



EXPERIENCES OF DISASTER AND RISK REDUCTION MANAGEMENT (DRRM) COORDINATORS ON SCHOOL EMERGENCY RESPONSE: BASIS FOR ENHANCEMENT PROGRAM

JULIE ANN P. SABARES
TEACHER III

Sinapsapan Elementary School
julieann.sabares@deped.gov.ph

ABSTRACT

This qualitative study aimed to determine the experiences of Disaster and Risk Reduction Management (DRRM) coordinators on school emergency response as basis for enhancement program. The research method utilized in the study was qualitative using in-depth interview and the design was phenomenology. DRRM coordinators experienced developing emergency response plans, training and capacity building, collaborating with stakeholders, response and coordination during emergencies, and evaluating and improving emergency response plans. The hindering factors were limited resources, lack of awareness and understanding, inadequate training and capacity building, limited coordination and collaboration, and communication barriers. The facilitating factors were supportive school leadership, adequate resources, collaboration and partnerships, training and capacity building and communication and information sharing. Training and capacity building, review and update emergency response plans, strengthen partnerships, raise awareness and conduct education campaigns and establish monitoring and evaluation mechanisms were the proposed enhancement program.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez,
Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban
Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto



Keywords: *Experiences, DRRM Coordinators, Emergency Response*

INTRODUCTION

Disasters and emergency situations, such as natural disasters, fires, and other hazards, posed a significant threat to the safety and well-being of students, staff, and the community. In recent years, the frequency and severity of natural disasters increased, highlighting the need for effective disaster management and response strategies. Schools, in particular, had a crucial role in ensuring the safety and well-being of students during emergency situations. As a result, it was important that schools had Disaster and Risk Reduction Management (DRRM) programs in place.

DRRM programs aimed to mitigate the impacts of disasters and emergency situations on schools, students, and the community. These programs included activities such as risk assessment, disaster preparedness planning, and emergency response and recovery. DRRM coordinators played a vital role in managing emergency situations in schools by developing, implementing, and maintaining DRRM programs. However, despite the importance of DRRM programs, there was a lack of research on the experiences of DRRM coordinators in managing school emergency response.

The study aimed to fill this gap by exploring the experiences of DRRM coordinators on school emergency response. The research focused on understanding the challenges and successes of DRRM coordinators and how these experiences could be used to enhance existing

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez,
Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban
Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto



programs and develop new ones. The study provided valuable information for improving the preparedness and response of schools during emergency situations. By understanding the experiences of DRRM coordinators, schools could improve their ability to prepare for and respond to emergencies, ensuring the safety and well-being of all members of the school community.

MATERIALS AND METHODS

Research Methodology

This chapter presents the research method, research design, participants of the study, data-gathering procedures, research instrument, and data analysis to be used in the study. The purpose of this study is to determine the experiences of Disaster and Risk Reduction Management (DRRM) coordinators on school emergency response: basis for enhancement program in the District of Jordan II during the school year 2022-2023.

Research Method

According to Rutledge (2020), the research method utilized in this study was qualitative research using in-depth interview.

The interviewer with the interviewee during the interview was allowed to sit together in a distance and to think about the series of questions about a certain issue. The aim was to get the

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez,
Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban
Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto



main or the necessary views of the participants in a certain issue in a social context through the responses of the participants to the questions.

Research Design

This study used phenomenological research design. Phenomenology can be considered a philosophical approach to undertaking qualitative research. The goal of phenomenology is to understand how others view the world, and how this view may vary from commonly held views by focusing on a person’s subjective interpretations of what she experiences. Phenomenology is done by interviewing the subjects to learn their impressions, and is frequently used in such fields as psychology, sociology, and social work.

According to Smith (2013), phenomenology is the study of structures of consciousness as experienced from the first-person point of view. The central structure of an experience is its intentionality, its being directed toward something, as it is an experience of or about some object. An experience is directed toward an object by virtue of its content or meaning (which represents the object) together with appropriate enabling conditions.

Participants of the Study

The participants of the study were the thirteen (13) DRRM coordinators of the thirteen (13) schools in the Schools District of Jordan I and II. They were purposively selected based on their experiences and roles as DRRM coordinators.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez,
Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban
Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto



Each school in the District of Jordan I had 1 participant. The schools were Jordan Central School, Alaguisoc Elementary School, Hoskyn Elementary School, Morubuan Elementary School, Balcon Melliza Elementary School, Don Pedro Memorial Elementary School, and Balcon Maravilla Elementary School. The tested schools in Jordan II were Espinosa Elementary School, Lawi Elementary School, Sta. Teresa Elementary School, Buluangan Elementary School, Bugnay Elementary School and Bugnay Elementary School.

Sampling Design

Purposive sampling design was used in this study. A purposive sample is a non-probability sample that is selected based on characteristics of a population and the objective of the study. Purposive sampling is also known as judgmental, selective, or subjective sampling.

Research Instrument

The research instrument utilized in this study was researcher-made interview schedule.

The interview schedule has three (3) questions focusing on the purpose of study.

Voice and video recorder were for data gathering and documentation depending upon the permission of the participants.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto



Validity of the Research Instrument

Prior to the determination of the validity of the interview schedule made by the researcher, the adviser, Dean of the Graduate School then a panel of jurors who were considered for their expertise in the field of research, testing and assessment, and science, were requested to validate each question for review and modification.

Validity refers to the appropriateness, meaningfulness, correctness, and usefulness of inferences that a researcher makes. In content-related evidence of validity, the content and format must be consistent with the definition of variables and sample of subject to be measured and is also helpful in validating the items in the questionnaire (Fraenkel & Wallen, 2007).

Comments, corrections, and suggestions of the panel of validators regarding the interview schedule were considered using the appropriate form of Good and Scates (Appendix A).

Data Gathering Procedures

Permits from the adviser, Dean of the Graduate School, Office of the Schools Division Superintendent, Office of the District Supervisors, School Heads, and individual participants were obtained to allow the researcher to conduct the study. The researcher personally went to the schools/community/place convenient on the part of the participants to conduct the interview.

The researcher conducted an interview to the participants but prior to this, the researcher encouraged the participants to sign a waiver or permission relative to the conduct of the study.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez,
Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban
Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto



Using in-depth interview, a voice and video recorder were provided to completely capture the interviewee's words. The researcher consolidated all the collected data after series of interviews.

Data Analyses

The information gathered was analyzed using thematic approach.

Thematic analysis is the process of identifying patterns or themes within qualitative data. According to Maguire & Delahunt (2017), the aim of a thematic analysis is to identify themes, such as patterns in the data that are important or interesting and use these themes to address the research or say something about an issue. This is summarizing, analyzing, and interpreting the data gathered and making sense of it.

RESULTS AND DISCUSSIONS

The study was conducted to determine the experiences of Disaster and Risk Reduction Management (DRRM) coordinators on school emergency response as basis for enhancement program in the District of Jordan I and II during the school year 2022-2023.

The research method utilized in the study was descriptive using in-depth interview.

The study used phenomenology under qualitative research design.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



The participants of the study were thirteen (13) DRRM coordinators of the thirteen (13) schools in the Schools District of Jordan I and II. They were purposively selected based on their experiences and roles as DRRM coordinators.

The research instrument utilized in the study was a researcher-made interview schedule. Voice and video recorder were also used for data gathering and documentation depending upon the permission of the participants.

A panel of experts validated the interview schedule and considered all comments and suggestions relative to the validation of the tool.

Permits from the individual participants were obtained to allow the researcher to conduct the study. The researcher personally went to the schools/community/place convenient on the part of the participants to conduct the interview and virtual instruction was done prior to the interview.

Using in-depth interview, voice and video recorders were provided to completely capture the interviewee's words or responses. The researcher consolidated all the collected data after series of interviews.

The information gathered was analyzed using thematic approach.

The following are the findings of the study:

The experiences of DRRM Coordinators on school emergency response can vary depending on their roles, responsibilities, and the specific context in which they operate.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto



Based on the results of the in-depth interview, the school DRRM coordinators experienced developing emergency response plans, training and capacity building, collaborating with stakeholders and response, coordination during emergencies and evaluating and improving emergency response plans on school emergency response.

The DRRM coordinators identified limited resources, lack of awareness and understanding, inadequate training and capacity building, limited coordination and collaboration and communication barriers as hindering factors on school emergency response.

The following facilitating factors were identified by DRRM coordinators such as supportive school leadership, adequate resources, collaboration and partnerships, training and capacity building and communication and information sharing.

As a result, DRRM coordinators proposed the following enhancement programs: training and capacity building, review and update emergency response plans, strengthen partnerships, raise awareness and conduct education campaigns and establish monitoring and evaluation mechanisms based on the results of the study.

CONCLUSION

The experiences of Disaster and Risk Reduction Management (DRRM) coordinators on school emergency response provide valuable insights for the development of an enhancement program. Through their firsthand experiences and expertise, DRRM coordinators can provide

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez,
Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban
Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



valuable information about the challenges, successes, and areas of improvement in managing emergencies within a school setting. Here are some key insights that can inform the enhancement program:

Identification of specific hazards and risks. DRRM coordinators can provide insights into the specific hazards and risks that schools face in their particular geographical location. This information is essential for developing targeted strategies and emergency response plans that address the unique challenges of the school environment.

Assessment of existing emergency response plans. DRRM coordinators can evaluate the effectiveness of current emergency response plans in schools. They can provide insights into any gaps or deficiencies in the plans, including issues related to communication protocols, evacuation procedures, resource allocation, and coordination with external agencies. This assessment can guide the improvement and refinement of emergency response plans.

Evaluation of training and capacity building efforts. DRRM coordinators can assess the adequacy and effectiveness of training programs provided to school staff, students, and other stakeholders. They can identify areas where additional training or capacity building is needed to enhance the preparedness and response capabilities of individuals involved in emergency management.

Identification of hindering factors and challenges. DRRM coordinators can highlight the hindering factors and challenges they face in their role. This may include limited resources,

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez,
Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban
Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



inadequate coordination among stakeholders, lack of awareness and understanding among the school community, or other institutional barriers. Understanding these challenges is crucial for developing targeted strategies and interventions to overcome them.

Evaluation of response and coordination during emergencies. DRRM coordinators can provide insights into the effectiveness of response and coordination efforts during actual emergency situations. This evaluation can identify areas where improvements can be made, such as streamlining communication channels, enhancing collaboration with external emergency response agencies, or refining the roles and responsibilities of different stakeholders involved in emergency management.

Recommendations for enhancing school emergency response. Based on their experiences, DRRM coordinators can provide valuable recommendations for enhancing school emergency response. These recommendations may include improving training programs, strengthening partnerships with external agencies, enhancing communication and information sharing mechanisms, or implementing new technologies for emergency preparedness and response.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez,
Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban
Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto



References

Abante, A.M.R. (2021). Geophilosophical Realness of Risk:

A Case Study in National Housing Authority Resettlement Sites in Albay, Philippines.

Adams, J., Quinn, M., & Reed, M. (2016). Barriers to Communication and Collaboration in Emergency Response: Perspectives of Operational Personnel. *Disaster Prevention and Management: An International Journal*.

Bachofen, C., Falk, K., van Aalst, M., Dulce Jr, C.B.,

Kaushik, M., Lagdameo, D., McNaught, R., Monasso, F., Widyasari, V., & Prag, A. (2015). Minimum Standards for Local Climate-smart Disaster Risk Reduction: Informing the Development of the Post-2015 HFA.

Bradley, J. (2010). Disaster Management: Strategies and Approaches.

Canales, R.O. & Sanico, F.L. (2021). Survey on Disaster

Risk Reduction Measures in the Balicuatro Area Schools of Northern Samar.

Comfort, L.K., Ko, K., & Zagorecki, A. (2004). Coordination in Rapidly Evolving Disaster Response Systems: The Role of Information. *American Behavioral Scientist*.

Comfort, L.K. & Ko, K. (2008). Collaboration and Disaster. *The Blackwell Companion to Organizations in Crisis*.

Coppola, D.P. (2006). Introduction to International

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban, Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



Disaster Management.

Department of Education (Philippines) (2015). Disaster Risk Reduction and Management in Schools: Guidelines for Schools and Local DRRM Councils. Retrieved from <https://www.deped.gov.ph/sites/default/files/drrmo/DRRM%20in%20Schools%20Guideline%202015.pdf> on August 31, 2022.

Domingo, S.N. & Manejar, A.J.A. (2021). Policy, Institutional, and Expenditure Review of Bottom-up Approach Disaster Risk Reduction and Management.

Esnard, A.M. & Lahr, M.L. (2018). Collaboration in Emergency Management: Stakeholder Perceptions of Collaboration Effectiveness. *International Journal of Disaster Risk Reduction*.

Federal Emergency Management Agency (FEMA) (2019). Emergency Management Guide for Schools. U.S. Department of Homeland Security.

Fraenkel, J.R. & Wallen N.E. (2007). How to design and evaluate research in education. New York: McGraw Hill.

Government of the People's Republic of Bangladesh (2008-2015). National Plan for Disaster Management.

<https://www.ready.gov/business/implementation/emergency>, on August 31, 2022.

Hyogo Framework for Action (HFA) and the Sendai Framework for Disaster Risk Reduction (SFDRR) (2015) from the United Nations Office for Disaster Risk Reduction (UNDRR)

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



website and the Literature on Risk Management, Stakeholder Engagement, Community Resilience, and Capacity Building from Reputable Journals in the Field of Disaster Risk Reduction and Management.

Iglesias, G. (2010). Flood preparedness initiatives of high-risk communities of Jakarta. Academia.edu.

Impact of Coronavirus Pandemic on Education(n.d.). ResearchGate. Retrieved from https://www.researchgate.net/publication/341787426_Impact_of_Coronavirus_Pandemic_on_Education on August 31, 2022.

International Risk Management Institute (IRMI) (n.d.). Risk Management Definition. Retrieved from <https://www.irmi.com/terms/risk-management/risk-management-definition> on August 31, 2022.

Ivcc.edu. (2023). Retrieved from https://www.ivcc.edu/academicaffairs/Program_Enhancement_Plan_Process.pdf on February 9, 2023.

Kendra, J.M. & Wachtendorf, T. (2003). Elements of Resilience After the World Trade Center Disaster: Reconstituting New York City's Emergency Operations Center. Disasters.

Kovács, G. & Spens, K.M. (2007). Coordination Mechanisms in Humanitarian Logistics: *An Exploratory Study*. *International Journal of Physical Distribution & Logistics Management*, doi: 10.1108/09600030710734849.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



Lindsay, B.R. & Sasse, M. (2018). Evaluating and Improving Emergency Response Plans: A Participatory Approach. *International Journal of Disaster Risk Reduction*, 27.

Luna, E.M. (2002). Disaster Mitigation and Preparedness: The Case of NGOs in the Philippines.

Maguire, M. & Delahunt, B. (2017). Doing a Thematic Analysis: A Practical, Step-by-Step Guide for Learning and Teaching Scholars.

Malkina-Pykh, G. & Pykh, Y.A. (2015). International Conference on Environmental and Economic Impact on Sustainable Development (Environmental Impact 2016).

Merriam-Webster Dictionary (2022). <https://www.merriam-webster.com/dictionary/primary%20school> on March 23, 2022.

Noh, H.W. (2016). Hwang Woo Noh's Scientific Contributions. ResearchGate. Retrieved from <https://www.researchgate.net/scientific-contributions/Hwang-Woo-Noh-2051661195> on August 31, 2022.

Oxford Learners Dictionaries (2022). Retrieved from <https://www.oxfordlearnersdictionaries.com/us/definition/english/basis> on August 31, 2022.

Palm, R.I. (1990) Natural Hazards: an integrative framework for research and planning. Baltimore and London: The Johns Hopkins University Press. xiv + 188 cloth. ISBN: 0 8018 3866 5.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban, Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



Parcon, J.S. (2016). From Managing Disasters to Managing

Risks: Key Efforts in the Philippines. From the *Managing Disasters to Managing Risks Series*, 3(14).

Paton, D., Johnston, D.M., & Houghton, B.F. (2008). Disaster resilience: an integrated approach. Charles C Thomas Publisher.

Paul, S.K., Rashid, M.A., Rahman, S., & Roy, D.(2019).

Investigating the Role of School Infrastructure in Promoting Disaster Resilience in Bangladesh. *International Journal of Disaster Risk Reduction*, 34, 269277.doi:10.1016/j.ijdr.2018.11.001.

Pinto, N., Marques, R., & Lourenço, L. (2018). Coordination Mechanisms in Emergency Management: A Comparative Analysis of the Literature. *International Journal of Disaster Risk Reduction*, 27, doi: 10.1016/j.ijdr.2017.10.025.

Powell, S.A., Schneider, P., & Chmutina, K. (2017). Collaborative Approaches to Resilience in Disaster Response and Recovery. *International Journal of Disaster Resilience in the Built Environment*.

PreventionWeb (2011). Philippines National Disaster Risk

Reduction and Management Plan (NDRRMP) 2011-2028.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



Quarantelli, E.L., Dynes, R.R., & Perry, R.W. (2011). Building Community Disaster Resilience Through Training and Experiential Learning. In R. W. Perry & E. L. Quarantelli (Eds.), *What Is a Disaster?: New Answers to Old Questions*. Philadelphia, PA: Xlibris Corporation.

SAMHSA (2017). Disaster Technical Assistance Center Supplemental Research Bulletin: Greater Impact: How Disasters Affect People of Low Socioeconomic Status.

Sawada, Y. & Takasaki, Y. (2017). Natural Disaster, Poverty, and Development: An Introduction. *World Development*, 94(C).

Schulz, A.C., Scholten, N., Bosse, D., & van der Heijden, R. T. (2020). Evaluating the Effectiveness of Emergency Response Plans: A Systematic Review. *Safety Science*, 126, 104677.

Sendai Framework for Disaster Risk Reduction (2015). Sendai Framework for Disaster Risk Reduction 2015-2030.

Smith, E.E., Lachlan, K.A., & Lachlan, R. (2019). Disaster Preparedness among U.S. Adults: A Multi-State Analysis. *International Journal of Environmental Research and Public Health*, 16(15), 2752. doi: 10.3390/ijerph16152752.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan **Associate Editor:** Andro M. Bautista
Managing Editor: Raymart O. Basco **Web Editor:** Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



Smith, D.W. (2013). Phenomenology. Retrieve from

<https://plato.stanford.edu/entries/phenomenology/> on August 31, 2023

The Korea Contents Association (2014). Concepts of

Disaster Prevention Design for Safety in the Future Society.

Toledo, R.J.T., Tantoy, O.A., & Paraiso, R.M. (2020).

Development of Disaster Risk Management and Mitigation Extension Program for School-Aged Children in the Province of Bukidnon.

Tria, J.Z. (2020). The COVID-19 Pandemic through the Lens

of Education in the Philippines: *The New Normal. International Journal of Pedagogical Development and Lifelong Learning*, 1(1).

UNESCO (2014). Education in a Changing World.

UNICEF (2011). School-Based Disaster Risk Reduction: A Resource Pack.

UNISDR (United Nations Office for Disaster Risk Reduction) (2009). Terminology on Disaster Risk Reduction. United Nations Development Programme.

UNISDR (2009). Global Assessment Report on Disaster Risk Reduction: Risk and Poverty in a Changing Climate.

UNISDR (2015). Sendai Framework for Disaster Risk Reduction 2015-2030.

United Nations Children's Fund (UNICEF) (2011). The State

of the World's Children 2011: Adolescence - An Age of Opportunity.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



United Nations International Strategy for Disaster Reduction (UNISDR) (2009). Global Assessment Report on Disaster Risk Reduction: Risk and Poverty in a Changing Climate.

United Nations International Strategy for Disaster Reduction (UNISDR) (2015). Sendai Framework for Disaster Risk Reduction 2015-2030.

United Nations Office for Disaster Risk Reduction (UNDRR) (2017). Words into Action Guidelines: School Safety.

United Nations International Strategy for Disaster Reduction (UNISDR) (2009). UNISDR Terminology on Disaster Risk Reduction. Geneva, Switzerland.

United Nations Children's Fund (UNICEF) (2011). School Safety and Disaster Risk Reduction: A Guide for Education Policy Makers. New York, NY. Retrieved from https://www.unicef.org/publications/index_55169.html on August 31, 2023.

United Nations Office for Disaster Risk Reduction (UNDRR) (2015). The Sendai Framework for Disaster Risk Reduction 2015-2030. Geneva, Switzerland.

United Nations Office for Disaster Risk Reduction (UNDRR) (2019). Words into Action Guidelines: National Disaster Risk Assessment.

United Nations Office for Disaster Risk Reduction (UNDRR) (2017). Sendai Framework for Disaster Risk Reduction 2015-2030. Retrieved from https://www.preventionweb.net/files/43291_sendaiframeworkfordrren.pdf on August 3, 2023.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

February 2024

Available online at <https://www.instabrightgazette.com>



United Nations International Strategy for Disaster Reduction (UNISDR) (2009). UNISDR

Terminology on Disaster Risk Reduction. Retrieved from

https://www.preventionweb.net/files/7817_UNISDRTerminologyEnglish.pdf on August 31, 2023.

United Nations Office for Disaster Risk Reduction (UNDRR) (2015). Monitoring and Evaluation of Disaster Risk Reduction: A Technical Guidance Note. Retrieved from

https://www.preventionweb.net/files/51129_monaan.pdf on August 31, 2023.

Watson, S.J., & Clegg, S.H. (2009). Communication and Misunderstanding in a High-Risk Industry. *Journal of Business Communication*, 46(1), doi: 10.1177/0021943608328517.

Win, A.M., Kusakabe, K., & Biswas, A.K. (2018). Evaluation of Disaster Risk Reduction Training for Teachers in Myanmar. *Natural Hazards Review*, 19(4), 04018013. doi: 10.1061/(ASCE)NH.1527-6996.0000317.

Retrieved on August 31, 2023. from <https://www.who.int/hac/techguidance/pht/disasters/en>.

World Health Organization (WHO) (2004). *Natural Disasters and Public Health*. Geneva, Switzerland. Retrieved from

<https://apps.who.int/iris/bitstream/handle/10665/255397/9789241513282-eng.pdf> on August 31, 2023.

Editorial Team

Editor-in-Chief: Alvin B. Punongbayan

Associate Editor: Andro M. Bautista

Managing Editor: Raymart O. Basco

Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto

INSTABRIGHT e-GAZETTE

ISSN: 2704-3010

Volume V, Issue III

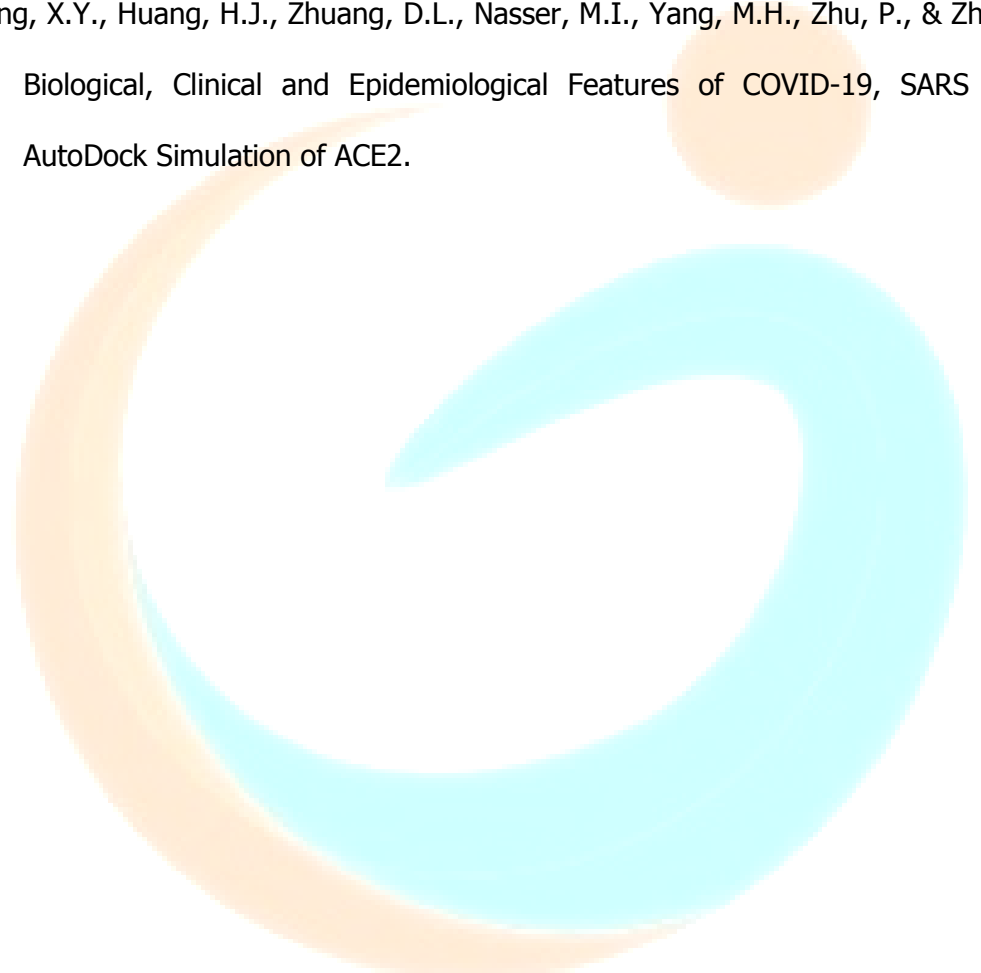
February 2024

Available online at <https://www.instabrightgazette.com>



World Health Organization (WHO)(2017). Health Emergency Operations Centres: A Guide to Effective Emergency Operations. Geneva, Switzerland. Retrieved from <https://apps.who.int/iris/bitstream/handle/10665/255397/9789241513282-eng.pdf> on August 31, 2023.

Zhang, X.Y., Huang, H.J., Zhuang, D.L., Nasser, M.I., Yang, M.H., Zhu, P., & Zhao, M.Y. (2020). Biological, Clinical and Epidemiological Features of COVID-19, SARS and MERS and AutoDock Simulation of ACE2.



Editorial Team

Editor-in-Chief: Alvin B. Punongbayan
Managing Editor: Raymart O. Basco

Associate Editor: Andro M. Bautista
Web Editor: Nikko C. Panotes

Manuscript Editors / Reviewers:

Chin Wen Cong, Christopher DC. Francisco, Camille P. Alicaway, Pinky Jane A. Perez, Mary Jane B. Custodio, Irene H. Andino, Mark-Jhon R. Prestoza, Keive O. Casimiro, Ma. Rhoda E. Panganiban Rjay C. Calaguas, Mario A. Cudiamat, Jesson L. Hero, Albert Bulawat, Cris T. Zita, Allan M. Manaloto
