteristics shows an increased demand for activities such as technology transfer and support of civil society. This being the case, universities have to balance education, research and transfer/extension (Göransson, Maharajh & Schmoch, 2009)

Merging the concern to be relevant to communities and the importance of disaster education, universities can conduct training courses that focus on disaster risk reduction. Common in most countries, is two types of courses: distance learning and face-to-face classes. Participants come from a wide range of professions and positions from senior policymakers, specialists, community leaders, to specialists seeking to acquire new knowledge. Residents of the same locality usually attend community-based disaster management training. It is often the subject of workshops or on-the-spot training by non-government organizations or other extension agents (Wisner, 2006).

While universities play an essential role in curriculum development and in conceptualizing development problems and policies, they can also play an essential role in supporting education in local communities and in promoting rural development (Atchoarena & Holmes, 2005). In an example from India, a study was conducted in an area visited by cyclones during the northeast

monsoon. The students and the local community realized the significance of preparedness that addresses disaster risk reduction. Consequently, a university included an elective course on Disaster Management in the curriculum and conducted awareness campaigns. Moreover, joint groups from Australia and Japan established joint academic activities in disaster management.

Capacity building efforts have been implemented and these helped communities become resilient to disasters (Krishnamurthy & Kamala, 2015). As revealed in studies in Australia and the United Kingdom, different capacity building methods can significantly increase the resilience of communities especially when linked with other capacity building programs (Coles & Buckle, 2004). In a study on tsunami mitigation and preparedness, the researchers found out that a community-based approach provides an opportunity in engaging traditional organizational mechanisms in capacity building (Mat, Ahmadun, Rodzi & Abas, 2011). On a broader perspective, building capacities by way of training in numerous skills is an integral element of development (Eade, 1997).

To be more specific about the nature of involvement in activities oriented on developing communities, an important field of endeavor universities undertake is called “civic engagement” founded on an enhanced sense of responsibility to the communities. This class of activities includes a broad range of undertakings such as developing civic sensitivity, taking part in building civil society, and benefiting the common good. Through civic engagement, individuals—as citizens of their communities, their nations, and the world—are empowered as agents of positive social change (Jacoby, 2009). Thus, cultivating campus-community partnerships is a central part of a well-crafted and effective civic engagement, including service learning and participatory action research (Bringle, Clayton & Price, 2012).

A related set of activities is “community engagement” which is defined as a collaboration between institutions of higher education and their larger communities for the mutual exchange of knowledge and resources in the context of partnership and reciprocity (Weerts & Sandmann, 2010). The increasing emphasis on service-learning in higher education and the renewed interest in community involvement grants universities with opportunities to undertake campus-community partnerships. These

partnerships can mix both campus and community resources to address pivotal issues pertaining to communities at the local level. Campus–community partnerships feature relationships between (a) the campus stakeholders such as administrators, faculty, staff, and students and (b) leaders and members of communities and personnel of government agencies, (Bringle & Hatcher, 2002).

Along this line, Community Outreach Partnership Centers sponsored by the United States Department of Housing and Urban Development consider civic engagement and community partnership as very important areas for the involvement of higher education. This engagement covers social work partnerships that involve teaching, research, and social change, and innovative methods in the processes of civic engagement (Soska & Butterfield, 2013).

This positive view is in contrast to what has been observed in Bangladesh where there is a lack of a functioning partnership among the stakeholders. This is manifested in the need to develop a culture of collective decision-making in planning, in resource sharing, and in implementing disaster management policies and programs in an integrated and transparent way (Khan & Rahman, 2007).

Coming now to the locale of this study, on a worldwide scale, the Philippines is the country most vulnerable to the impact of climate change particularly typhoons (Yanger, 2016). Also, among the countries considered to be disaster-prone, the Philippines stands out among natural hazard-prone nations (World Bank, 2005) where the occurrence of extreme weather events such as dry spells, excessive rain, and typhoons has led to hazards like floods and landslides (Yumul, Cruz, Servando & Dimalanta, 2011) with enormous economic and social consequences. This situation has made disaster risk reduction an essential component of the country’s development objectives (World Bank, n.d.).

A recent proof of the extent to which the Philippines is exposed to disasters was Typhoon Haiyan (local name: Yolanda) which struck the central part of the country, including the Eastern Visayas region on November 8, 2013. Haiyan brought high winds (sustained 1- minute surface wind speed) of 315 k/h and storm surge height of 5.3 meters in Tacloban City, Leyte (Erick, Shuichi, Bricker, Adriano, Carine, Suppasri &

Koshimura, 2014). The Philippine Government officially recorded a death toll of 6,293 with 1,991 missing. It adversely affected 16 million people and damaged 551,000 houses. The total cost of damages was estimated at US\$864 million (McPherson, Counahan & Hall, 2015).

This study investigates disaster education and the need for universities to reach out to their surroundings through community engagement from the context of the Eastern Visayas State University (EVSU) located in Tacloban City, Leyte Province, Philippine. The capability building activity covered by this study is an effort of EVSU to seek ways which would add to its relevance to the community particularly in a very critical aspect: disaster preparedness.

To legitimize this activity, EVSU has entered into a Memorandum of Undertaking with Save the Children Philippines to jointly conduct activities which will address the concerns of children especially in times of disaster. One such activity was the conduct of a Training for Local Disaster Risk Reduction and Management Officers of local government units in Child-Centered Community-Based Disaster Risk Reduction and Management.

This capability building activity included topics on (a) importance of disaster risk reduction and adapting to rapid climate change, (b) child-centered community-based DRRM (CBDRRM)/climate change adaptation programming, (c) steps in conducting CBDRRM, including community risk assessment and participatory DRRM planning, monitoring and evaluation, (d) preparedness, prevention and mitigation for each hazard, encompassing national warning systems and family preparedness and (e) CBDRRM mechanisms during and after disaster and preparation for recovery and rehabilitation, to include evacuation camp/center management and psychosocial support.

Action planning was also done to ensure continuity of efforts with an emphasis on mentoring of other LDRRMOs and the formulation of local DRRM Plans. The resource speakers of this training belonged to the faculty of EVSU who were trained by Save the Children Philippines in conducting DRRM capability building activities.

A central question at this point is: what is the importance of capability building to disaster preparedness? The study proceeds from the belief that preparedness is essential in reducing the adverse effects of a disaster. On



this aspect, it is important to note that the community is usually the first responder to any disaster. The social capital of this nature is a crucial source of strength on which the community depends in a disaster scenario. In view of this need, institutions run various models of disaster risk reduction focused on communities. Training is always a component of such programs. However, despite this noble intention, the implementation of learning modules for this type of capacity building faces many challenges including duplication of efforts, lack of training standards, lack of sustainability and a limited number of trained experts who can relate well with local communities (Walia, 2008). To overcome these challenges, EVSU has faculty who are trained to conduct this type of activity as part of its extension program.

The importance of the study can also be viewed as part of an initiative to advance school safety and in the context of the experience of EVSU. It suffered extensive damages to its buildings when it was hit by typhoon Haiyan. This effort may be considered as the university's contribution to dramatically reduce casualties and damage should another disaster like Haiyan hit the region.

This study considers the capability building program conducted by EVSU for LDRRMOs of the provinces of Samar and Biliran as an essential factor that affects the ability of the LDRRMOs to mentor other LDRRMOs and barangay (village) officials. The immediate result of this relationship is shown by the impact of the training on the participating LDRRMOs. Given this causal connection, this study seeks to:

1. Identify the knowledge of the Local Disaster Risk Reduction Management Officers (LDRRMOs) in the Child- Centered Community Based Disaster Risk Reduction Management
2. Assess the impact of the capacity- building among LDRRM Officers
3. Propose a program or activity that will enhance the capacity building program initiated by EVSU

## **Methodology**

This study was conducted in May 2017. Data were collected from 24 LDRRMOs from 12 Municipalities of Samar namely: Jiabong, Basey,

Marabut, Sta. Rita, Paranas, Pinabacdao, Villareal, Sta Margarita, Talalora, Gandara, Pagsanjan and Zumarraga, 2 Cities – Catbalogan and Calbayog and 7 Municipalities of Biliran – Almeria, Biliran, Cabucgayan, Caibiran, Culaba, Kawayan and Naval from the Provincial Governments of Samar and Biliran in Eastern Visayas. All these areas are vulnerable since they are located along the coast.

Table 1 presents the respondent’s profile as to the age and gender. The LDRRM Officers age ranges from 20 to 70 years old. Most of them (41.67%) are 40-49 years old. Majority of them are male (75 %).

Table 1.  
*Profile of the respondents*

Variable	F	%
Age		
61- 70	2	8.33
50-60	4	16.67
40-49	10	41.67
30-39	3	12.50
20-29	5	20.83
Gender		
Male	18	75.00
Female	6	25.00

This study adopts two sets of questionnaires from Save the Children Philippines. These instruments were developed by technical experts from Save the Children and pilot-tested in the Province of Bulacan. The first one is the 15-items multiple choice type of test that determined the respondent’s knowledge about Child-Centered CBDRRM Planning. This served as the pre and post- test instrument. The second survey instrument is the 10-items questionnaire that measured how the capacity building impacted them, with the following category of responses: strongly agree, agree, neutral, (2) partly agree and don’t agree. The questions measure perception of the extent to which the respondents understood child-centered disaster preparedness. Also measured were their readiness to mentor other LDRMMOs.

The researcher administered the questionnaires to the 24 respondents who attended the capability building activity and who work in local governments in the provinces of Biliran and Samar. Purposive sampling was used since this study is about a particular group of respondents with a unique characteristic – DRRM Officers of municipal, city and provincial government units. The researcher administered the survey tool herself with the assistance of three faculty from EVSU and two researchers from Save the Children.

### **Theoretical Framework**

A review of theories on disaster preparedness revealed some models that may be used in this study. For example, there is the proposal to focus on the role of a community in disaster preparedness as well as in response and recovery. This approach explores areas where communities undergo disaster decision-making and perform risk perception and vulnerability assessments, resiliency and capacity building. Concepts like social resilience are related to theories of “social capital,” which stress the importance of social networks, reciprocity, and interpersonal trust. These allow individuals and groups to have more substantial accomplishments than they could if they engaged in isolated efforts (Patterson, Weil & Patel, 2010).

Another approach is a comprehensive model linking hazard assessment, risk management, and disaster management actions. The distinctive feature of this approach is that it takes into account the arrangement of activities in a logical sequence (Asghar, Alahakoon & Churilov, 2006).

This study uses the approach which states that in the critical stage of disaster management, the capability requirements in the mitigation stage are on evaluation, monitoring, and dissemination, while in the preparedness stage, planning, exercise, and training are the important requirements in managing natural disasters. In the response stage, the capabilities required are need assessment, information exchange, and logistical expertise. Recovery is the last stage and in this aspect, expertise in damage assessment and debris removal and also disaster assistance skills are the capabilities most needed for local government bodies (Kusumasari, Alam & Siddiqui, 2010).

The usefulness of this method is its stress on the process in disaster preparedness that places this capability building community engagement activity of EVSU in its proper context. The content of the training, the positions in government held by the participants, and the responses to the questionnaire can be analyzed to arrive at conclusions that may be helpful in enhancing the importance of the engagement. All these may be viewed from the perspective of a higher education institution placing emphasis on direct community engagement where the initial set of beneficiaries are local government officials whose jobs pertain to DRRM.

This approach is modified by highlighting the need to address the situation of children, who are among the most vulnerable groups. The focus on children is evident from the topics in the capability building program and the dominant participation of faculty from the university's College of Education.

## **Results**

### **Knowledge of Respondents on CBDRRM**

Among the items cited in the instrument are the significant roles of children in CBDRRM and possible violation of the rights of children during a disaster. Also important are the different activities to be conducted to achieve effective recovery and rehabilitation after a disaster.

Figure 1 reveals the pre and post-test scores of the respondents. The highest scores obtained in pre-test are within the range of 11-15. Nine (37.5%) LDRRMOs obtained these scores. About one-third or 33.33% garnered scores within the range of 6-10 and 29.17% got low scores of 1-5. As a whole, the respondents showed a "moderate" level of knowledge as shown by the mean of 7.92 and standard deviation of 16.26. However, in the post-test half (50.00%) of the respondents got high scores within the range of 11 -15 which significantly shows that after the conduct of capacity building, LDRRMOs increased their understanding on CBDRRM child-centered planning.

Also, applying the T-test for paired samples to the pre-test and post-test scores, the  $P(T \leq t)$  two tailed is 2.765. This value is higher than the t Critical

two tailed value of 2.068. This result signifies that there is a significant difference between the pre-test and post-test scores.

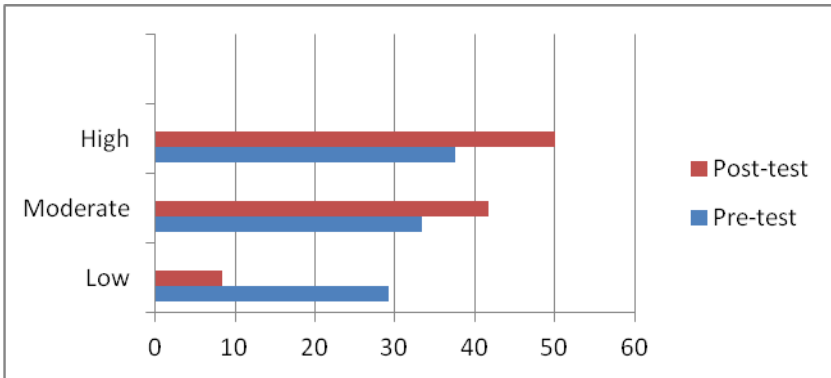


Figure 1. Percent distribution of scores obtained by respondents

### Impact of Capacity Building on the Respondents

On the whole, the respondents considered the capability building as helpful to them as Disaster Risk Reduction and Management Officers (DRRMO). Almost all of them (95%), strongly agreed or agreed on the usefulness of the activity. However, there was a noticeable reluctance to strongly agree on the overall usefulness of the capability building effort.

Table 2 presents the respondent’s assessment on the impact of the capacity building. It reveals that majority (71%) LDRRM Officers “strongly agree” that they have a clear picture of the situation of children in an emergency or disaster and most of the respondents (62%) strongly believed that they had deep understanding on the basic rights of children based on the United Nations Convention on the Rights of Children and how this can be protected during disaster. Moreover, a majority (57%) of the LDRRM Officers intensely believed that they can apply what they learned to the community.

However, a matter which could spell the difference between being able to apply what was learned and not being able to do so is seen from the glaring divergence from the dominant “strongly agree” and “agree” trend when it comes to the matter of having sufficient resources to apply what was

learned. On this statement, 57 percent of the respondents “agreed”. It is noted that the capacity building did not include a topic on the generation of resources to enable the conduct of similar capability building initiatives at the municipal level. This deficiency could have led to the view that resources were inadequate, implying lack of or insufficient knowledge of resource generation strategies. This condition is related to inadequate knowledge of techniques for the efficient use of limited resources. Another topic which was not included but which may affect the evaluation on readiness to apply the concepts and techniques learned is on “mentoring” or “coaching”.

Table 2.  
*Respondent’s Assessment of the Impact of Capacity Building*

Statement	Strongly Agree		Agree		Neutral	
	F	%	F	%	F	%
I have deep understanding of basic rights of a child based on the United Nations Convention on the Rights of Children	15	62	8	35	1	3
I have a clear picture of the situation of children in an emergency or disaster	16	71	7	24	1	3
I believe the steps that the government needs to take to implement children’s rights	12	48	11	47	1	3
I understood the salient features of laws related to children	9	38	14	57	1	3
I can conduct child-centered community-based DRRRM Planning	10	43	12	52	1	3
I can execute the activities in CBDRRM planning	10	43	12	52	1	3
I can apply what I learned to my constituents	14	57	9	38	1	3
I can deliver what I learned with adequate resources	2	10	14	57	8	33
I truly internalize the workshops worthwhile of time and resources	12	48	11	47	1	3
I will recommend to and encourage my colleagues to undertake CBDRRM Planning	10	43	11	47	3	10

Note: No responses for “partly agree” and “don’t agree”

## **Discussion**

The ideal result of the evaluation should have shown that the respondents overwhelmingly adopted the “strongly agree” response for all questions. However, only 71 percent evaluated a statement as “strongly agree” and this is on the matter of addressing the situation of children in a disaster. Noting further that the next best evaluation (62%) was on the rights of children, then this type of response points to the acceptable handling of the topic on children influenced by the familiarity of the training team from EVSU in teaching at the secondary and college levels. Similarly, the discussion of child-centered laws was evaluated mainly as “agree” and not “strongly agree”, suggesting that the scope and depth of the discussion on related legislation should be enhanced. The assigned speaker should be more conversant with the pertinent laws.

It can be argued that the objective is not only to get a favorable evaluation of how the capacity-building was conducted but to ensure that changes do occur at the village level. It is not much about holding classes than it is about extending a helping hand to villages on the matter of child-centered disaster preparedness.

As pointed out in the approach adopted for this study, it is necessary to look at this community engagement as a process undertaken to encourage disaster preparedness particularly as it involves special attention to children. Therefore, EVSU has to move on with the procedure adopted and consider practicable next steps that would make it more relevant to the community not only in being able to capacitate village folks but to enable the realization of child-centered approaches. This move should be intended to achieve the objective of sufficient disaster preparedness at the village and possibly even to the household levels.

As gleaned from the findings, EVSU must continue improving the conduct of this capability building initiative. This effort should be augmented by follow-through actions which would involve going down to the village level while continuing to assist the LDRRM Offices. For this purpose, the university has to be creative in marshaling resources. The experience in typhoon Haiyan provides a source of experiential learning for all these efforts to help communities achieve disaster preparedness.

Concomitant activities may be conducted to train more faculty who may be able to augment the manpower resources required to make this initiative really count in the entire Eastern Visayas region. It can also provide a realistic budget for this community engagement and not rely solely on outside organizations. Linkages with the provincial and city governments in the region would boost resources considerably. Given the experience of the region in past disasters, the availability of resources to enhance child-centered disaster preparedness would certainly get the attention of the local government legislatures that would lead to the allocation of funds. Partnering with non-government organizations is also a valid option. Joint endeavors in this aspect should be pursued. These organizations play a key role in every stage of the disaster cycle (Shaw, 2003).

The urgency of providing more resources supports the view that investment in community capacity building at the local level should be increased to make partnerships in responding to catastrophic disasters successful and effective and put further credence to the finding that local levels are faster in responding to disasters. In this aspect, future research should focus on local, state, and federal resources coordination in response to catastrophic disasters (Kapucu, Arslan & Collins, 2010).

The participants who expressed inadequacy of resources to apply what they learned would have to be trained in techniques for fund sourcing and generation. This would involve tapping all available funding from the local government unit. Beyond this, they can link up with other organizations. This strategy is consistent with the view that the complementary and joint action of stakeholders from different sectors and levels of the Philippine disaster management and development planning system is needed in order to realize disaster resilience and sustainable development (Victoria, 2011).

A number of studies cite the importance of organizations working together. Despite having strengths, such as long experience in disaster response and recovery, the people's resilience, and donor support, the disaster management strategies could suffer from a host of policy and institutional weaknesses. Very prominent, in the case of Bangladesh, is the lack of a functioning partnership among the stakeholders. Collective decision-making in planning, resource sharing, and in implementing disaster



management policies and programs in an integrated and transparent way appears to be lacking (Khan & Rahman, 2007).

The development of capacity for knowledge-based reduction of hazards and disasters risk demands an integrated approach that recognizes the changing nature of natural hazards. Further, capacity development must recognize the limitations in governmental response and facilitate alternate ways to overcome barriers (McBean & Rodgers, 2010).

Based on the composition of the respondents, conclusions arrived at in this study are applicable to local government governments who embark on child-centered disaster preparedness particularly those located in coastal areas which are prone to disasters. The conclusions are also applicable to universities who conduct extension activities on disaster preparedness.

This study focused on the participants of a single capacity building initiative. However, the heterogeneity of the participants in terms of age, their dispersed geographic location, and three levels of local governments provide a large degree of applicability and relevance to other local government units. The active involvement of an educational institution further qualifies the applicability of the findings and conclusions.

## **Conclusion**

A university such as EVSU, must consider making a roadmap for this community engagement over the long term. EVSU has to undertake more capacity building activities if it is to make a substantial contribution to child-centered disaster preparedness. As shown in a study in Ethiopia, capacity building is a slow process which requires the willingness of partners to work in a holistic and integrated manner to have a lasting impact on reducing disasters (Tadele & Manyena, 2009).

Researchers can conduct studies on the experience in other areas exposed to other types of hazards and disasters. Also, the evaluation of the impact of this community engagement should be continuous to enable the university to improve the use of its resources and at the same time increase the effectiveness of its efforts in DRRM.

Research can also be done on factors other than the conduct of a capacity building program which may affect the readiness and capacity of the

LDRMMOs to mentor other LDRMMOs. These could include educational attainment, prior training in DRRM, and length of service as LDRRMO. The effects of the training on different aspects of child-centered DRRM as experienced in local governments may also be studied using the various theoretical frameworks to determine comparability of findings.

As cited earlier, two topics may be added in future activities of this type. It would be helpful if the topics include resource generation and efficient use of resources. It would be wishful thinking to expect that there will be a desired transfer of technology such as the preparation of DRRM Plans at the village level if there are no resources available for such initiative. Including a topic on mentoring will ensure that the participants will learn appropriate techniques and strategies to teach barangay (village) officials in CBDRRM planning.

Guided by the theoretical framework of this study, it is recommended that the training should be approached as a community engagement activity and not classroom sessions. Such a view recognizes the reality that there are many competing uses for similar resources. There are a number of ways to use the local government budget and capability building may not be accorded the priority it deserves to enhance readiness to meet disaster situations. The topic may be handled in a manner that provides ideas on strategies that local governments can adopt in order to free or make available resources for use in cascading the training to the village level.

Ultimately, to gain a comprehensive grasp of the critical significance of this capability building initiative, it is necessary that a university such as EVSU look at the “end game” and update its answer to the question: what does the university hope to achieve in this community engagement and extension activity?

The answer to that question will have to take into account the central role of education to reducing risk in the context of disasters (Shaw, Takeuchi & Shiwaku, 2011) and the importance of focusing on the vulnerability of children and their capacity to contribute to the entire spectrum of disaster risk reduction to include preparedness, response and recovery (Peek, 2008).

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