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A Comparative Study Of On-Scene Disaster Response Of Philippines And Of Japan

Disaster Response and Preparedness Mechanisms

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by

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DEDICATION

This study is dedicated to:

My dearest wife Karen C. Calang and my daughter Elizah Marian C. Calang who are the sources of my inspiration, endurance and delights;

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My Brothers and Sisters in Christ

and

Above all, to my Lord Jesus Christ.

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BACKGROUND OF STUDY

Background of the Philippines

The Philippines is a tropical country in Pacific Ocean, blessed with beautiful natural landscapes - and active volcanoes and extreme weather patterns.



The Philippines, consisting of some 7,107 islands, is located in the western Pacific Ocean. Taiwan lies to its north, and Vietnam to the west. It is the 73rd-largest country in the world by surface area, but with a population of some 98 million people, making it the seventh most populous country in Asia, and the 12th most populous in the world. Its capital, Manila, is the second largest city in the country after Quezon City (the former capital) - and home to most of the country's educational and political institutions.



The Philippines is made up of thousands of islands. The country, once a Spanish colony, eventually gained its independence from US occupation in 1946. The Philippines is located close to the equator on the so-called Pacific Ring of Fire - or typhoon belt - a large Pacific region where many volcanic eruptions and earthquakes occur. More than 170 different languages are spoken across the Philippines, the most popular being Tagalog (Filipino), followed closely by English. More than 90 percent of Filipino people are of the Christian faith, while five percent practice Islam. The remaining five percent are made up of a mix of minority religions.

Philippines: A Country Prone to Natural Disaster

Typhoon Haiyan is one of the deadliest natural disasters ever to hit the Philippines. But it's far from the only one - the Southeast Asian country is located in an area that has been struck by a number of major storms.



The Philippines has suffered from an inexhaustible number of deadly typhoons, earthquakes, volcano eruptions and other natural disasters. This is due to its location along the Ring of Fire, or typhoon belt – a large Pacific Ocean region where many of Earth's volcanic eruptions and earthquakes occur.

Annually, approximately 80 typhoons develop above tropical waters, of which 19 enter the Philippine region and six to nine make landfall, according to the Joint Typhoon Warning Center (JTWC).

The Philippines is in fact the country most exposed to tropical storms in the world. Violent tropical storms, such as the latest Haiyan typhoon, can generate 10 times as much energy as the Hiroshima atomic bomb.

Here is a list of earthquakes, volcanic eruptions, typhoons, cyclones and other natural disasters the Philippines has had to cope with during the past decade - leaving thousands of people dead and the country's infrastructure and economy in tatters.



Bohol earthquake, October 2013

In the early morning hours of October 15, 2013 the island province of Bohol, located in Central Visayas in the Philippines, was disrupted by the deadliest earthquake in the Philippines in 23 years. The earthquake lasted 34 seconds and had a magnitude size of 7.2. The Bohol earthquake had an impact on the entire Central Visayas region. According to the National Disaster Risk Reduction and Management Council (NDRRMC) 222 people died, 976 were injured, and more than 73,000 houses were damaged or destroyed. It has been estimated that the energy the quake released was equivalent to 32 Hiroshima bombs.



Typhoon Bopha, November – December 2012

Super typhoon Bopha made landfall on December 3, 2012, on the Philippines' southern island of Mindanao, which had been destroyed by the Washi storm a year before. Bopha caused widespread destruction on the island with more than 600 fatalities. The super typhoon reached an unusually minimal latitude, coming extremely close to the equator and is in fact the second-most southerly super typhoon labelled "category 5" – the highest level when it comes to a typhoon's maximum wind force and the scale of the potential damage it can inflict. The damage was estimated at more than \$1 billion (749 million euros).



Pantukan landslide, January 2012

All the conditions were present in making the mining community of Pantukan town on the southern Philippine island of Mindanao vunerable to landslides – steep slopes, rugged land and poor vegetation, the director of the Philippine Institute of Volcanology and Seismology, Renato Solidum, said following the January 5, 2012 disaster. Twenty-five people were killed when the landslide struck a gold mine site near the town. Following the landslide, a 30-day suspension of all mining operations in the town was ordered.



Tropical Storm Washi, December 2011

One of few storm cells to hit the southern Philippines, tropical storm Washi triggered flash flooding that surged down mountain sides, uprooting trees and swelling rivers - all while residents slept. The storm left 1,080 people dead and destroyed the coastal cities of Cagayande Oro and nearby Iligan, turning them in rubbish dumps filled with overturned cars, debris and animal carcasses. Houses with families sleeping inside were swept into the sea in an area of the Philippines ill-equipped to cope with storms. It took months for power and clean water to be restored again to the region.



Typhoon Fengshen, June 2008

Typhoon Fengshen, also referred to as typhoon "Frank", created havoc in the Philippines from June 20 to June 23, 2008, killing at least 557 people. It affected more than 99,600 families all over the Philippines, damaging more than 155,500 houses in 10 regions. More casualties occurred from the sinking of the "Princess of the Stars" ferry off the Philippine Coast during the storm. The Philippine's National Disaster Coordination Council (NDCC) placed the damage to agriculture and fisheries at 3.3 billion pesos (57.2 million euros, \$76.4 million), infrastructure at 750 million pesos (13 million euros, \$17.4 million), schools at 212 million pesos (3.7 million euros, \$4.9 million), and fishing boats at 110 million pesos (1.9 million euros, \$2.5 million).



Cyclone Durian, November 2006

On November 25, 2006, an intense tropical cyclone called "Durian" hit the Philippines, blowing away houses, uprooting trees and taking the lives of at least 720 people. Due to heavy rainfall, Legazpi City had to fight widespread flooding while mudslides from the Mayon Volcano buried many villages, causing another 800 to 1,000 casualties. After hitting the Philippines, Durian exited into the South China Sea and hit Vietnam shortly afterwards. All in all, Durian caused the death of almost 2,000 people while hundreds more remained missing. Damages in the Philippines was put at \$130 million (97 million euros).



Guinsaugon landslide, February 2006

The village of Guinsaugon, on the southern part of Leyte island, was buried when an entire mountainside collapsed on 17 February, 2006 - 1,126 people were killed in the disaster. A school, along with 500 homes were wiped out when a rapid flow of mud made its way down the mountain slope. The disaster occurred after torrential rains of up to 200 centimeters (78 inches) dumped down on the region within 10 days. Locals blame deforestation, caused by illegal logging, to be a contributing factor in the disaster.



Tropical Depression Winnie, November 2004

Although Winnie is only considered a weak tropical cyclone and is rather referred to as "Tropical Depression," the storm killed 842 people in the Philippines, while 751 went missing. The damage caused by the storm, which hit the Philippines at the end of November, 2004, has been estimated at 679 million Philippine pesos (11.8 million euros, \$ 15.8 million). Only shortly after Winnie devastated the country, the Philippines were struck by an even more powerful tropical cyclone called "Nanmadol" which killed another 70 people.

Background of the Japan

Japan has a total of 6,852 islands extending along the Pacific coast of East Asia. The country, including all of the islands it controls, lies between latitudes 24° and 46°N, and longitudes 122° and 146°E. The main islands, from north to south, are Hokkaido, Honshu, Shikoku and Kyushu. The Ryukyu Islands, which includes Okinawa, are a chain to the south of Kyushu.



Together they are often known as the Japanese Archipelago. About 73 percent of Japan is forested, mountainous, and unsuitable for agricultural, industrial, or residential use. As a result, the habitable zones, mainly located in coastal areas, have extremely high population densities. Japan is one of the most densely populated countries in the world. Following three decades of unprecedented growth, Japan's economy experienced a major slowdown starting in the 1990s, but the country remains a major economic power. In March 2011, Japan's strongest-ever earthquake, and an accompanying tsunami, devastated the northeast part of Honshu island, killing thousands and damaging several nuclear power plants. The catastrophe hobbled the country's economy and its energy infrastructure, and tested its ability to deal with humanitarian disasters. Japan is located in eastern Asia, an island chain

between the North Pacific Ocean and the Sea of Japan, east of the Korean Peninsula. In 2003 Japan's population was 128 million, and the City of Kobe represents 1.2% of the total. Most of the country's population is urban, accounting for the 78.8% of the total, with a density of 341 persons per square kilometer. Almost 15% of the population is under 15 years old and 23.6% is over 60 years old. In the year 2000 there were 46.78 million households, 58.4% of which were nuclear family and 27.6% one-person households. In 2002 the country GDP was \$38,160 per person.

The islands of Japan are located in a volcanic zone on the Pacific Ring of Fire. They are primarily the result of large oceanic movements occurring over hundreds of millions of years from the mid-Silurian to the Pleistocene as a result of the subduction of the Philippine Sea Plate beneath the continental Amurian Plate and Okinawa Plate to the south, and subduction of the Pacific Plate under the Okhotsk Plate to the north. Japan was originally attached to the eastern coast of the Eurasian continent. The subducting plates pulled Japan eastward, opening the Sea of Japan around 15 million years ago. Japan has 108 active volcanoes. Destructive earthquakes, often resulting in tsunami, occur several times each century. The 1923 Tokyo earthquake killed over 140,000 people. [80] More recent major quakes are the 1995 Great Hanshin earthquake and the 2011 Tōhoku earthquake, a 9.0-magnitude quake which hit Japan on March 11, 2011, and triggered a large tsunami. Due to its location in the Pacific Ring of Fire, Japan is substantially prone to earthquakes and tsunami, having the highest natural disaster risk in the developed world.

Climate3 The climate of Japan is predominantly temperate, but varies greatly from north to south. The average winter temperature in Japan is 5.1 °C (41.2 °F) and the average summer temperature is 25.2 °C (77.4 °F). A major feature of Japan's climate is the clear-cut temperature changes between the four seasons. In spite of its rather small area, the climate differs in regions from a subarctic climate to a subtropical climate. The side of the country which faces the Sea of Japan has a climate with much snow in winter by seasonal winds from the Siberia. Most of the areas have damp rainy season from May to July by the seasonal winds from the Pacific Ocean. From July to September, Japan frequently suffers from Typhoon. Japan's geographical features divide it into six principal climatic zones: Hokkaido, Sea of Japan, Central Highland, Seto Inland Sea, Pacific Ocean, and Ryūkyū Islands. The northernmost zone, Hokkaido, has a humid continental climate with long, cold winters and very warm to cool summers. Precipitation is not heavy, but the islands usually

develop deep snow banks in the winter. In the Sea of Japan zone on Honshu's west coast, northwest winter winds bring heavy snowfall. In the summer, the region is cooler than the Pacific area, though it sometimes experiences extremely hot temperatures because of the foehn wind. The Central Highland has a typical inland humid continental climate, with large temperature differences between summer and winter, and between day and night; precipitation is light, though winters are usually snowy. The mountains of the Chūgoku and Shikoku regions shelter the Seto Inland Sea from seasonal winds, bringing mild weather year-round. The Pacific coast features a humid subtropical climate that experiences milder winters with occasional snowfall and hot, humid summers because of the southeast seasonal wind. The Ryukyu Islands have a subtropical climate, with warm winters and hot summers. Precipitation is very heavy, especially during the rainy season. The generally humid, temperate climate exhibits marked seasonal variation such as the blooming of the spring cherry blossoms, the calls of the summer cicada and fall foliage colors that are celebrated in art and literature. The average winter temperature in Japan is 5.1 °C (41.2 °F) and the average summer temperature is 25.2 °C (77.4 °F). The highest temperature ever measured in Japan—40.9 °C (105.6 °F)—was recorded on August 16, 2007. The main rainy season begins in early May in Okinawa, and the rain front gradually moves north until reaching Hokkaido in late July. In most of Honshu, the rainy season begins before the middle of June and lasts about six weeks. In late summer and early autumn, typhoons often bring heavy rain.

Japan is also located in the Circum-Pacific Mobile Belt where seismic and volcanic activities occur constantly. Although Japan covers only 0.25% of the land area of the planet, the number of earthquakes and active volcanoes is quite high. In addition, because of geographical, topographical and meteorological conditions, the country is subject to frequent natural disasters such as typhoons, torrential rains and heavy snowfalls as well as earthquakes and tsunami.

In spite of such efforts, in 1995, more than 6,400 people died of the Great Hanshin-Awaji Earthquake. Also, 2011, more than 18,00 people died or went missing due to GHAE. There is also a high probability of the occurrence of large-scale earthquakes in the near future including impending possibilities of Nankai Trough Earthquake and Tokyo Inland Earthquake. As such, natural disaster s remains a menacing threat to the safety and security of the country

1.1 Statement of the Problem

- 1. What are the Response Mechanisms/Algorithms of Response of the Philippines Government and Japanese Government from:
 - > National
 - > Prefectural; and
 - Municipal respond during the onset of disaster?
- 2. What are the good practices and innovations in disaster risk reduction and management in the different level of administration/organizations in Japan as lessons from the past disasters? and
- 3. What are the learnings and uphold on the lessons of *Preparing for Better Response*, most especially on the lessons of mega-disasters such as the Great Hanshin-Awaji Earthquake and the Great East Japan Earthquake?

1.2 Significance of the Study

This research study provides a glimpse of information or a comparison of response algorithm of Philippines and of Japan. Though there are information's that lean more on preparedness phase on a disaster thematic area yet it is relatively connected in order to promote effective disaster response. To some extent this research may also help for future reference and study. This research will also provide list of good practices, innovations, lessons learned of Philippines and of Japan.

1.3 Scope and Limitation of the Study

The scope of this research is mainly focused on the response aspect of disaster management of Philippines and of Japan. This research is also limited to some Prefectures, City/s, Municipality/s, Institutions and Non-Government Organization visited by the Researcher.

The challenges encountered along with completion of this study includes language barrier, instructions or lectures given were in Japanese, majority of the literature related to Disaster Risk Reduction are in Japanese. Finally, time constraint as to interpretation and comprehensive analytical inputs of the study.

1.4 Expected Results

Upon completion of the Research Paper, I will be able to provide information's related to the following:

- 1. What are the Response Mechanisms/Algorithms of Response of the Philippines Government and Japanese Government from:
 - National
 - > Prefectural; and
 - Municipal respond during the onset of disaster?
- 2. What are the good practices and innovations in disaster risk reduction and management in the different level of administration/organizations in Japan as lessons from the past disasters? and
- 3. What are the learnings and uphold on the lessons of *Preparing for Better Response*, most especially on the lessons of mega-disasters such as the Great Hanshin-Awaji Earthquake and the Great East Japan Earthquake?

REVIEW OF LITERATURE

This chapter presents a review of the literature related to the study. The purpose is to give the researcher a good frame of reference in topic area.

Related Literature

2.1 PHILIPPINE REPUBLIC ACT No. 10121

AN ACT STRENGTHENING THE PHILIPPINE DISASTER RISK REDUCTION AND MANAGEMENT SYSTEM, PROVIDING FOR THE NATIONAL DISASTER RISK REDUCTION AND MANAGEMENT INSTITUTIONALIZING FRAMEWORK AND THE **NATIONAL** DISASTER RISK REDUCTION ANDMANAGEMENT PLAN. APPROPRIATING **FUNDS THEREFOR** AND **FOR** OTHER PURPOSES.

it enacted by the Senate and House of Representatives of the Philippines in Congress assembled:

Section 1. Title. - This Act shall be known as the "Philippine Disaster Risk Reduction and Management Act of 2010".

Section 2. *Declaration of Policy*. - It shall be the policy of the State to:

- (a) Uphold the people's constitutional rights to life and property by addressing the root causes of vulnerabilities to disasters, strengthening the country's institutional capacity for disaster risk reduction and management and building the resilience of local communities to disasters including climate change impacts;
- (b) Adhere to and adopt the universal norms, principles and standards of humanitarian assistance and the global effort on risk reduction as concrete expression of the country's commitment to overcome human sufferings due to recurring disasters;

- (c) Incorporate internationally accepted principles of disaster risk management in the creation and implementation of national, regional and local sustainable development and poverty reduction strategies, policies, plans and budgets;
- (d) Adopt a disaster risk reduction and management approach that is holistic, comprehensive, integrated, and proactive in lessening the socioeconomic and environmental impacts of disasters including climate change, and promote the involvement and participation of all sectors and all stakeholders concerned, at all levels, especially the local community;
- (e) Develop, promote, and implement a comprehensive National Disaster Risk Reduction and Management Plan (NDRRMP) that aims to strengthen the capacity of the national government and the local government units (LGUs), together with partner stakeholders, to build the disaster resilience of communities, and to institutionalize arrangements and measures for reducing disaster risks, including projected climate risks, and enhancing disaster preparedness and response capabilities at all levels;
- (f) Adopt and implement a coherent, comprehensive, integrated, efficient and responsive disaster risk reduction program incorporated in the development plan at various levels of government adhering to the principles of good governance such as transparency and accountability within the context of poverty alleviation and environmental protection;
- (g) Mainstream disaster risk reduction and climate change in development processes such as policy formulation, socioeconomic development planning, budgeting, and governance, particularly in the areas of environment, agriculture, water, energy, health, education, poverty reduction, land-use and urban planning, and public infrastructure and housing, among others;
- (h) Institutionalize the policies, structures, coordination mechanisms and programs with continuing budget appropriation on disaster risk reduction from national down to local levels towards building a disaster-resilient nation and communities;
- (i) Mainstream disaster risk reduction into the peace process and conflict resolution approaches in order to minimize loss of lives and damage to property, and ensure that communities in conflict zones can immediately go back to their normal lives during periods of intermittent conflicts:

- (j) Ensure that disaster risk reduction and climate change measures are gender responsive, sensitive to indigenous know ledge systems, and respectful of human rights;
- (k) Recognize the local risk patterns across the country and strengthen the capacity of LGUs for disaster risk reduction and management through decentralized powers, responsibilities, and resources at the regional and local levels;
- (l) Recognize and strengthen the capacities of LGUs and communities in mitigating and preparing for, responding to, and recovering from the impact of disasters;
- (m) Engage the participation of civil society organizations (CSOs), the private sector and volunteers in the government's disaster risk reduction programs towards complementation of resources and effective delivery of services to the Citizenry;
- (n) Develop and strengthen the capacities of vulnerable and marginalized groups to mitigate, prepare for, respond to, and recover from the effects of disasters:
- (o) Enhance and implement a program where humanitarian aid workers, communities, health professionals, government aid agencies, donors, and the media are educated and trained on how they can actively support breastfeeding before and during a disaster and/or an emergency; and
- (p) Provide maximum care, assistance and services to individuals and families affected by disaster, implement emergency rehabilitation projects to lessen the impact of disaster, and facilitate resumption of normal social and economic activities.

Section 3. *Definition of Terms*. - For purposes of this Act, the following shall refer to:

- (a) "Adaptation" the adjustment in natural or human systems in response to actual or expected climatic stimuli or their effects, which moderates harm or exploits beneficial opportunities.
- (b) "Capacity" a combination of all strengths and resources available within a community, society or organization that can reduce the level of risk, or effects of a disaster. Capacity may include infrastructure and physical means, institutions, societal coping abilities, as well as human knowledge, skills and collective attributes such as social relationships,

leadership and management. Capacity may also be described as capability.

- (c) "Civil Society Organizations" Or "CSOs" non-state actors whose aims are neither to generate profits nor to seek governing power. CSOs unite people to advance shared goals and interests. They have a presence in public life, expressing the interests and values of their members or others, and are based on ethical, cultural, scientific, religious or philanthropic considerations. CSOs include nongovernment organizations (NGOs), professional associations, foundations, independent research institutes, community-based organizations (CBOs), faith-based organizations, people's organizations, social movements, and labor unions.
- (d) "Climate Change" a change in climate that can' be identified by changes in the mean and/or variability of its properties and that persists for an extended period typically decades or longer, whether due to natural variability or as a result of human activity.
- (e) "Community-Based Disaster Risk Reduction and Management" or "CBDRRM" a process of disaster risk reduction and management in which at risk communities are actively engaged in the identification, analysis, treatment, monitoring and evaluation of disaster risks in order to reduce their vulnerabilities and enhance their capacities, and where the people are at the heart of decision-making and implementation of disaster risk reduction and management activities.
- (f) "Complex Emergency" a form of human-induced emergency in which the cause of the emergency as well as the assistance to the afflicted IS complicated by intense level of political considerations.
- (g) "Contingency Planning" a management process that analyzes specific potential events or emerging situations that might threaten society or the environment and establishes arrangements in advance to enable timely, effective and appropriate responses to such events and situations.
- (h) "Disaster" a serious disruption of the functioning of a community or a society involving widespread human, material, economic or environmental losses and impacts, which exceeds the ability of the affected community or society to cope using its own resources. Disasters are often described as a result of the combination of: the exposure to a hazard; the conditions of vulnerability that are present; and insufficient capacity or measures to reduce or cope with the potential negative consequences, Disaster impacts may include loss of life, injury, disease

and other negative effects on human, physical, mental and social well-being, together with damage to property, destruction of assets, loss of services, Social and economic disruption and environmental degradation. *lavvphi1*

- (i) "Disaster Mitigation" the lessening or limitation of the adverse impacts of hazards and related disasters. Mitigation measures encompass engineering techniques and hazard-resistant construction as well as improved environmental policies and public awareness.
- (j) "Disaster Preparedness" the knowledge and capacities developed by governments, professional response and recovery organizations, communities and individuals to effectively anticipate, respond to, and recover from, the Impacts of likely, imminent or current hazard events or conditions. Preparedness action is carried out within the context of disaster risk reduction and management and aims to build the capacities needed to efficiently manage all types of emergencies and achieve orderly transitions from response to sustained recovery. Preparedness is based on a sound analysis of disaster risk and good linkages with early warning systems, and includes such activities as contingency planning, stockpiling of equipment and supplies, the development of arrangements for coordination, evacuation and public information, and associated training and field exercises. These must be supported by formal institutional, legal and budgetary capacities.
- (k) "Disaster Prevention" the outright avoidance of adverse impacts of hazards and related disasters. It expresses the concept and intention to completely avoid potential adverse impacts through action taken in advance such as construction of dams or embankments that eliminate flood risks, land-use regulations that do not permit any settlement in high-risk zones, and seismic engineering designs that ensure the survival and function of a critical building in any likely earthquake.
- (l) "Disaster Response" the provision of emergency services and public assistance during or immediately after a disaster in order to save lives, reduce health impacts, ensure public safety and meet the basic subsistence needs of the people affected. Disaster response is predominantly focused on immediate and short-term needs and is sometimes called "disaster relief".
- (m) "Disaster Risk" the potential disaster losses in lives, health status, livelihood, assets and services, which could occur to a particular community or a Society over some specified future time period.

- (n) "Disaster Risk Reduction" the concept and practice of reducing disaster risks through systematic efforts to analyze and manage the causal factors of disasters, including through reduced exposures to hazards, lessened vulnerability of people and property, wise management of land and the environment, and improved preparedness for adverse events.
- (o) "Disaster Risk Reduction and Management" the systematic process of using administrative directives, organizations, and operational skills and capacities to implement strategies, policies and improved coping capacities in order to lessen the adverse impacts of hazards and the possibility of disaster. Prospective disaster risk reduction and management refers to risk reduction and management activities that address and seek to avoid the development of new or increased disaster risks, especially if risk reduction policies are not put m place.
- (p) "Disaster Risk Reduction and Management Information System" a specialized database which contains, among others, information on disasters and their human material, economic and environmental impact, risk assessment and mapping and vulnerable groups.
- (q) "Early Warning System" the set of capacities needed to generate and disseminate timely and meaningful warning information to enable individuals, communities and organizations threatened by a hazard to prepare and to act appropriately and in sufficient time to reduce the possibility of harm or loss. A people-centered early warning system necessarily comprises four (4) key elements: knowledge of the risks; monitoring, analysis and forecasting of the hazards; communication or dissemination of alerts and warnings; and local capabilities to respond to the warnings received. The expression "end-to-end warning system" is also used to emphasize that warning systems need to span all steps from hazard detection to community response.
- (r) "Emergency" unforeseen or sudden occurrence, especially danger, demanding immediate action.
- (s) "Emergency Management" the organization and management of resources and responsibilities for addressing all aspects of emergencies, in particular preparedness, response and initial recovery steps.
- (t) "Exposure" the degree to which the elements at risk are likely to experience hazard events of different magnitudes.

- (u) "Geographic Information System" a database which contains, among others, geo-hazard assessments, information on climate change, and climate risk reduction and management.
- (v) "Hazard" a dangerous phenomenon, substance, human activity or condition that may cause loss of life, injury or other health impacts, property damage, loss of livelihood and services, social and economic disruption, or environmental damage.
- (w) "Land-Use Planning" the process undertaken by public authorities to identify, evaluate and decide on different options for the use of land, including consideration of long-term economic, social and environmental objectives and the implications for different communities and interest groups, and the subsequent formulation and promulgation of plans that describe the permitted or acceptable uses.
- (x) "Mitigation" structural and non-structural measures undertaken to limit the adverse impact of natural hazards, environmental degradation, and technological hazards and to ensure the ability of atrisk communities to address vulnerabilities aimed at minimizing the impact of disasters. Such measures include, but are not limited to, hazard-resistant construction and engineering works, the formulation and implementation of plans, programs, projects and activities, awareness raising, knowledge management, policies on land-use and resource management, as well as the enforcement of comprehensive land-use planning, building and safety standards, and legislation.
- (y) "National Disaster Risk Reduction and Management Framework" or "NDRRMF" provides for comprehensive, all hazards, multi-sectoral, inter-agency and community-based approach to disaster risk reduction and management.
- (z) "National Disaster Risk Reduction and Management Plan" or "NDRRMP" the document to be formulated and implemented by the Office of Civil Defense (OCD) that sets out goals and specific objectives for reducing disaster risks together with related actions to accomplish these objectives.

The NDRRMP shall provide for the identification of hazards, vulnerabilities and risks to 'be managed at the national level; disaster risk reduction and management approaches and strategies to be applied m managing said hazards and risks; agency roles, responsibilities and lines of authority at all government levels; and vertical and horizontal coordination of disaster risk reduction and management in the pre-

disaster and post-disaster phases. It shall be in conformity with the NDRRMF.

- (aa) "Post-Disaster Recovery" the restoration and improvement where appropriate, of facilities, livelihood and living conditions. of disaster-affected communities, including efforts to reduce disaster risk factors, in accordance with the principles of "build back better".
- (bb) "Preparedness" pre-disaster actions and measures being undertaken within the context of disaster risk reduction and management and are based on sound risk analysis as well as predisaster activities to avert or minimize loss of life and property such as, but not limited to, community organizing, training, planning, equipping, stockpiling, hazard mapping, insuring of assets, and public information and education initiatives. This also includes the development/enhancement of an overall preparedness strategy, policy, institutional structure, warning and forecasting capabilities, and plans that define measures geared to help at-risk communities safeguard their lives and assets by being alert to hazards and taking appropriate action in the face of an Imminent threat or an actual disaster.
- (cc) "Private Sector" the key actor in the realm of the economy where the central social concern and process are the mutually beneficial production and distribution of goods and services to meet the physical needs of human beings. The private sector comprises private corporations, households and non-profit institutions serving households.
- (dd) "Public Sector Employees" all persons in the civil service.
- (ee) "Rehabilitation" measures that ensure the ability of affected communities/areas to restore their normal level of functioning by rebuilding livelihood and damaged infrastructures and increasing the communities' organizational capacity.
- (ff) "Resilience" the ability of a system, community or society exposed to hazards to resist, absorb, accommodate and recover from the effects of a hazard in a timely and efficient manner, including through the preservation and restoration of its essential basic structures and functions.
- (gg) "Response" any concerted effort by two (2) or more agencies, public or private, to provide assistance or intervention during or immediately after a disaster to meet the life preservation and basic subsistence needs of those people affected and in the restoration of essential public activities and facilities.

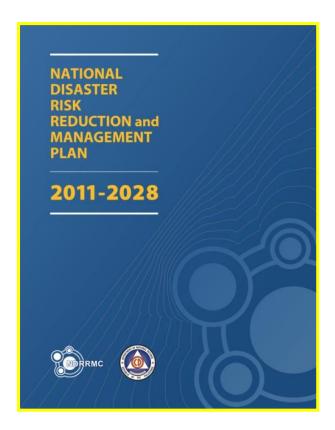
- (hh) "Risk" the combination of the probability of an event and its negative consequences.
- (ii) "Risk Assessment" a methodology to determine the nature and extent of risk by analysing potential hazards and evaluating existing conditions of vulnerability that together could potentially harm exposed people, property, services, livelihood and the environment on which they depend. Risk assessments with associated risk mapping include: a review of the technical characteristics of hazards such as their location, intensity, frequency and probability; the analysis of exposure and vulnerability including the physical, social, health, economic and environmental dimensions; and the evaluation of the effectiveness of prevailing and alternative coping capacities in respect to likely risk scenarios.
- (jj) "Risk Management" the systematic approach and practice of managing uncertainty to minimize potential harm and loss. It comprises risk assessment and analysis, and the implementation of strategies and specific actions to control, reduce and transfer risks. It is widely practiced by organizations to minimize risk in investment decisions and to address operational risks such as those of business disruption, production failure, environmental damage, social impacts and damage from fire and natural hazards.
- (kk) "Risk Transfer" the process of formally or informally shifting the financial consequences of particular risks from one party to another whereby a household, community, enterprise or state authority will obtain resources from the other party after a disaster occurs, in exchange for ongoing or compensatory social or financial benefits provided to that other party.
- (ll) "State of Calamity" a condition involving mass casualty and/or major damages to property, disruption of means of livelihoods, roads and normal way of life of people in the affected areas as a result of the occurrence of natural or human-induced hazard.
- (mm) "Sustainable Development" development that meets the needs of the present without compromising the ability of future generations to meet their own needs. It contains within it two (2) key concepts: (1) the concept of "needs", in particular, the essential needs of the world's poor, to which overriding priority should be given; and (2) the idea of limitations imposed by the state of technology and social organizations on the environment's ability to meet present and future needs. It is the harmonious integration of a sound and viable economy, responsible governance, social cohesion and harmony, and ecological integrity to

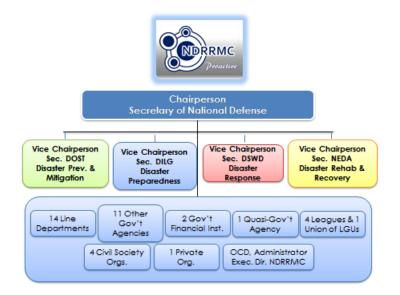
ensure that human development now and through future generations is a life-enhancing process.

(nn) "Vulnerability" - the characteristics and circumstances of a community, system or asset that make it susceptible to the damaging effects of a hazard. Vulnerability may arise from various physical, social, economic, and environmental factors such as poor design and construction of buildings, inadequate protection of assets, lack of public information and awareness, limited official recognition of risks and preparedness measures, and disregard for wise environmental management.

(00) "Vulnerable and Marginalized Groups" - those that face higher exposure to disaster risk and poverty including, but not limited to, women, children, elderly, differently-abled people, and ethnic minorities.

Section 4. *Scope.* - This Act provides for the development of policies and plans and the implementation of actions and measures pertaining to all aspects of disaster risk reduction and management, including good governance, risk assessment and early warning, knowledge building and awareness raising, reducing underlying risk factors, and preparedness for effective response and early recovery.





Section 5. National Disaster Risk Reduction and Management Council. - The present National Disaster Coordinating Council or NDCC shall henceforth be known as the National Disaster Risk Reduction and Management Council, hereinafter referred to as the NDRRMC or the National Council.

The National Council shall be headed by the Secretary of the Department of National Defense (DND) as Chairperson with the Secretary of the Department of the Interior and Local Government (DILG) as Vice Chairperson for Disaster Preparedness, the Secretary of the Department of Social

Welfare and Development (DSWD) as Vice Chairperson for Disaster Response, the Secretary of the Department of Science and Technology (DOST) as Vice Chairperson for Disaster Prevention and Mitigation, and the Director-General of the National Economic and Development Authority (NEDA) as Vice Chairperson for Disaster Rehabilitation and Recovery.

The National Council's members shall be the following:

- (a) Secretary of the Department of Health (DOH);
- (b) Secretary of the Department of Environment and Natural Resources (DENR);
- (c) Secretary of the Department of Agriculture (DA);
- (d) Secretary of the Department of Education (DepED);

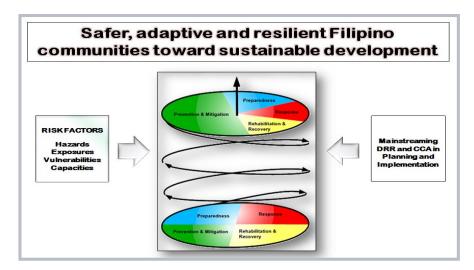
- (e) Secretary of the Department of Energy (DOE);
- (f) Secretary of the Department of Finance (DOF);
- (g) Secretary of the Department of Trade and Industry (DT!);
- (h) Secretary of the Department of Transportation and Communications (DOTC);
- (i) Secretary of the Department of Budget and Management (DBM);
- (j) Secretary of the Department of Public Works and Highways (DPWH);
- (k) Secretary of the Department of Foreign Affairs (DFA);
- (l) Secretary of the Department of Justice (DOJ);
- (m) Secretary of the Department of Labor and Employment (DOLE);
- (n) Secretary of the Department of Tourism (DOT);
- (o) The Executive Secretary;
- (p)Secretary of the Office of the Presidential Adviser on the Peace Process (OPAPP);
- (q) Chairman, Commission on Higher Education (CHED);
- (r) Chief of Staff, Armed Forces of the Philippines (AFP);
- (s) Chief, Philippine National Police (PNP);
- (t) The Press Secretary;
- (u) Secretary General of the Philippine National Red Cross (PNRC);
- (v) Commissioner of the National Anti-Poverty Commission-Victims of Disasters and Calamities Sector (NAPCVDC);
- (w) Chairperson, National Commission on the Role of Filipino Women;
- (x) Chairperson, Housing and Urban Development Coordinating Council (HUDCC);

- (y) Executive Director of the Climate Change Office of the Climate Change Commission;
- (z) President, Government Service Insurance System (GSIS);
- (aa) President, Social Security System (SSS);
- (bb) President, Philippine Health Insurance Corporation (PhilHealth);
- (cc) President of the Union of Local Authorities of the Philippines (ULAP);
- (dd) President of the League of Provinces of the Philippines (LPP);
- (ee) President of the League of Cities of the Philippines (LCP);
- (ff) President of the League of Municipalities of the Philippines (LMP);
- (gg) President of the Liga ng Mga Barangay (LMB);
- (hh) Four (4) representatives from the CSOs;
- (ii) One (1) representative from the private sector; and
- (jj) Administrator of the OCD.

The representatives from the CSOs and the private sector shall be selected from among their respective ranks based on the criteria and mechanisms to be set for this purpose by the National Council.

Section 6. *Powers and Functions of the NDRRMC*. - The National Council, being empowered with policy-making, coordination, integration, supervision, monitoring and evaluation functions, shall have the following responsibilities:

(a) Develop a NDRRMF which shall provide for a comprehensive, all-hazards, multi-sectoral, inter-agency and community-based approach to disaster risk reduction and management. The Framework shall serve as the principal guide to disaster risk reduction and management efforts in the country and shall be reviewed on a five (5)-year interval, or as may be deemed necessary, in order to ensure its relevance to the times;



National Disaster Risk Reduction and Management Framework (NDRMF)

- (b) Ensure that the NDRRMP is consistent with the NDRRMF;
- (c) Advise the President on the status of disaster preparedness, prevention, mitigation, response and rehabilitation operations being undertaken by the government, CSOs, private sector, and volunteers; recommend to the President the declaration of a state of calamity in areas extensively damaged; and submit proposals to restore normalcy in the affected areas, to include calamity fund allocation;
- (d) Ensure a multi-stakeholder participation in the development, updating, and sharing of a Disaster Risk Reduction and Management Information System and Geographic Information System-based national risk map as policy, planning and decision-making tools;
- (e) Establish a national early warning and emergency alert system to provide accurate and timely advice to national or local emergency response organizations and to the general public through diverse mass media to include digital and analog broadcast, cable, satellite television and radio, wireless communications, and landline communications;
- (f) Develop appropriate risk transfer mechanisms that shall guarantee social and economic protection and increase resiliency in the face of disaster;
- (g) Monitor the development and enforcement by agencies and organizations of the various laws, guidelines, codes or technical standards required by this Act;

- (h) Manage and mobilize resources for disaster risk reduction and management including the National Disaster Risk Reduction and Management Fund;
- (i) Monitor and provide the necessary guidelines and procedures. on the Local Disaster Risk Reduction and Management Fund (LDRRMF) releases as well as utilization, accounting and auditing thereof;
- (j) Develop assessment tools on the existing and potential hazards and risks brought about by climate change to vulnerable areas and ecosystems in coordination with the Climate Change Commission;
- (k) Develop vertical and horizontal coordination mechanisms for a more coherent implementation of disaster risk reduction and management policies and programs by sectoral agencies and LGUs;
- (l) Formulate a national institutional capability building program for disaster risk reduction and management to address the specific' weaknesses of various government agencies and LGUs, based on the results of a biennial baseline assessment and studies;
- (m) Formulate, harmonize, and translate into policies a national agenda for research and technology development on disaster risk reduction and management;
- (n) In coordination with the Climate Change Commission, formulate and implement a framework for climate change adaptation and disaster risk reduction and management from which all policies, programs, and projects shall be based;
- (o) Constitute a technical management group composed of representatives of the abovementioned departments, offices, and organizations, that shall coordinate and meet as often as necessary to effectively manage and sustain national efforts on disaster risk reduction and management;
- (p) Task the OCD to conduct periodic assessment and performance monitoring of the member-agencies of the NDRRMC, and the Regional Disaster Risk Reduction and Management Councils (RDRRMCs), as defined in the NDRRMP; and
- (q) Coordinate or oversee the Implementation of the country's obligations with disaster management treaties to which it IS a party and see to It that the country's disaster management treaty obligations be

incorporated in its disaster risk reduction and management frameworks, policies, plans, programs and projects.

Section 7. Authority of the NDRRMC Chairperson. - The Chairperson of the NDRRMC may call upon other instrumentalities or entities of the government and nongovernment and civic organizations for assistance In terms of the use of their facilities and resources for the protection and preservation of life and properties in the whole range of disaster risk reduction and management. This authority includes the power to call on the reserve force as defined in Republic Act No. 7077 to assist in relief and rescue during disasters or calamities.

Section 8. The Office of Civil Defense. - The Office of Civil Defense (OCD) shall have the primary mission of administering a comprehensive national civil defense and disaster risk reduction and management program by providing leadership in the continuous development of strategic and systematic approaches as well as measures to reduce the vulnerabilities and risks to hazards and manage the consequences of disasters.



The Administrator of the OCD shall also serve as Executive Director of the National Council and, as such, shall have the same duties and privileges of a department undersecretary. All appointees shall be universally acknowledged experts in the field of disaster preparedness and management and of proven honesty and integrity. The National Council shall utilize the services and facilities of the OCD as the secretariat of the National Council.

Section 9. *Powers and Functions of the OCD.* - The OCD shall have the following powers and functions:

(a) Advise the National Council on matters relating to disaster risk reduction and management consistent with the policies and scope as defined in this Act;

- (b) Formulate and implement the NDRRMP and ensure that the physical framework, social, economic and environmental plans of communities, cities, municipalities and provinces are consistent with such plan. The National Council shall approve the NDRRMP;
- (c) Identify, assess and prioritize hazards and risks in consultation with key stakeholders;
- (d) Develop and ensure the implementation of national standards in carrying out disaster risk reduction programs including preparedness, mitigation, prevention, response and rehabilitation works, from data collection and analysis, planning, implementation, monitoring and evaluation;
- (e) Review and evaluate the Local Disaster risk Reduction and Management Plans (LDRRMPs) to facilitate the integration of disaster risk reduction measures into the local Comprehensive Development Plan (CDP) and Comprehensive Land-Use Plan (CL UP);
- (f) Ensure that the LGUs, through the Local Disaster Risk Reduction and Management Offices (LDRRMOs) are properly informed and adhere to the national standards and programs;
- (g) Formulate standard operating procedures for the deployment of rapid assessment teams, information sharing among different government agencies, and coordination before and after disasters at all levels:
- (h) Establish standard operating procedures on the communication system among provincial, city, municipal, and barangay disaster risk reduction and management councils, for purposes of warning and alerting them and for gathering information on disaster areas before, during and after disasters;
- (i) Establish Disaster Risk Reduction and Management Training Institutes in such suitable location as may be deemed appropriate to train public and private individuals, both local and national, in such subject as disaster risk reduction and management among others. The Institute shall consolidate and prepare training materials and publications of disaster risk reduction and management books and manuals to assist disaster risk reduction and management workers in the planning and implementation of this program and projects. The Institute shall conduct research programs to upgrade know ledge and skills and document best practices on disaster risk reduction and management. The Institute is also mandated to conduct periodic

awareness and education programs to accommodate new elective officials and members of the LDRRMCs;

- (j) Ensure that all disaster risk reduction programs, projects and activities requiring regional and international support shall be in accordance with duly established national policies and aligned with international agreements;
- (k) Ensure that government agencies and LGUs give toppriority and take adequate and appropriate measures in disaster risk reduction and management;
- (l) Create an enabling environment for substantial and sustainable participation of CSOs, private groups, volunteers and communities, and recognize their contributions in the government's disaster risk reduction efforts:
- (m) Conduct early recovery and post-disaster needs assessment institutionalizing gender analysis as part of it;
- (n) Establish an operating facility to be known as the National Disaster Risk Reduction and Management Operations Center (NDRRMOC) that shall be operated and staffed on a twenty-four (24) hour basis;
- (o) Prepare the criteria and procedure for the enlistment of accredited community disaster volunteers (ACDVs). It shall include a manual of operations for the volunteers which shall be developed by the OCD in consultation with various stakeholders;
- (p) Provide advice and technical assistance and assist in mobilizing necessary resources to increase the overall capacity of LGUs, specifically the low income and in high-risk areas;
- (q) Create the necessary offices to perform its mandate as provided under this Act; and
- (r) Perform such other functions as may be necessary for effective operations and implementation of this Act.

Section 10. Disaster Risk Reduction and Management Organization at the Regional Level. - The current Regional Disaster Coordinating Councils shall henceforth be known as the Regional Disaster Risk Reduction and Management Councils (RDRRMCs) which shall coordinate, integrate, supervise, and evaluate the activities of the LDRRMCs. The RDRRMC shall be responsible in ensuring disaster sensitive regional development plans, and

in case of emergencies shall convene the different regional line agencies and concerned institutions and authorities.

The RDRRMCs shall establish an operating facility to be known as the Regional Disaster Risk Reduction and Management Operations Center (RDRRMOC) whenever necessary.

The Civil Defense Officers of the OCD who are or may be designated as Regional Directors of the OCD shall serve as chairpersons of the RDRRMCs. Its Vice Chairpersons shall be the Regional Directors of the DSWD, the DILG, the DOST, and the NEDA. In the case of the Autonomous Region in Muslim Mindanao (ARMM), the Regional Governor shall be the RDRRMC Chairperson. The existing regional offices of the OCD shall serve as secretariat of the RDRRMCs. The RDRRMCs shall be composed of the executives of regional offices and field stations at the regional level of the government agencies.

Section 11. Organization at the Local Government Level. - The existing Provincial, City, and Municipal Disaster Coordinating Councils shall henceforth be known as the Provincial, City, and Municipal Disaster Risk Reduction and Management Councils. The Barangay Disaster Coordinating Councils shall cease to exist and its powers and functions shall henceforth be assumed by the existing Barangay Development Councils (BDCs) which shall serve as the LDRRMCs in every barangay.

- (a) Composition: The LDRRMC shall be composed of, but not limited to, the following:
 - (1) The Local Chief Executives, Chairperson;
 - (2) The Local Planning and Development Officer, member;
 - (3) The Head of the LDRRMO, member;
 - (4) The Head of the Local Social Welfare and Development Office, member;
 - (5) The Head of the Local Health Office, member;
 - (6) The Head of the Local Agriculture Office, member;
 - (7) The Head of the Gender and Development Office, member;
 - (8) The Head of the Local Engineering Office, member;

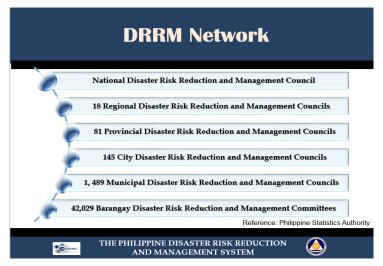
- (9) The Head of the Local Veterinary Office, member;
- (10) The Head of the Local Budget Office, member;
- (11) The Division Head/Superintendent of Schools of the DepED, member;
- (12) The highest-ranking officer of the Armed Forces of the Philippines (AFP) assigned in the area, member;
- (13) The Provincial Director/City/Municipal Chief of the Philippine National Police (PNP), member;
- (14) The Provincial Director/City/ Municipal Fire Marshall of the Bureau of Fire Protection (BFP), member;
- (15) The President of the Association of Barangay Captains (ABC), member;
- (16) The Philippine National Red Cross (PNRC), member;
- (17) Four (4) accredited CSOs, members; and
- (18) One (1) private sector representative, member.
- (b) The LDRRMCs shall have the following functions:
 - (1) Approve, monitor and evaluate the implementation of the LDRRMPs and regularly review and test the plan consistent with other national and local planning programs;
 - (2) Ensure the integration of disaster risk reduction and climate change adaptation into local development plans, programs and budgets as a strategy in sustainable development and poverty reduction;
 - (3) Recommend the implementation of forced or preemptive evacuation of local residents, if necessary; and
 - (4) Convene the local council once every three (3) months or as necessary.
- **Section 12.** Local Disaster Risk Reduction and Management Office (LDRRMO). (a) There shall be established an LDRRMO in every province, city and municipality, and a Barangay Disaster Risk Reduction and

Management Committee (BDRRMC) in every barangay which shall be responsible for setting the direction, development, implementation and coordination of disaster risk management programs within their territorial jurisdiction.

- (b) The LDRRMO shall be under the office of the governor, city or municipal mayor, and the punong barangay in case of the BDRRMC. The LDRRMOs shall be initially organized and composed of a DRRMO to be assisted by three (3) staff responsible for: (1) administration and training; (2) research and planning; and (3) operations and warning. The LDRRMOs and the BDRRMCs shall organize, train and directly supervise the local emergency response teams and the ACDVs.
- (c) The provincial, city and municipal DRRMOs or BDRRMCs shall perform the following functions with impartiality given the emerging challenges brought by disasters of our times:
 - (1) Design, program, and coordinate disaster risk reduction and management activities consistent with the National Council's standards and guidelines;
 - (2) Facilitate and support risk assessments and contingency planning activities at the local level;
 - (3) Consolidate local disaster risk information which includes natural hazards, vulnerabilities, and climate change risks, and maintain a local risk map;
 - (4) Organize and conduct training, orientation, and knowledge management activities on disaster risk reduction and management at the local level;
 - (5) Operate a multi-hazard early warning system, linked to disaster risk reduction to provide accurate and timely advice to national or local emergency response organizations and to the general public, through diverse mass media, particularly radio, landline communications, and technologies for communication within rural communities;
 - (6) Formulate and implement a comprehensive and integrated LDRRMP in accordance with the national, regional and provincial framework, and policies on disaster risk reduction in close coordination with the local development councils (LDCs);

- (7) Prepare and submit to the local sanggunian through the LDRRMC and the LDC the annual LDRRMO Plan and budget, the proposed programming of the LDRRMF, other dedicated disaster risk reduction and management resources, and other regular funding source/s and budgetary support of the LDRRMO/BDRRMC;
- (8) Conduct continuous disaster monitoring and mobilize instrumentalities and entities of the LGUs, CSOs, private groups and organized volunteers, to utilize their facilities and resources for the protection and preservation of life and properties during emergencies in accordance with existing policies and procedures;
- (9) Identify, assess and manage the hazards vulnerabilities and risks that may occur in their locality;
- (10) Disseminate information and raise public awareness about those hazards. vulnerabilities and risks, their nature, effects, early warning signs and counter-measures;
- (11) Identify and implement cost-effective risk reduction measures/strategies;
- (12) Maintain a database of human resource, equipment, directories, and location of critical infrastructures and their capacities such as hospitals and evacuation centers;
- (13) Develop, strengthen and operationalize mechanisms for partnership or networking with the private sector, CSOs, and volunteer groups;
- (14) Take all necessary steps on a continuing basis to maintain, provide, or arrange the provision of, or to otherwise make available, suitably-trained and competent personnel for effective civil defense and disaster risk reduction and management in its area;
- (15) Organize, train, equip and supervise the local emergency response teams and the ACDV s, ensuring that humanitarian aid workers are equipped with basic skills to assist mothers to breastfeed;
- (16) Respond to and manage the adverse effects of emergencies and carry out recovery activities in the affected area, ensuring that there is an efficient mechanism for immediate delivery of

- food, shelter and medical supplies for women and children, endeavor to create a special place where internally-displaced mothers can find help with breastfeeding, feed and care for their babies and give support to each other;
- (17) Within its area, promote and raise public awareness of and compliance with this Act and legislative provisions relevant to the purpose of this Act;
- (18) Serve as the secretariat and executive arm of the LDRRMC;
- (19) Coordinate other disaster risk reduction and management activities;
- (20) Establish linkage/network with other LGUs for disaster risk reduction and emergency response purposes;
- (21) Recommend through the LDRRMC the enactment of local ordinances consistent with the requirements of this Act;
- (22) Implement policies, approved plans and programs of the LDRRMC consistent with the policies and guidelines laid down in this Act;
- (23) Establish a Provincial/City/Municipal/Barangay Disaster Risk Reduction and Management Operations Center;
- (24) Prepare and submit, through the LDRRMC and the LDC, the report on the utilization of the LDRRMF and other dedicated disaster risk reduction and management resources to the local Commission on Audit (COA), copy furnished the regional director of the OCD and the Local Government Operations Officer of the DILG; and
- (25) Act on other matters that may be authorized by the LDRRMC.
- (d) The BDRRMC shall be a regular committee of the existing BDC and shall be subject thereto. The punong barangay shall facilitate and ensure the participation of at least two (2) CSO representatives from existing and active community-based people's organizations representing the most vulnerable and marginalized groups in the barangay.



Philippine DRRM Networks

Section

13. Accreditation, Mobilization, and Protection of Disaster Volunteers and National Service Reserve Corps, CSOs and the Private Sector. The government agencies, CSOs, private sector and LGUs may mobilize individuals or organized volunteers to augment their respective personnel complement and logistical requirements in the delivery of disaster risk reduction programs and activities. The agencies, CSOs, private sector, and LGUs concerned shall take full responsibility for the enhancement, welfare and protection of volunteers, and shall submit the list of volunteers to the OCD, through the LDRRMOs, for accreditation and inclusion in the database of community disaster volunteers.

A national roster of ACDVs, National Service Reserve Corps, CSOs and the private sector shall be maintained by the OCD through the LDRRMOs. Accreditation shall be done at the municipal or city level.

Mobilization of volunteers shall be in accordance with the guidelines to be formulated by the NDRRMC consistent with the provisions of this Act. Any volunteer who incurs death or injury while engaged in any of the activities defined under this Act shall be entitled to compensatory benefits and individual personnel accident insurance as may be defined under the guidelines.

Section 14. Integration of Disaster Risk Reduction Education into the School Curricula and Sangguniang Kabataan (SK) Program and Mandatory Training for the Public Sector Employees. - The DepED, the CHED, the Technical Education and Skills Development Authority (TESDA), in coordination with the OCD, the National Youth Commission (NYC), the DOST, the DENR, the DILG-BFP, the DOH, the DSWD and other relevant agencies, shall integrate

disaster risk reduction and management education in the school curricula of secondary and tertiary level of education, including the National Service Training Program (NSTP), whether private or public, including formal and nonformal, technical-vocational, indigenous learning, and out-of-school youth courses and programs.

The NDRRMC, the RDRRMCs, the LDRRMCs, the LDRRMOs, the BDRRMCs and the SK councils shall encourage community, specifically the youth, participation in disaster risk reduction and management activities, such as organizing quick response groups, particularly in identified disaster-prone areas, as well as the inclusion of disaster risk reduction and management programs as part of the SK programs and projects.

The public sector employees shall be trained in emergency response and preparedness. The training is mandatory for such employees to comply with the provisions of this Act.

Section 15. Coordination During Emergencies. - The LDRRMCs shall take the lead in preparing for, responding to, and recovering from the effects of any disaster based on the following criteria:

- (a) The BDC, if a barangay is affected;
- (b) The city/municipal DRRMCs, If two (2) or more barangays are affected;
- (c) The provincial DRRMC, if two (2) or more cities/municipalities are affected;
- (d) The regional DRRMC, if two (2) or more provinces are affected; and
- (e) The NDRRMC, if two (2) or more regions are affected.

Coordination during Emergencies

Barangay DRRM Committee	1 Barangay affected
City/Municipal DRRMC	2 or more Barangays affected
Provincial DRRMC	2 or more Cities/Municipalities affected
Regional DRRMC	2 or more Provinces affected
NDRRMC	2 or more Regions affected

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THE PHILIPPINE DISASTER RISK REDUCTION

AND MANAGEMENT SYSTEM

The NDRRMC and intermediary LDRRMCs shall always act as support to LGUs which have the primary responsibility as first disaster responders. Private sector and civil society groups shall work in accordance with the coordination mechanism and policies set by the NDRRMC and concerned LDRRMCs.

Section 16. Declaration of State of Calamity. - The National Council shall recommend to the President of the Philippines the declaration of a cluster of barangays, municipalities, cities, provinces, and regions under a state of calamity, and the lifting thereof, based on the criteria set by the National Council. The President's declaration may warrant international humanitarian assistance as deemed necessary.

The declaration and lifting of the state of calamity may also be issued by the local sanggunian, upon the recommendation of the LDRRMC, based on the results of the damage assessment and needs analysis.

Section 17. Remedial Measures. - The declaration of a state of calamity shall make mandatory the Immediate undertaking of the following remedial measures by the member-agencies concerned as defined in this Act:

- (a) Imposition of price ceiling on basic necessities and prime commodities by the President upon the recommendation of the implementing agency as provided for under Republic Act No. 7581, otherwise known as the "Price Act", or the National Price Coordinating Council;
- (b) Monitoring, prevention and control by the Local Price Coordination Council of overpricing/profiteering and hoarding of prime commodities, medicines and petroleum products;
- (c) Programming/reprogramming of funds for the repair and safety upgrading of public infrastructures and facilities; and
- (d) Granting of no-interest loans by government financing or lending institutions to the most affected section of the population through their cooperatives or people's organizations.

Section 18. *Mechanism for International Humanitarian Assistance*. - (a) The importation and donation of food, clothing, medicine and equipment for relief and recovery and other disaster management and recovery-related supplies is hereby authorized in accordance with Section 105 of the Tariff and Customs Code of the Philippines, as amended, and the prevailing provisions of

the General Appropriations Act covering national internal revenue taxes and import duties of national and local government agencies; and

- (b) Importations and donations under this section shall be considered as importation by and/or donation to the NDRRMC, subject to the approval of the Office of the President.
- **Section 19.** *Prohibited Acts.* Any person, group or corporation who commits any of the following prohibited acts shall be held liable and be subjected to the penalties as prescribed in Section 20 of this Act:
 - (a) Dereliction of duties which leads to destruction, loss of lives, critical damage of facilities and misuse of funds;
 - (b) Preventing the entry and distribution of relief goods in disasterstricken areas, including appropriate technology, tools, equipment, accessories, disaster teams/experts;
 - (c) Buying, for consumption or resale, from disaster relief agencies any relief goods, equipment or other and commodities which are intended for distribution to disaster affected communities;
 - (d) Buying, for consumption or resale, from the recipient disaster affected persons any relief goods, equipment or other aid commodities received by them;
 - (e) Selling of relief goods, equipment or other aid commodities which are intended for distribution to disaster victims:
 - (f) Forcibly seizing relief goods, equipment or other aid commodities intended for or consigned to a specific group of victims or relief agency;
 - (g) Diverting or misdelivery of relief goods, equipment or other aid commodities to persons other than the rightful recipient or consignee;
 - (h) Accepting, possessing, using or disposing relief goods, equipment or other aid commodities not intended for nor consigned to him/her;
 - (i) Misrepresenting the source of relief goods, equipment or other aid commodities by:
 - (1) Either covering, replacing or defacing the labels of the containers to make it appear that the goods, equipment or other aid commodities came from another agency or persons;

- (2) Repacking the! goods, equipment or other aid commodities into containers with different markings to make it appear that the goods came from another agency or persons or was released upon the instance of a particular agency or persons;
- (3) Making false verbal claim that the goods, equipment or other and commodity m its untampered original containers actually came from another agency or persons or was released upon the instance of a particular agency or persons;
- (j) Substituting or replacing relief goods, equipment or other aid commodities with the same items or inferior/cheaper quality;
- (k) Illegal solicitations by persons or organizations representing others as defined in the standards and guidelines set by the NDRRMC;
- (l) Deliberate use of false at inflated data in support of the request for funding, relief goods, equipment or other aid commodities for emergency assistance or livelihood projects; and
- (m) Tampering with or stealing hazard monitoring and disaster preparedness equipment and paraphernalia.

Section 20. Penal Clause. - Any individual, corporation, partnership, association, or other juridical entity that commits any of the prohibited acts provided for in Section 19 of this Act shall be prosecuted and upon conviction shall suffer a fine of not less than Fifty thousand pesos (Php50,000.00) or any amount not to exceed Five hundred thousand pesos (php500,000.00) or imprisonment of not less than six (6) years and one (1) day or more than twelve (12) years, or both, at the discretion of the court, including perpetual disqualification from public office if the offender IS a public officer, and confiscation or forfeiture in favor of the government of the objects and the instrumentalities used in committing any of herein prohibited acts.

If the offender is a corporation, partnership or association, or other juridical entity, the penalty shall be imposed upon the officer or officers of the corporation, partnership, association or entity responsible for the violation without prejudice to the cancellation or revocation of these entities license or accreditation issued to them by any licensing or accredited body of the government. If such offender is an alien, he or she shall, in addition to the penalties prescribed in this Act, be deported without further proceedings after service of the sentence.

However, the prosecution for offenses set forth in Section 19 of this Act shall be without prejudice to any liability for violation of Republic Act No. 3185, as

amended, otherwise known as the Revised Penal Code, and other civil liabilities.

Section 21. Local Disaster Risk" Reduction and Management Fund (LDRRMF). The present Local Calamity Fund shall henceforth be known as the Local Disaster Risk Reduction and Management Fund (LDRRMF). Not less than five percent (5%) of the estimated revenue from regular sources shall be set aside as the LDRRMF to support disaster risk management activities such as, but not limited to, pre-disaster preparedness programs including training, purchasing life-saving rescue equipment, supplies and medicines, for post-disaster activities, and for the payment of premiums on calamity insurance. The LDRRMC shall monitor and evaluate the use and disbursement of the LDRRMF based on the. LDRRMP as incorporated in the local development plans and annual work and financial plan. Upon the recommendation of the LDRRMO and approval of the sanggunian concerned, the LDRRMC may transfer the said fund to support disaster risk reduction work of other LDRRMCs which are declared under state of calamity.

Of the amount appropriated for LDRRMF, thirty percent (30%) shall be allocated as Quick Response Fund (QRF) or stand-by fund for relief and recovery programs in order that situation and living conditions of people In communities or areas stricken by disasters, calamities, epidemics, or complex emergencies, may be normalized as quickly as possible.

Unexpended LDRRMF shall accrue to a special trust fund solely for the purpose of supporting disaster risk reduction and management activities of the LDRRMCs within the next five (5) years. Any such amount still not fully utilized after five (5) years shall revert back to the general fund and will be available for other social services to be identified by the local sanggunian.

Section 22. National Disaster Risk" Reduction and Management Fund. - (a) The present Calamity Fund appropriated under the annual General Appropriations Act shall henceforth be known as the National Disaster Risk Reduction and Management Fund (NDRRM Fund) and it shall be used for disaster risk reduction or mitigation, prevention and preparedness activities such as but not limited to training of personnel, procurement of equipment, and capital expenditures. It can also be utilized for relief, recovery, reconstruction and other work or services in connection with natural or human induced calamities which may occur during the budget year or those that occurred in the past two (2) years from the budget year.

(b) The specific amount of the NDRRM Fund and the appropriate recipient agencies and/or LGUs shall be determined upon approval of the President of the Philippines in accordance with the favorable recommendation of the NDRRMC.

- (c) Of the amount appropriated for the NDRRM Fund, thirty percent (30%) shall be allocated as Quick Response Fund (QRF) or stand-by fund for relief and recovery programs in order that situation and living conditions of people in communities or areas stricken by disasters, calamities, epidemics, or complex emergencies, may be normalized as quickly as possible.
- (d) All departments/agencies and LGUs that are allocated with DRRM fund shall submit to the NDRRMC their monthly statements on the utilization of DRRM funds and make an accounting thereof in accordance with existing accounting and auditing rules.
- (e) All departments, bureaus, offices and agencies of the government are hereby authorized to use a portion of their appropriations to implement projects designed to address DRRM activities in accordance with the guidelines to be issued by the NDRRMC in coordination with the DBM.
- **Section 23.** *Funding of the OCD.* As lead agency to carry out the provisions of this Act, the OCD shall be allocated a budget of One billion pesos (Php1,000,000,000.00) revolving fund starting from the effectivity of this Act.
- **Section 24.** *Annual Report*. The National Council, through the OCD, shall submit to the Office of the President, the Senate and the House of Representatives, within the first quarter of the succeeding year, an annual report relating to the progress of the implementation of the NDRRMP.
- Section 25. Implementing Rules and Regulations. The NDRRMC. through its Chairperson. shall issue the necessary rules and regulations for the effective implementation of this Act within ninety (90) days after approval of this Act. The OCD. in consultation with key stakeholders, shall take the lead in the preparation of the implementing rules and regulations with the active involvement of the technical management group of the NDRRMC.
- Section 26. Congressional Oversight Committee. There is hereby created a Congressional Oversight Committee to monitor and oversee the implementation of the provisions of this Act. The Committee shall be composed of six (6) members from the Senate and six (6) members from the House of Representatives with the Chairpersons of the Committees on National Defense and Security of both the Senate and the House of Representatives as joint Chairpersons of this Committee. The five (5) other members from each Chamber are to be designated by the Senate President and the Speaker of the House of Representatives. respectively. The minority shall be entitled to pro rata represent3tion but shall have at least two (2) representatives from each Chamber.

Section 27. *Sunset Review.* - Within five (5) years after the effectivity of this Act, or as the need arises, the Congressional Oversight Committee shall conduct a sunset review. For purposes of this Act, the term "sunset review" shall mean a systematic evaluation by the Congressional Oversight Committee of the accomplishments and impact of this Act, as well as the performance and organizational structure of its implementing agencies, for purposes of determining remedial legislation.

Section 28. *Repealing Clause.* - Presidential Decree No. 1566 and all other laws, decrees, executive orders, proclamations and other executive issuance's which are inconsistent with or contrary to the provisions of this Act are hereby amended or repealed accordingly.

Section 29. *Separability Clause.* - If any provision of this Act shall be held unconstitutional or invalid, the other provisions not otherwise affected shall remain m full force and effect.

Section 30. *Effectivity Clause.* - This Act shall take effect fifteen (15) days following its complete publication in the Official Gazette or in two (2) national newspapers of general circulation.

Approved,

(Sgd.) PROSPERO

NOGRALES

Speaker of the House of
Representatives

C. (Sgd.) JUAN PONCE ENRILE

President of the Senate

of

This Act which is a consolidation of Senate Bill No. 3086 and House Bill No. 6985 was finally passed by the Senate and the House of Representatives on February 1, 2010.

(Sgd.) MARILYN B. BARUA- (Sgd.) EMMA LIRIO-REYES YAP Secretary of Senate Secretary

House of Representatives

Approved: **May 27, 2010**

(Sgd.) **GLORIA**President of the Philippines

MACAPAGAL-ARROYO

2.2 JAPAN DISASTER COUNTERMEASURES BASIC ACT

DISASTER COUNTERMEASURES BASIC ACT June 1997 National Land Agency, Japan DISASTER COUNTERMEASURES BASIC ACT (Act No. 223, November 15, 1961)

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- IX. Chapter IX. Miscellaneous Rules (art. 110 art. 112)
- X. Chapter X. Penal Provisions (art. 113 - art. 117) Supplementary Rules 1 Chapter I General Rules (Objectives) Art. 1. For the purpose of protecting the national territory, the life and limb of the citizens and their property, this Act shall have for its aim the establishment of a machinery working through the State and local governments and public corporations and the clarification of where responsibilities lie, and provide for the formulation of disaster prevention plans and basic policies relating to preventive and emergency measures and rehabilitation programs to deal with disaster, and other necessary measures as well as financial action, thus ensuring an effective and organized administration of comprehensive and systematic disaster prevention with a view toward the preservation of social order and the security of the public welfare. (Definitions) Art. 2. Terms employed in this Act shall be as defined below: (1)Disaster means a storm, heavy rain, heavy snow, flood, high tide, earthquake, tsunami, or other unusual natural event, or a conflagration or explosion, or any other damage of similar extent from a cause to be prescribed by ordinance. (2)Disaster prevention means activities intended to prevent a disaster from occurring, to stop the spread of a disaster

that has occurred, and to effect rehabilitation after the disaster. (3) Designated administrative organs means administrative organs of the State as defined under art. 3 para. 2 of the National Government Organization Act (Act No. 120, 1948) and organs defined under art. 8 para. 1 of the same Act, to be designated by the Prime Minister. (4)Designated local administrative organs means branch offices of designated administrative organs in the prefectures (referring to branch offices provided under art. 9 of the National Government Organization Act) and other local administrative organs of the State designated by the Prime Minister. (5)Designated public corporations means public corporations such as Nippon Telegraph and Telephone (NTT), the Bank of Japan, the Japanese Red Cross Society, Nippon Hoso Kyokai (NHK) and other corporations engaged in power, gas, transportation, communication and other public utility work, all designated by the Prime Minister. (6)Designated local public corporations means the Harbor Bureau under art. 4 para. 1 of the Harbor Act (Act No. 218, 1950), Land Improvement Districts under art. 5 para. 1 of the Land Improvement Act 2 (Act No. 195, 1949), administrators of other public corporations operating in the area of prefecture and engaged in power, gas, transportation, communication and other public utility work, all designated by the governor of the prefecture concerned. (7)Disaster prevention plans

means a basic disaster prevention plan, operational disaster prevention plans, and local disaster prevention plans. (8) Basic disaster prevention plan means a plan drafted by the Central Disaster Prevention Council providing guidance for all disaster prevention planning. (9)Operational disaster prevention plans means plans based on the basic disaster prevention plan and pertaining to business or operations of the drafting authority: the chief officer of a designated administrative organ (where the designated administrative organ is the committee under art. 3 para. 2 of the National Government Organization Act, the administrative organ itself; to be applicable hereunder except under art. 28-3 para. 6 and art. 28-6 para. 2) or a designated public corporation (with respect to business or operations delegated by the chief officer of a designated administrative organ or a designated public corporation, the chief officer of the designated local administrative organ or the designated local public corporation to whom or to which said delegation has been made). (10)Local disaster prevention plans means disaster prevention plans relating to particular areas as listed below: a. prefectural area disaster prevention plan: drafted by the prefectural disaster prevention council concerned and relating to an area of the prefecture. b. city, town, or village area disaster prevention plan: drafted by the city, town, or village disaster

prevention council concerned and relating to an area of the city, town or village. c. prefectural designated area disaster prevention plan: drafted by a joint committee of prefectural disaster prevention councils and relating to an area which covers the area of two or more prefectures, in whole or in part. d. city, town or village designated area disaster prevention plans: drafted by a joint committee of city, town or village disaster prevention councils and relating to an area which covers the area of two or more cities, towns or villages. (Responsibilities of the State) Art. 3. Inasmuch as the State has the mission of protecting its land, the life and limb of its citizens and 3 their property from disaster, it is responsible for bringing to bear on disaster prevention all of its organization and capacities to the fullest effect. 2. In order to carry out such responsibilities as provided under the preceding paragraph, the State shall draft a plan which will provide a basis for disaster prevention, emergency measures to deal with a disaster and rehabilitation after that disaster, and shall implement the plan by law. At the same time, the State shall ensure the performance of business or operations relating to disaster prevention to be undertaken by local governments, designated public corporations, and designated local public corporations and others, exercise overall coordination of said business or operations and seek to distribute fairly, adequately and properly financial burdens

consequent upon disaster. 3. Designated national and local administrative organs shall, in performing their respective business, act in concert in order that the responsibilities of the State provided under para. 1 may be fulfilled. 4. The chief officer of either a designated national or local administrative organ shall, in the interests of an effective formulation and execution of a prefectural, or a city, town or village disaster prevention plan, provide recommendations, guidance, advice and other pertinent assistance to the appropriate prefecture, or city, town or village. (Responsibilities of the prefecture) Art. 4. In the interest of protecting the area of a prefecture, the life and limb of its residents and their property from disaster, the prefecture shall have the responsibility to formulate and implement, with the cooperation of agencies concerned and other local governments, a disaster prevention plan relating to its area, as prescribed by law, and at the same time, shall assist in the performance of business or operations related to disaster prevention of a city, town or village, and designated local administrative organs within the area, and shall exercise responsibility for overall coordination of such business or operations. 2. Agencies of a prefecture shall, in performing their business or operations, act in concert in order that responsibilities of the prefecture as provided under the preceding paragraph may be fulfilled. (Responsibilities of

a city, town or village) Art. 5. In the interest of protecting the area of a city, town or village, the life and limb of its residents and their property from disaster, the city, town or village as a local government at the base shall have the responsibility to formulate, with the cooperation of related agencies and other local governments a disaster prevention plan pertaining to the area of said city, town or village, and to implement said plan as provided by law. 4 2. The mayor of the city or town or the head of the village shall, in order to fulfill responsibilities under the preceding paragraph, endeavor to employ to the highest degree all capacities of the city, town or village, by keeping the organization of fire fighting agencies, flood prevention units etc. in good condition, and by consolidating organizations related to disaster prevention of public groups within the area of the city, town or village and voluntary disaster prevention groups (referred to as "voluntary disaster prevention groups" in art. 8 para. 2) among the residents in a community spirit of mutual help. 3. Fire fighting agencies, flood prevention units and other agencies of the city, town or village shall, in performing their respective business, act in concert in order that the responsibilities of the city, town or village as prescribed under the preceding paragraph may be fulfilled. (Mutual cooperation among local public corporations) Art. 5-2. The local government can mutually cooperate when necessary to fully

discharge their responsibilities as set forth in art. 4 para. 1 and para. 1 of the preceding article. (Responsibilities of designated national and local public corporations) Art. 6. Designated national and local public corporations shall have the responsibility to formulate a disaster prevention plan pertaining to their respective business and to implement it as prescribed by law, and at the same time, to render cooperation in their respective activities to the prefecture, city, town or village in order that the State, prefecture, city town or village may effectively formulate and implement their disaster prevention plans as provided by this Act. 2. Designated national and local public corporations are obligated to contribute through their respective businesses toward the cause of disaster prevention, in view of the fact that their business is for the public good. (Responsibilities of residents and others) Art. 7. Public organizations, administrators of establishments important in terms of disaster prevention, and other parties having responsibility under the Act for disaster prevention, are obligated, by law or under an appropriate area disaster prevention plan, to fulfill their responsibilities in good faith. 2. In addition to what is provided for in the preceding paragraph, residents of the area under local government are obligated to contribute toward the cause of disaster prevention by taking their own measures to prepare for disaster and by participating in

voluntary disaster prevention groups etc. 5 (Exercising of care in the interest of disaster prevention in enforcing appropriate measures) Art. 8. Both the State and the local government should exercise care so that all measures which they will carry out will contribute to preventing disaster which harms the land, the life and limb of the citizens and their property, be they specifically addressed to disaster or not. 2. In the interest of preventing a disaster from occurring and of blocking the spread of a disaster that has occurred, the local government as well as the State shall particularly endeavor to carry out matters listed below: (1) relating to scientific research on disaster and its prevention and putting its findings into practice. (2) relating to forest conservation, flood prevention and other matters concerning conservation of the land. (3) relating to fireproofing of buildings and to the improvement of structures for prevention of disaster in the cities. (4) relating to disaster prevention measures for traffic, information communications, and functions concentrated in urban areas. (5) relating to efficient operation of establishments and organizations concerned with activities necessary for disaster prevention such as weather observation and flood and earthquake prediction, forecasting, information gathering and other activities, establishments and and organizations with concerned communication. (6) relating to the improvement of forecasts and

alarms. (7) relating to the improvement of methods for publicizing earthquake forecasting information (refers to "earthquake forecasting information" as per art. 2 (3) of the Large-scale Earthquake Countermeasures Act [Act No. 713 of 1978]). (8) relating to international cooperation with respect to consolidation of a network of weather observation. (9) relating to international cooperation with respect to human control of typhoons, and other necessary research on disaster prevention, observation and exchange of information. (10) relating to measures for long-term disasters from volcanic phenomena etc. 6 (11) relating to maintenance of efficient operation of establishments and organizations for flood prevention, fire fighting, rescue and relief, and other disaster emergency measures. (12) relating to the conclusion of mutual aid agreements among local governments. (13) relating to the encouragement of the people to engage in voluntary disaster prevention activities by fostering voluntary disaster prevention groups and enhancing the environment for disaster prevention activities by volunteers. (14) relating to necessary disaster prevention measures for the elderly, the handicapped, infants and others requiring special care. (15) relating to the acceptance of disaster prevention assistance from other countries. (16) relating to the provision of accurate information to disaster victims. (17) relating to education and drills necessary for

disaster prevention. (18) relating to the dissemination of ideas about the importance of disaster prevention. 3. The State and the local government shall endeavor, in time of a disaster, to effect rehabilitation of establishments, and rescue and relief for victims toward an early recovery from the disaster. (Government measures and report to the Diet) Art. 9. The Government shall undertake necessary measures in terms of legislation and finances in order to achieve the objectives of this Act. 2. The Government shall report each year to the Diet about its plans for disaster prevention together with a general account of measures undertaken for disaster prevention, as provided by ordinance. (Relation to other Acts) Art. 10. Masters concerning disaster prevention shall be disposed of by this Act except where specified by law otherwise. 7 Chapter II Organization for Disaster Prevention Section I Central Disaster Prevention Council (The Council and its business) Art. 11. A Central Disaster Prevention Council Shall be established in the Office of the Prime Minister. 2. The Central Disaster Prevention Council shall be charge with the responsibilities listed below: (1) formulation and implementation of a basic disaster prevention plan. (2) formulation and implementation of a plan of emergency measures for a major disaster. (3)in response to inquiry from the Prime Minister, deliberation of major matters relating to disaster prevention. (4)in

addition to what is listed above, other business assigned by law to its authority. 3. The Prime Minister is required to consult the Central Disaster Prevention Council with respect to the matters listed below: (1)basic policy of disaster prevention. (2)major points in overall coordination of measures undertaken for disaster prevention. (3)outline of urgent measures of temporary nature for a major disaster. (4)declaration of a state of emergency. (5)other major matters which the Prime Minister may deem necessary for disaster prevention. (Organization of the Central Disaster Prevention Council) Art. 12. The Central Disaster Prevention Council shall be composed of a chairman and members. 2. The Prime Minister shall serve as chairman. 3. The chairman shall direct and supervise the affairs of the Council. 8 4. In case of incapacity on the part of the chairman, a member named by him in advance shall perform his duties on his behalf. 5. The chairman shall appoint the members from among ministers of state and persons with pertinent knowledge and experience. 6. Technical experts may be appointed to the Council in order to investigate matters requiring expert knowledge. 7. The Prime Minister shall appoint expert members from among officials appropriate administrative organs or designated public corporations and persons with pertinent knowledge and experience.

8. A secretariat shall be established in the Central Disaster

Prevention Council to transact the business of the Council. 9. The secretariat shall have a chief and members under him. 10. The secretariat shall manage its affairs under the direction of its chief. 11. In addition to what is listed above, necessary matters related to the organization and operation of the Council shall be decided upon for cooperation bv ordinance. (Request from appropriate administrative organs, etc.) Art. 13. The Central Disaster Prevention Council shall have the right, with respect to its business, to seek data, opinions and views and other necessary cooperation from the chief officer of an appropriate national or local administrative organ, that of a local government, any executive agency, or designated public corporation or designated local public corporation, or any other parties concerned. 2. The Central Disaster Prevention Council shall have the right to make recommendations or provide instructions in connection with the respective activities to local disaster prevention councils (referring to the disaster prevention council of a prefecture, city, town or village; applicable hereunder) or joint committees or local disaster prevention councils (referring to a joint committee of prefectural, city, town or village disaster prevention councils; applicable hereunder). Section 2 Local Disaster Prevention Council (Establishment of a prefectural disaster prevention council and its business) 9 Art. 14. A prefectural disaster prevention council shall be established in each prefecture. 2. A prefectural disaster prevention council shall be in charge of business covering listed below: (1)formulation the matters and implementation of a prefectural area disaster prevention plan. (2) collection of information about a disaster that has occurred involving the area of said prefecture. (3) in time of a disaster involving the area of the prefecture, liaison and coordination in matters of emergency measures and rehabilitation programs among said prefecture and appropriate designated local administrative organs, the city town or village concerned, designated public corporations and designated local public corporations concerned. (4) formulation and implementation of a plan for emergency measures in time of a major disaster. (5)in addition to what is listed above, other business assigned to the council by law or an ordinance based on it. (Organization of a prefectural disaster prevention council) Art. 15. A prefectural disaster prevention council shall be composed of a chairman and its members. 2. The governor of the prefecture shall serve as chairman. 3. The chairman shall direct and supervise the affairs of the council. 4. When the chairman is incapacitated a member whom he has named in advance shall perform his duties on his behalf. 5. Members shall be appointed from among the following persons: (1)the chief officer of a designated local administrative

organ having jurisdiction over the area of the prefecture in whole or in part, or officials named by him. (2)the Commanding Generals of Army Headquarters of the Self-Defense Forces having jurisdiction over the area of the prefecture, in whole or in part, or chief of a unit or an agency named by the Commanding Generals. (3)the superintendent of a school board of the prefecture. 10 (4)the chief of the Metropolitan Police or the chief of the prefectural police concerned. (5)appointees of the governor of the prefecture from among officials of the prefecture. (6) appointees of the governor of the prefecture from among mayors of cities or towns, or heads of villages, and chiefs of fire fighting units operating within the area of the prefecture. (7)appointees of the governor of the prefecture from among officers and members of a designated national or local public corporation operating within the area of the prefecture. 6. Expert members may be appointed to the council in order to investigate matters requiring expert knowledge. 7. Expert members shall be appointed by the governor of the prefecture from among members of an appropriate local administrative organ, of the prefecture, of a city, town or village within the area of the prefecture, of an appropriate designated national or local public corporation, or persons with pertinent knowledge and experience. 8. In addition to what is provided above other necessary matters with respect to the

organization or operation or a prefectural disaster prevention council shall be decided by a prefectural ordinance based on standards provided by ordinance. (City, town, or village disaster prevention council) (A city, town or village disaster prevention council) Art. 16. A city, town or village disaster prevention council shall be established in each city, town or village in order to formulate an area disaster prevention council involving the area of the city, town or village, and to implement it. 2. In addition to what is provided in the preceding paragraph, cities, towns or villages may by mutual agreement establish jointly a city, town or village disaster prevention council. 3. When such a joint city, town, or village disaster prevention council has been established or when duly approved by the governor of the prefecture, as provided by ordinance, the city, town or village may dispense with a separate disaster prevention council, the provisions of paragraph 1 notwithstanding. 4. When the governor of the prefecture intends to give approval as provided under the preceding paragraph, he is required to consult the prefectural disaster prevention council. 11 5. The organization and business of a city, town or village disaster prevention council shall be decided following the model of the prefectural disaster prevention council by an ordinance of the city, town or village (in the case of a city, town or village council established as provided under para. 2, by agreement).

(Joint committee of local disaster prevention councils) Art. 17. When it is deemed necessary and efficacious among prefectures or among cities, towns or villages to formulate a disaster prevention plan for the designated area of the prefecture, city, town or village, in whole or in part, said prefectures, cities, towns or villages may by mutual agreement establish a joint committee of prefectural, city, town of village disaster prevention councils. 2. When such a joint committee of disaster prevention councils is formed, notification shall be forwarded to the Prime Minister in the case of a prefectural joint committee, and to the governor of the prefecture in the case of a city, town or village joint committee. (Establishing a joint committee of prefectural disaster prevention councils) Art. 18. When the Prime minister deems it necessary and efficacious to form a designated area prefectural disaster prevention plan covering the area of two or more prefectures, in whole or in part, he may, upon consultation with the Central Disaster Prevention Council, designate the area to be covered by such a plan, and instruct the appropriate prefectures to establish a joint committee of prefectural disaster prevention councils. 2. When the Prime Minister has designated such an area as provided under the preceding paragraph, he is required to make public this action. 3. When instructions have been given under paragraph 1, the prefectures so instructed are required to establish

a joint committee of prefectural disaster prevention councils. (Establishing a joint committee of city, town or village disaster prevention councils) Art. 19. When the governor of a prefecture deems it necessary and efficacious to formulate a designated area disaster prevention plan covering the area of two or more cities, towns or villages, in whole or in part, he may, upon consultation with the prefectural disaster prevention council, designate the area to be covered by such a plan, and instruct the appropriate cities, towns or villages to establish a joint committee of city, town or village councils. 2. When the governor of a prefecture has designated such an area as provided under the preceding paragraph, he is required to make public this action. 12 3. When instructions have been given under paragraph 1, the cities, towns or villages so instructed are required to establish a joint committee of city, town or village disaster prevention councils. (Matters for ordinance) Art. 20. In addition to what is provided under the three preceding articles, necessary matters with respect to local disaster prevention councils shall be decided by ordinance. (Request for cooperation from appropriate administrative organs) Art. 21. The prefectural disaster prevention council and city, town or village disaster prevention council (including a joint committee of local disaster prevention councils; hereinafter referred to as "local disaster prevention councils, etc.")

shall have the right, when deemed necessary in the performance of their business, to seek data, opinions and views and other necessary cooperation from the chief officer of an appropriate national or local administrative organ, that of a local government and other executive agency, a designated national or local public corporation, or other parties concerned. (Relations between local disaster prevention councils, etc.) Art. 22. Local disaster prevention councils etc. are obligated to cooperate in the performance of their respective business. 2. The prefectural disaster prevention council may provide the city, town or village disaster prevention councils with necessary recommendation or instructions with respect to the performance of their business. (Headquarters for disaster control) Art. 23. When a disaster has occurred or is likely to occur involving the area of a prefecture, city, town or village, the governor of the prefecture, the mayor of the city or town, or the head of the village may, if he deems it necessary, upon consultation with the local disaster prevention council, establish a headquarters for disaster control as provided under a prefectural or city, town or village area disaster prevention plan. 2. The headquarters for disaster control shall be headed by a chairman, and the governor of the prefecture, or the mayor of the city or town, or the head of the village shall serve as chairman at their respective levels. 3. The headquarters shall have a vice-chairman,

headquarters members and other officials, to be 13 appointed by the prefectural governor or the mayor of the city or town or the head of the village from among officials of the prefecture, city, town or village, as appropriate. 4. The headquarters for disaster control operating in close coordination with the local disaster prevention council, shall implement preventive and emergency measures involving the area of the prefecture or the city, town or village, as appropriately as provided under the prefectural area disaster prevention plan, or the city, town or village area disaster prevention plan. 5. The governor of the prefecture, the mayor of the city or town, or the head of the village may, as provided for under a prefectural or city, town or village area disaster prevention plan establish a local headquarters for disaster control within the headquarters for disaster control as an organization to carry out locally within the disaster area part of the duties of the headquarters for disaster control. 6. The chairman of the prefectural headquarters for disaster control shall have the right to give to the prefectural police or the prefectural board of education necessary instructions in the implementation of preventive or emergency measures against disaster involving the area of the prefecture; likewise, the chairman of the city, town or village headquarters for disaster control shall have the right to instruct the board of education of that city, town or

village. 7. In addition to what is provided above, other necessary matters of the headquarters for disaster control shall be decided by a prefectural, city, town or village ordinance. Section 3 Headquarters for Major Disaster Control and Emergency Disaster Control (Establishing the headquarters for major disaster control) Art. 24. When a major disaster has occurred and if deemed necessary because of the dimensions of the disaster and other conditions, the Prime Minister may establish a headquarters for major disaster control on a temporary basis in the Office of the Prime Minister, the provisions of art. 8-3 of the National Government Organization Act notwithstanding. 2. When such a headquarters is established, the Prime Minister is required to make public its designation, area of jurisdiction, location, and term of establishment; when it is abolished he is required to make this action public. (Organization of the headquarters) Art. 25. The headquarters for major disaster control shall be headed by a chairman selected from 14 among the Cabinet ministers. 2. The chairman of the headquarters for major disaster control shall direct the affairs of the headquarters and supervise its staff. 3. A vice-chairman, headquarters members and other officials shall be installed in the headquarters. 4. The vice-chairman of the headquarters shall assist the chairman and perform duties on behalf of the chairman when he is incapacitated. 5. The vice-chairman of the headquarters, headquarters members and other officials shall be appointed by the Prime Minister from among officials of designated administrative organs, of chief officers or members of designated local administrative organs. 6. A local headquarters for major disaster control may be established within the headquarters for major disaster control as an organization to carry out locally within the area of jurisdiction of the headquarters for major disaster control part of the duties of the headquarters for major disaster control as designated by the chairman of the headquarters for major disaster control. In such cases, the provisions of art. 156 para. 6 of the Local Governments Act (Act No. 67 of 1947) shall not apply. 7. When a local headquarters for major disaster control is established under the provisions of the preceding paragraph, the Prime Minister shall inform the Diet thereof immediately. 8. The provisions of para. 2 of the preceding article shall apply to local headquarters for major disaster control. 9. The local headquarters for major disaster control shall have a headquarters chairman, headquarters officials, and other staff. 10. The chairman of the local headquarters for major disaster control shall have responsibility for the business of the local headquarters for major disaster control under the orders of the chairman of the headquarters for major disaster control. 11. The chairman, officials, and staff of the local headquarters for major

disaster control shall be appointed by the chairman of the headquarters for major disaster control from among the vice chairmen, officials, and other staff of the headquarters for major disaster control. 15 (Business of the headquarters) Art. 26. The headquarters for major disaster control shall be responsible for the following matters: (1) relating to the overall coordination of emergency measures being taken under an appropriate disaster prevention plan within the area of its jurisdiction by the chief officer of a designated national or local administrative organ, the chief officer of a local government, or other executive agency, or a designated national or local public corporation. (2) relating to the implementation of a plan for urgent measures in time of a major disaster. (3) relating to business which is assigned under art. 28 to the authority of the chairman of the headquarters. (4)in addition to what is listed above, any business that may be assigned to his authority by law. (Delegation of authority of the chief officer of a designated administrative organ) Art. 27. The chief officer of a designated administrative organ may, upon establishment of the headquarters for major disaster control, delegate his authority for emergency measures, in whole or in part, to members of the designated administrative organ, or the chief officer of a designated local administrative organ or its members, all of whom are

headquarters members. 2. The chairman of the headquarters is required to make public any such delegation of authority he has made, as provided under the preceding paragraph. (Authority of the chairman of the headquarters) Art. 28. The chairman of the headquarters may exercise overall coordination of the exercise of authority, delegated under the preceding paragraph, by members of the headquarters within the area of jurisdiction of the headquarters for major disaster control. 2. When it is deemed particularly necessary in the interest of accurate and speedy implementation of emergency measures within the area of jurisdiction of the headquarters for major disaster control, the chairman of the headquarters may give necessary instructions to the chief officer of an appropriate designated local administrative organ, that of a local government, or any other executive agency, or a designated national or local public corporation. 3. When a local headquarters for major disaster control is established, the chairman of the headquarters 16 for major disaster control may delegate part of the authority vested in him in para. 2 above to the chairman of the local headquarters for major disaster control. 4. The chairman of the local headquarters for major disaster control shall immediately make it public when he has been delegated authority under the provisions of the preceding paragraph. (Establishment of headquarters for emergency disaster

control) Art. 28-2. Should a special need be recognized when pursuing emergency disaster response measures in the event of an extremely unusual or devastating disaster, the Prime Minister may, notwithstanding the provisions of art. 8-3 of the National Government Organizations Act, establish on an ad hoc basis and with cabinet approval a headquarters for emergency disaster control within the Prime Minister's Office. 2. The provisions of art. 24 para. 2 shall apply to the headquarters for emergency disaster control. 3. Should a headquarters for major disaster control already be in existence at the time a headquarters for emergency disaster control is establish under the provisions of para. 1 above, said headquarters for major disaster control shall be abolished and the headquarters for emergency disaster control shall succeed to the duties and responsibilities of said headquarters for major disaster control. (Organization of the headquarters for emergency disaster control) Art. 28-3. The chief officer of the headquarters for emergency disaster control shall be the chairman of the headquarters for emergency disaster control, and this position shall be filled by the Prime Minister (or by another minister of state to be designated in advance in the event that the Prime Minister is incapacitated). 2. The chairman of the headquarters for emergency disaster control shall direct the affairs of the headquarters and supervise its staff. 3. A

vice-chairman, headquarters members and other officials shall be installed in the headquarters for emergency disaster control. 4. The vice-chairman of the headquarters for emergency disaster control shall be a minister of state. 5. The vice-chairman of the headquarters for emergency disaster control shall assist the chairman and perform duties on behalf of the chairman when hi is incapacitated. 6. The members of the headquarters for emergency disaster control other than the chairman and 17 vice-chairman shall all be appointed by the Prime Minister from among the ministers of state or the chief officers of other non-ministerial government agencies. 7. The staff of the headquarters for emergency disaster control other than the chairman and the headquarters members shall be appointed by the Prime Minister from among the staff of designated government agencies and/or the chief officers and staff of designated local government agencies. 8. A local headquarters for emergency disaster control within the headquarters for emergency disaster control may, with the approval of the cabinet, be established within the headquarters for emergency disaster control as an organization to carry out locally within the area of jurisdiction of the headquarters for emergency disaster control part of the duties of the headquarters for emergency disaster control as designated by the chairman of the headquarters for major disaster control. 9. The provisions of art. 26

para. 6 second sentence, para. 7 and para. 8 shall apply to the local headquarters for emergency disaster control. 10. A chairman, headquarters members and other officials shall be installed in the local headquarters for emergency disaster control. 11. The chairman of the local headquarters for emergency disaster control shall have responsibility for the business of the local headquarters for emergency disaster control under the orders of the chairman of the headquarters for emergency disaster control. 12. The chairman, officials, and staff of the local headquarters for emergency disaster control shall be appointed by the chairman of the headquarters for emergency disaster control from among the vice chairmen, officials, and other staff of the headquarters for emergency disaster control. (Business of the headquarters for emergency disaster control) Art. 28-4. The headquarters for emergency disaster control shall be responsible for the following matters: (1) relating to the overall coordination of emergency measures being taken under an appropriate disaster prevention plan within the area of its jurisdiction by the chief officer of a designated national or local administrative organ, the chief officer of a local government, or other executive agency, or a designated national or local public corporation. (2) relating to the implementation of a plan for urgent measures in time of a major disaster. 18 (3) relating to business which is assigned

under art. 28-6 to the authority of the chairman of the headquarters. (4)in addition to what is listed above, any business that may be assigned to his authority by law. (Delegation of authority of the chief officer of a designated administrative organ) Art. 28-5. The chief officer designated administrative organ upon establishment of the headquarters for emergency disaster control, delegate his authority for emergency measures, in whole or in part, to the staff of the headquarters for emergency disaster control who are members of the designated administrative organ, or the chief officer of a designated local administrative organ or its staff. 2. The chairman of the headquarters is required to make public any such delegation of authority he has made, as provided under the preceding paragraph. (Authority of the chairman of the headquarters) Art. 28-6. The chairman of the headquarters for emergency disaster control may exercise overall coordination of the exercise of authority, delegated under the preceding article, by members of the headquarters within the area of its jurisdiction. 2. When it is deemed particularly necessary in the interest of accurate and speedy implementation of emergency measures within the area of jurisdiction, the chairman of the headquarters for emergency disaster control may give necessary instructions to the chief officer of an appropriate designated administrative organ, the chief officer

of an appropriate designated local administrative organ, or, when authority has been delegated to him under the provisions of the preceding article, to the staff of a designated administrative organ, the staff of designated local administrative organ, the chief officer of a public corporation or to any other executive agency, or a designated national or local public corporation. 3. The chairman of the headquarters for emergency disaster control may delegate all or a part of the authority set forth in para. 2 above to the vice-chairman of the headquarters for emergency disaster control. 4. Should a local headquarters for emergency disaster control be established, the chairman of the headquarters for emergency disaster control may delegate part of the authority set forth under para. 1 and para. 2 above (excluding the authority to issue instructions to he chief of designated administrative organs) to the chairman of the local headquarters for emergency disaster control. 19 5. The chairman of the headquarters for emergency disaster control is required to make public immediately any such delegation of authority he has made, as provided under the preceding paragraph. Section 4 Dispatch of Officials in Time of Disaster (Request for dispatch of officials) Art. 29. The governor of a prefecture, the prefectural committee or its members (hereinafter referred to as "prefectural governor and others") may, if necessary for emergency measures of rehabilitation

efforts, request, as provided by ordinance, from the chief officer of a designated national or local administrative organ the dispatch of officials of respective organs. 2. The mayor of a city or town or the head of a village, or its respective committees, or members of such a committee (hereinafter referred to as "mayor of a city, town or the head of a village and others") may, if necessary for emergency measures or rehabilitation efforts, request, as provided by ordinance from the chief officer of a designated local administrative organ the dispatch of its officials. 3. In making such a request, as provided under the two preceding paragraphs, the prefectural, city, town or village committee or its members are required to consult in advance with the prefectural governor, or the mayor of the city or town, or the head of the village. (Intercession for dispatch of officials) Art. 30. The governor of a prefecture and others, or the mayor of a city or town or the head of a village and others may, if necessary for emergency measures or rehabilitation efforts, seek the intercession of the Prime Minister or the governor of another prefecture for the dispatch of officials by a designated national or local administrative organ, as provided by ordinance. 2. The governor of a prefecture and others or the mayor of a city or town or the head of a village may, if necessary emergency measures or rehabilitation efforts, seek intercession of the Prime Minister or the governor of another

prefecture, as appropriate, for the dispatch of officials provided under art. 252 (17) of the Local Governments Act, as provided by ordinance. 3. The provisions of art. 29 para. 3 shall, where and as necessary, apply to a request provided under the two preceding paragraphs. (Obligation to dispatch officials) Art. 31. When a request for dispatch of officials or a request for intercession has been made under the 20 two preceding articles, the chief officer of a designated national or local administrative organ, the governor of a prefecture and others or the mayor of a city or town or the head of a village shall be obligated to dispatch such officials as are deemed qualified to the degree that so doing will not seriously hinder the performance of their respective business. (Status and treatment of dispatched officials) Art. 32. The prefecture, or the city, town or village may provide allowances as provided by ordinance to officials dispatched under the preceding article or by other Act in the interest of emergency measures or rehabilitation efforts. 2. In addition to what is provided under the preceding paragraph, necessary matters with regard to the status and treatment of officials dispatched from a designated national or local administrative organ shall be decided by ordinance. (Presentation of data on the dispatch of officials etc.) Art. 33. In the interest of efficient dispatch of officials as provided under art. 31, the chief officer of a national or local administrative organ or

the governor of a prefecture shall forward to the Prime Minister at regular intervals data indicating the number of officials by profession who have pertinent skills, knowledge or experience for disaster emergency measures or rehabilitation efforts, and describing the degree of their skills, knowledge or experience, and shall exchange such data. Chapter III Disaster prevention Plan (Formulation and release of a basic disaster prevention plan) Art. 34. The Central Disaster Prevention Council shall formulate a basic disaster prevention plan, which shall be reviewed each year in the light of research findings, conditions of disasters that have occurred, and the effect of emergency measures taken, and revise it if deemed necessary. 2. When the Central Disaster Prevention Council has formulated or revised a basic disaster prevention plan as provided under the preceding paragraph, it shall promptly report it to the Prime Minister, inform the chief officers of designated administrative organs, governors of prefectures, and designated public corporations, and release to the public an outline of the plan or revision. Art. 35. A basic disaster prevention plan shall provide for the following matters: 21 (1)a long-term comprehensive plan for disaster prevention. (2) matters to be stressed in operational disaster prevention plans and local disaster prevention plans. (3) in addition to what is listed above, other matters which the Central Disaster

Prevention Council may deem necessary in setting standards in the drafting of operational or area disaster prevention plans. 2. Data listed below shall be attached to the basic disaster prevention plan: (1) the conditions of the land together with the weather situation (2) a status report in outline of establishments and facilities necessary for disaster prevention (3)information on personnel engaged in disaster prevention activities (4) availability of supplies necessary for disaster prevention (5)transportation and communication necessary for disaster prevention (6)in addition to what is listed above, other matters which the Central Disaster Prevention Council may deem necessary for disaster prevention. (Operational disaster prevention plan of a designated administrative organ) Art. 36. The chief officer of a designated administrative organ shall formulate an operational disaster prevention plan, based on the basic disaster prevention plan, pertaining to the business under his jurisdiction, shall review it every year, and shall revise it when deemed necessary. 2. When the chief officer of a designated administrative organ has formulated or revised an operational disaster prevention plan as provided under the preceding paragraph, he shall speedily report it to the Prime Minister, inform the governor of the appropriate prefecture and designated public corporation, and release to the public an outline of the plan or revision. 3. The provision of art. 21 shall apply, where

and as necessary, to the formulation or revision of an operational disaster prevention plan by the chief officer of a designated administrative organ as provided under para. 1. Art. 37. An operational disaster prevention plan shall provide for the following matters: 22 (1)measures to be undertaken for disaster prevention pertaining to the business of a designated administrative organ (2)in addition to what is listed above, matters which will serve as standards for the formulation of an area disaster prevention plan pertaining to the business concerned. 2. In formulating and implementing an operational disaster prevention plan, the chief officer of a designated administrative organ shall coordinate it with operational plans formulated by the chief officers of other designated administrative organs so that all operational plans will be formulated and implemented as an integrated whole. (Relation to plans under other Acts) Art. 38. The portion bearing on disaster prevention in any plan related to disaster prevention, listed below, which is prepared by the chief officer of a designated administrative organ as provided under other Acts, may not be inconsistent with or in conflict with the basic disaster plan or any operational disaster prevention plan: (1) any national development plan provided under art 2 para. 3 of the Comprehensive Land Development Act (Act No. 205, 1950) (2) any national forestry plan provided under art. 4 para.

1 of the Forestry Act (Act No. 249, 1951) (3) any operational plan for prevention of disaster provided under art. 3 para. 1 of the Act on the Extraordinary Measures for Disaster Prevention and Development in Special Soil Areas (Act No. 96, 1952) (4) any basic power development plan provided under art. 3 para. 1 of the Power Development Promotion Act (Act No. 283, 1952) (5) any plan for rearrangement of forest preserves provided under art. 2 para. 1 of the Act on the Extraordinary Measures for Re-arranging Forest Preserves (Act No. 84, 1954) (6) any consolidation plan for the capital city area under art. 2 para. 2 of the capital City Area Consolidation Act (Act No. 83, 1956) (7) any basic plan for the construction of multiple purpose dams provided under art. 4 para. 1 of the Multiple purpose Dams Act (Act No. 35, 1957) 23 (8) any five-year disaster prevention plan provided under art. 2 para. 2 of the Act Concerning Special Measures for Disaster Prevention in Areas Vulnerable to Typhoon (Act No. 72, 1958) (9) any forest conservation plan and any flood control plan provided under art. 3 para. 1 of the Act Concerning Urgent Measures for Forest Conservation and Flood Control (Act No. 21, 1960) (10) any basic plan for areas of heavy snow provided under art. 3 para. 1 of the Act Concerning Special Measures for Areas of Heavy Snow (Act No. 73, 1962) (11) any Kinki region development plan under art. 2 para. 2 of the Kinki Region Development Act (Act

No. 129 of 1963) (12) any Chubu region development plan under art. 2 para. 2 of the Chubu Region Development Act (Act No. 102 of 1966) (13) any plan for removing spilled oil under art. 43-2 para. 1 of the Act Concerning Prevention of Marine Pollution and Maritime Disasters (Act No. 136 of 1970) (14) in addition to what is listed above, any other plan provided by ordinance. (Operational disaster prevention plans of designated public corporations) Art. 39. A designated public corporation shall formulate an operational disaster prevention plan, based on the basic disaster prevention plan, relating to the corporation's business, review its operational plan every year, and revise it when deemed necessary. 2. When a designated public corporation has formulated or revised an operational disaster prevention plan provided under the preceding paragraph, the corporation shall report it promptly to the Prime Minister through the competent Minister, inform the governors of appropriate prefectures, and release to the public an outline of its plan or revision. 3. The provisions of art. 21 shall apply, where and as necessary, to the formulation or revision of an operational disaster prevention plan by a designated public corporation as provided under paragraph 1. (Prefectural area disaster prevention plan) Art. 40. A prefectural disaster prevention council shall formulate an area disaster prevention plan involving the area of the prefecture, based

on the basic disaster prevention plan, and shall review the area plan every year, and revise it when deemed necessary. In such cases, the prefectural area disaster 24 prevention plan may not be in conflict with any appropriate operational disaster prevention plan. 2. A prefectural area disaster prevention plan shall provide for the matters listed below: (1)general outline of business or operations relating to disaster prevention involving the area of the prefecture and falling under the purview of a designated local administrative organ having jurisdiction over the area of the prefecture, in whole or in part, the prefecture, and the cities, towns and villages within the area of the prefecture, a designated national or local public corporation, and administrators of public organizations or establishments within the area of the prefecture concerned. (2) plans by category of operations within the area of the prefecture: creation or improvement of disaster prevention establishments, investigation and research, education, drills and other preventive measures, of information. collection and transmission issuance transmission of forecasts and alarms evacuation, fire fighting, flood prevention, rescue, sanitation, other emergency measures and rehabilitation efforts. (3) plans for coordination, stockpiling. procurement, distribution, shipment, communication with reference to labor, establishments, equipment, materials, funds etc. required

for measures relating to disaster prevention involving the area of the prefecture, as provided under the preceding item. (4)in addition to what is listed in the preceding items, matters which the prefectural disaster prevention council may deem necessary for disaster prevention involving the prefectural area. 3. When the prefectural disaster prevention council wishes to formulate a prefectural area disaster prevention plan or revise it provided under paragraph 1, the council is required to consult in advance with the Prime Minister, who in turn shall consult the Central Disaster Prevention Council. 4. When the prefectural disaster prevention council has formulated or revised its prefectural area disaster prevention plan provided under paragraph 1, the council is required to release a summary of said plan or revision. Art. 41. The portion bearing on disaster prevention in any plan for disaster prevention or related to disaster prevention may not in any way in conflict with the basic disaster prevention plan, any appropriate operational disaster prevention plan, or any prefectural area disaster prevention plan: (1)a prefectural flood prevention plan provided under art. 7 para. 1 and para. 2 of the Flood Prevention Act (Act No. 193, 1949) and a flood prevention plan of a designated control agency provided under art. 25 of said Act. 25 (2) plans provided under art. 2 of the Multiple purpose Land Development Act: any prefectural multiple purpose development plan under para. 4, any local multiple purpose development plan under para. 5, and a multiple purpose development plan for special areas under para. 6. (3) any offshore island development plan provided under art. 3 para. 1 of the offshore Islands Development Act (Act No. 72. 1953). (4) any basic plan for improvement of establishments to preserve coastal areas provided under art. 23 para. 1 of the Coastal Area Act (Act No. 101, 1956). (5) any basis construction plan for prevention of landslides provided under art. 9 of the Landslide Prevention Act (Act No. 30, 1958). (6) any evacuation facilities urgent development plan provided under art. 3 para. 1 of the Act concerning Development of Evacuation Facilities in Environs of Active Volcano (Act No. 61, 1973), any disaster prevention farming facilities development plan provided under art. 8 para. 1 of the same Act, any disaster prevention forestry facilities development plan provided under art. 8 para. 2 of the same Act, and any disaster prevention fishing facilities development plan provided under art. 8 para. 3 of the same Act. (7) any emergency project for urgent improvement of earthquake countermeasures provided under art. 2 para. 1 of the Act Concerning the Special Fiscal Measures for the Project for Urgent Improvement of Earthquake Countermeasures in Areas under Intensified Measures Against Earthquake Disaster (Act. No. 63 of 1980). (8)in addition to those listed above, any plan as

provided by ordinance. (City, town or village area disaster prevention plan) Art. 42. A city, town or village disaster prevention council (for a city, town or village without a disaster prevention council, the mayor of the city or town, or the head of the village; applicable herein under) shall formulate an area disaster prevention plan involving the area of the city, town or village, based on the basic disaster prevention plan, and shall review the area plan every year, and shall revise it when deemed necessary. In so doing, the city, town or village area disaster prevention plan may not conflict with any appropriate operational disaster prevention plan or any prefectural area disaster prevention plan of the prefecture comprising said city, town or village. 2. A city, town or village area disaster prevention plan shall provide for the matters listed below: 26 (1)general outline of business or operations relating to disaster prevention involving the area of the city, town or village and falling under the purview of the city, town or village concerned and of the administrators of public organizations or important establishments for disaster prevention within the area. (2) plans by category of operations within the area of the city, town or village: improvement creation orof disaster prevention establishments, investigation and research, education, drills and collection and transmission other preventive measures, information, issuance and transmission of forecasts and alarms,

evacuation, fire fighting, flood prevention, rescue, sanitation and other emergency measures and rehabilitation efforts. (3) plans for coordination, stockpiling, procurement, distribution, shipment, communication with reference to labor, establishments, equipment, materials, funds etc. required for measures relating to disaster prevention involving the area of the city, town or village, as provided under the preceding item. (4)in addition to what is listed in the preceding items, matters which the city, town village disaster prevention council may deem necessary for disaster prevention involving the area of the city, town or village. 3. When the city, town or village disaster prevention council intends to formulate or revise its area disaster prevention plan provided under paragraph 1, the council is required to consult in advance with the governor of the prefecture, who shall in turn consult with the prefectural disaster prevention council. 4. When the city, town or village disaster prevention council has formulated or revised its area disaster prevention plan provided under paragraph 1, the council is required to release a summary of said plan or revision. 5. The provisions of art. 21 shall apply, where and as necessary, to the formulation or revision of a city, town or village disaster prevention plan by the mayor of the city or town or the head of the village, as provided under paragraph one. (Prefectural disaster prevention plan for a

designated area) Art. 43. The joint committee of prefectural disaster prevention councils shall formulate a prefectural plan for a designated area and review the plan annually, and revise it when deemed necessary. In this case, the prefectural plan for the designated area may not conflict with any operational disaster prevention plan. 27 2. Matters to be provided for in the prefectural plan for a designated area shall be such as the Central Disaster Prevention Council shall be designated from among the matters listed in the items under art. 40 para. 2. 3. The provisions of art. 40 para. 3 shall be applied, where and as necessary, to the formulation and revision of the prefectural disaster prevention plan for a designated area by a joint committee of prefectural disaster prevention councils. 4. When the joint committee of prefectural disaster prevention councils has formulated a prefectural disaster prevention plan, the joint committee is required to make public a summary of the plan or revision. (City, town or village disaster prevention plan for a designated area) Art. 44. The joint committee of city, town or village disaster prevention councils shall formulate a city, town or village disaster prevention plan for a designated area, review the plan annually, and revise it when deemed necessary. In this case, the plan may not conflict with any operational disaster prevention plan or any prefectural area disaster prevention plan of the prefecture which comprises said city, town or village. 2. Matters to be provided for in the city, town or village disaster prevention plan for a designated area shall be designated by the prefectural disaster prevention council from among the matters listed in the items under art. 42, para. 2. 3. The provisions of art. 42 para. 3 shall be applied, where and as necessary, to the formulation or revision of a disaster prevention plan for a designated area of a city, town or village by the joint committee of city, town or village disaster prevention councils. 4. When the joint committee of city, town or village disaster prevention councils has formulated or revised its disaster prevention plan for the designated area, as provided under the preceding paragraph, the committee is required to release a summary of said plan or revision. (Request, etc. in implementing designated area disaster prevention plans) Art. 45. When deemed necessary in the interest of accurate and effective implementation of a designated area disaster prevention plan, the chairman of a local disaster prevention council or the representative of a joint committee of local disaster prevention councils may make necessary requests or recommendations or provide instructions with regard to any business or operations within the scope 28 of the plan and under purview of the parties listed below: in the case of the prefectural disaster prevention council or the joint committee of prefectural councils, to the chief officer of a designated local administrative organ in charge of the area of that prefecture, in whole or in part, the prefecture, the mayor of a city, town, or the head of a village in that prefecture, any other executive agency, designated local public corporations. public organization, administrators of any establishments important in disaster prevention, and other parties concerned within the area; in the case of a city, town or village disaster prevention council or a joint committee of city, town or village disaster prevention councils, to the mayor of a city or town or the head of a village, any other executive agency, public organizations, administrators of establishments important in disaster prevention, or other parties concerned within the area. 2. The chairman of a local disaster prevention council or the representative of a joint committee of local disaster prevention councils may ask for a report or data on the implementation of an area disaster prevention plan: in the case of the prefectural disaster prevention council or its joint committee, from the chief officer of a designated local administrative organ in charge of the area of the prefecture, in whole or in part, the mayor of a city or town, or the head of a village and any other executive agency, designated local organizations, public corporations, public administrators establishments important in disaster prevention, or other parties

concerned within the area; in the case of the city, town or village disaster prevention council or its joint committee, from the mayor of the city or town, or the head of the village, any other executive agency, public organizations, administrators of establishments important in disaster prevention, or other parties concerned within the area. Chapter IV Prevention of Disasters (Prevention of disasters and responsibility for its implementation) Art. 46. Prevention of disasters shall be performed for the purpose of preventing any disaster ahead of time in matters listed below: (1)keeping in good condition of organizations concerned with disaster prevention (2)drills for disaster prevention (3)stockpiling, replenishing and inspection of materials and supplies for disaster prevention (4) maintenance and inspection of establishments and equipment for disaster prevention (5)in addition to the matters listed in the preceding items, other matters concerning improvement of 29 such conditions as will hinder the implementation of emergency measures in time of a disaster. 2. Chief officers of designated national or local administrative organs, local governments, any other executive agency, designated national or local public corporations, and any other parties responsible by law for the implementation of disaster prevention are required, by law or under a disaster prevention plan, to carry out disaster prevention. (Responsibility for maintaining

organizations for disaster prevention) Art. 47. The chief officer of a designated national or local administrative organ, any other executive agency, a designated national or local public corporation, and the administrator of an establishment important for disaster prevention (hereinafter referred to as "Those responsible for disaster prevention"), acting by law or under an appropriate disaster prevention plan, within the purview of their respective responsibilities, shall strive to keep in good condition and improving organizations necessary for anticipating, forecasting or speedily transmitting information on disaster. 2. In addition to what is provided for under the preceding paragraph, those responsible for disaster prevention, acting by law or under an appropriate disaster prevention plan, in the interest of accurate and effective implementation of the disaster prevention plan, shall keep in good condition and improving organizations related to disaster prevention and set standards for the assignment of officials and for the performance of their duties for disaster prevention. (Responsibility for disaster prevention drills) Art. 48. Those responsible for disaster prevention shall, as prescribed by law or an appropriate disaster prevention plan, perform disaster prevention drills, severally or in concert with others responsible for disaster prevention. 2. The prefectural public safety commission shall, when deemed to be

particularly necessary to effectively implementing the disaster prevention drills set forth in the preceding paragraph, designate districts or sections of road for which pedestrian and/or vehicular passage is banned or restricted provided this is done in accordance with all applicable government ordinances and only to the extent that is necessary for implementing the disaster prevention drill. 3. The officials and other personnel of organizations to which those responsible for disaster prevention belong, and employees of those responsible for disaster prevention and other personnel are required to participate in disaster prevention drills set forth in para. 1 as provided under an appropriate disaster prevention plan and as determined by those responsible for disaster prevention. 30 4. When those responsible for disaster prevention wish to carry out disaster prevention drill as set forth in para. 1, they may seek the cooperation of the local residents and other organizations concerned, private or public. (Responsibility for stockpiling materials and supplies necessary for disaster prevention) Art. 49. Those responsible for disaster prevention are required, by law or under an appropriate disaster prevention plan, to stockpile materials and supplies necessary for emergency measures or rehabilitation work related to disaster prevention within the scope of their respective business, replenish such materials and supplies with proper inspection, and keep in good order establishments and equipment for disaster prevention under their control. Chapter V Disaster Emergency Measures Section 1 General Rules (Emergency measures and responsibility for their implementation) Art. 50. Emergency measures for disaster shall be taken with respect to the matters listed below for the purpose of anticipating a disaster when there is danger of occurrence, or of conducting emergency rescue work when a disaster has occurred so as to prevent the spread of the disaster: (1) matters related to the issuance and transmission of alarm, recommendations or orders for evacuation. (2)matters related to emergency measures, such as fire fighting, flood prevention. (3) matters related to rescue, relief and protection of disaster victims. (4)matters related to emergency instruction of children and school children affected by disaster. (5)matters related to temporary restoration of establishments and equipment. (6) matters related to cleanup, epidemic control, public health and sanitation. (7) matters related to crime prevention, traffic control, and the preservation of social order. (8) matters related to emergency transport. 31 (9) any additional matters related to measures for prevention of disaster or for the spread of disaster. 2. The chief officer of a designated national or local administrative organ, that of a local government, any other executive agency, a designated national or local public corporation,

or any other parties responsible, by law, for implementing emergency measures for disaster are required to carry out such measures, as prescribed by law or under an appropriate disaster prevention plan. (Information gathering and transmission) Art. 51. The chief officer of a designated national or local administrative organ, that of a local government, any other executive agency, a designated national or local public corporation, any public organization, and administrators of establishments important for disaster prevention (hereinafter referred to as "those responsible for disaster emergency measures") are required to strive for information gathering and transmission related to disaster, as prescribed by law or under an appropriate disaster prevention plan. (Signals) Art. 52. The kind, nature, pattern or method of signal employed in the issuance and transmission of an alarm, warning, recommendations or orders for evacuation, shall be determined by the Office of the Prime Minister except where specified by other Act. 2. No person shall be permitted to employ a signals provided under the preceding paragraph or similar signals for other than legitimate purposes. (Report on conditions of disaster) Art. 53. When a disaster has occurred in the area of a city, town or a village, the mayor of the city or town or the head of the village shall, as provided by ordinance, report promptly to the governor of the prefecture (or to the Prime Minister when it is not possible to report

to the governor of the prefecture) on conditions of disaster and provide an outline of the measures taken. 2. When a disaster has occurred in the area of a prefecture, the governor of the prefecture shall, as provided by ordinance, report to the Prime Minister on conditions of disaster and provide an outline of the measures taken. 3. The representative of a designated public corporation shall, when a disaster has occurred pertaining to its business, report, as provided by ordinance, promptly to the Prime Minister on conditions of disaster and provide an outline of the measures taken. 32 4. The chief officer of a designated administrative organ shall, when a disaster has occurred pertaining to its business, report, as provided by ordinance, promptly to the Prime Minister on conditions of disaster and provide an outline of the measures taken. 5. When the disaster to be reported on under the provisions of paragraphs 1-4 above is deemed a major disaster, the mayor of the city or town, head of the village, representative of the designated public corporation, or chief officer of the designated administrative organ shall be particularly vigilant in gathering information needed to gauge the scale of the disaster. 6. When he has received reports under the provisions of paragraphs 1-4 above, the Prime Minister shall notify the Central Disaster Prevention Council of the matters in said report. Section 2 Transmission of Alarms, etc. (Discoverer's responsibility to report)

Art. 54. Any person having detected an unusual event which may lead to a disaster shall notify without delay the mayor of the city or town or the head of the village, the police or maritime safety officials. 2. Every person is required to cooperate so that the notification under the preceding paragraph may reach appropriate authorities as rapidly as possible. 3. The police or maritime safety officials shall, upon receipt of the notification under para. 1, promptly forward it to the mayor of the city or town or the head of the village. 4. The mayor of the city or town or the head of the village shall, upon receipt of the notification under para. 1 or 3, forward it to the Meteorological Agency or other appropriate agencies, under an appropriate area disaster plan. (Prefectural governor's notification, etc.) Art. 55. When the governor of a prefecture has received from the Meteorological Agency or any other agency of the State a forecast or an alarm of a disaster as provided by law, or when he has issued an alarm pertaining to a disaster, he shall, by law or under an appropriate area disaster prevention plan, make necessary communications or requests to the chief officers of designated local administrative organs, designated local public corporations, the mayor of the city or town, or the head of the village concerned, and other parties concerned in regard to the impending disaster and measures being considered. 33 (Mayor's transmission of alarm and

warning, etc.) Art. 56. When the mayor of a city or town or the head of a village has received a forecast or an alarm of a disaster as provided by law, or when he has learned of a forecast or an alarm of disaster on his own, or when he has by law himself issued an alarm on his own, or when he has received notification under art. 55, he is required, under an appropriate area disaster prevention plan, to transmit said forecast, alarm or matters pertaining to the notification to appropriate agencies, the local residents, and any other public or private organization concerned. In so doing he may, when deemed necessary, also make pertinent communication or warning with respect to the impending disaster and the measures being considered to deal with it. (Priority use of communication facilities, etc.) Art. 57. In cases where notification, request, transmission or alarm under the two preceding articles requires urgency when there is a specific need, the governor of a prefecture, the mayor of a city or town, or the head of a village may, by ordinance unless otherwise provided by law, request broadcast thereof on a priority basis from the electrical communications businesses set forth in art. 2 para. 5 of the Electric Communications Act (Act No. 86 of 1984) over electrical communications facilities used by them for business purposes, and/or may request broadcast thereof using the cable electrical communications facilities or radio facilities installed

by parties listed in art. 3 para. 4 (3) of the Cable Electric Communications Act (Act No. 96 of 1953), or broadcast by the broadcasters set forth in art. 2 para. 3-2 of the Broadcasting Act (Act. no. 132 of 1950). In the last case, "broadcasters" excludes "consigned broadcasters" as defined in art. 3-4 of the Broadcasting Act; should broadcast be requested of broadcasters, they may also be requested to cause "consigned broadcasters" as defined in art. 3-5 of the Broadcasting Act to make said broadcast on consignment. Section 3 Precautionary Steps and Evacuation (Mayor's orders for action, etc.) Art. 58. When a disaster is believed imminent, the mayor of a city or town, or the head of a village shall, by law or under an appropriate area disaster prevention plan, order a fire fighting unit or a flood prevention unit to prepare for action or to act, or ask those for emergency measures for disaster to responsible preparations for taking such measures as alerting or mobilizing police or maritime safety officials. (Mayor's precautionary steps, etc.) Art. 59. When a disaster is believed imminent or when a disaster has occurred, the mayor of a city or 34 town, or the head of a village may order the occupant, owner, or administrator of an establishment or materials which would be likely to spread the disaster to remove for safekeeping other necessary disposition any establishment or materials to the extent it is necessary to prevent the spread of the disaster. 2. The chief of a local police station, or the chief of a maritime safety regional headquarters as provided by ordinance (hereinafter to as "chief of a police station and others") may, at the request of the mayor of the city or town, or the head of the village, issue orders provided under the preceding paragraph. When such orders have been issued, the chief of a police station and others shall immediately notify the mayor of the city or town or the head of the village. (Mayor's orders for evacuation) Art. 60. In the interest of protecting life and limb from disaster or of preventing the spread of a disaster when it has occurred or is believed imminent, the mayor of the city or town or the head of the village may, when deemed necessary, make recommendations to the local residents, temporary residents and others of an area concerned to evacuate, or may, when deemed urgent, give instructions to these persons to evacuate for safety. 2. When the mayor of a city or town or the head of a village makes recommendations or give instructions for evacuation under the provisions of the preceding paragraph, he may, if deemed necessary, specify a point to which evacuees will proceed. 3. When the mayor of a city or town, or the head of a village has recommended or instructed evacuation for safety under the paragraph 1, or when he has specified the point to which the evacuees will proceed, he shall report promptly to the governor of the

prefecture. 4. When there is no longer the need for evacuation, the mayor of the city or town or the head of the village shall immediately make public the fact. The provisions of the preceding paragraph shall apply to this case, where and as necessary. 5. When a disaster occurs in the territory of the prefecture and a city, town, or village is unable to perform all or the majority of its duties because of the disaster, the governor of the prefecture shall implement on behalf of the mayor of the city or town or head of the village all or a part of the measures to be implemented by the mayor of the city or town or head of the village in accordance with the provisions of para. 1, para. 2, and para. 4 above. 6. The governor of the prefecture must make it public when he begins and ceases to perform the duties of the mayor of the city or town or head of the village under the provisions of the preceding paragraph. 35 7. Necessary matters related to the performance by the governor of the prefecture of duties on behalf of the mayor of the city or town or head of the village under the provisions of para. 5 above shall be set forth in government ordinance. (Orders for evacuation by police and others) Art. 61. In cases provided for under the first paragraph of the preceding article, when the mayor of the city or town or the head of the village is found unable to order evacuation for safety under said paragraph, or when there has been a request from the mayor or the head, the police or maritime safety

officials may order the evacuation for the safety of the residents, temporary residents or other persons in an area for which evacuation is deemed necessary. The provisions of para. 2 of the preceding article applies to this case, where and as necessary. 2. When the police or maritime safety officials have ordered evacuation for safety under the provisions of the preceding paragraph, they shall report this fact immediately to the mayor of the city or town or the head of the village. 3. The provisions of paras. 3 and 4 of the preceding article shall apply to the mayor of a city or town or the head of the village who has received a report under the preceding paragraph, where and as necessary. Section 4 Emergency Measures (Emergency measures at the city, town or village level) Art. 62. When a disaster has occurred or is imminent in the area of a city or town or a village, the mayor of the city or town or the head of the village shall, by law or under an appropriate area disaster prevention plan, promptly implement necessary emergency measures to prevent disaster or the spread of a disaster (hereinafter referred to as "emergency measures") such as fire fighting, flood prevention, rescue, etc. 2. When a disaster has occurred or is imminent in the area of a city or town or village, the committee of said city, town or village or its members, any public organization in that area, administrators of such establishments as are important for disaster prevention, and

other parties responsible for the implementation of emergency measures shall, under an appropriate area disaster prevention plan, implement emergency measures as pertains to their respective business or operations under the direction of the mayor of the city or town or the head of the village, and also shall cooperate in the implementation of such emergency measures as the city, town or village may undertake. 36 (Right to establish a restricted area in a city, town or village) Art. 63. When a disaster has occurred or is imminent, the mayor of the city or town, or the head of the village may, when deemed necessary to prevent danger to life or limb, establish a restricted area to which access shall be restricted or prohibited to any persons other than those engaged in emergency measures, or may order any persons other than those so engaged to leave the area. 2. In cases described in the preceding paragraph, if the mayor of the city or town or the head of the village, or officials performing duties provided under that paragraph on his behalf are not on the scene, or if they request, police or maritime safety officials may perform the duties on their behalf. When such duties have been performed on behalf of the mayor of the city or town or the head of the village, the police or maritime safety officials shall immediately report their action to the mayor or the head of the village. 3. The provisions of para. 1 above shall apply to the carrying out of the

duties of self-defense force troops set forth in art. 83 para. 2 of the Self Defense Force Act (Act No. 165 of 1954) when said troops are dispatched in accordance with art. 8 of said Act provided that neither the mayor of the city or town or head of the village nor anyone able to exercise the authority of the mayor of the city or town or head of the village as set forth in para. 1 above is present. Should self defense officers take measures under the provisions of para. 1 above, they shall immediately inform the mayor of the city or town or head of the village thereof. (Requisitioning for emergency official use) Art. 64. When a disaster has occurred involving the area of a city or town or village, or is imminent, the mayor of the city or town or the head of the village may, if deemed urgently necessary in the interest of implementing emergency measures, employ for temporary use any plot, building or any other structure belonging to any person within the area, use or requisition materials such as earth, stone, bamboo, lumber, etc. as provided by ordinance. 2. When a disaster has occurred involving the area of a city, town or village, or is imminent, the mayor of the city or town or the head of the village may, if deemed urgently necessary in the interest of implementing emergency measures, remove or otherwise dispose of any structure or materials on the scene affected by the disaster and which may hinder the execution of emergency measures (hereinafter referred to as

"structures, etc."). In this case, when structures etc. have been removed, the mayor of the head of the village concerned is required to keep them under his custody. 3. When the mayor of the city or town or the head of the village has taken into custody structures etc. under the preceding paragraph, he shall by ordinance make public matters concerning the return of said 37 structures etc. to the occupant, owner or any persons having title to them (hereinafter referred to as "occupants and others"). 4. When there is the danger of structures etc. which have been placed into custody under para. 2 being destroyed, lost or damaged, or when their custody would incur undue cost or effort, the mayor of the city or town or the head of the village may by ordinance sell such structures etc. and hold the sales proceeds. 5. Costs of custody of structures etc., their sale, making public notices in connection with them, etc. under para. 3, shall be charged against the occupants and others, and as regards the collection of such expenses, arts. 5 and 6 of the Act Concerning Execution by Proxy of Administrative Matters (Act No. 43, 1948) shall apply, where and as necessary. 6. When the mayor of the city or town or the head of the village finds that he is unable to return structures etc. which have been held in custody under para. 2 (including sales proceeds under para. 4; to be applicable herein under) the ownership of said structures etc. shall, at the end of six

months from the date of public notice provided under para. 3, revert to the city, town or village concerned. 7. The provisions of art. 63 para. 2 shall, where and as necessary, apply to cases under art. 63 para. 1 and the first half of para. 2. 8. The provisions of para. 1 and the first part of para. 2 above shall apply to the carrying out of the duties of self-defense force troops dispatched for disaster relief provided that neither the mayor of the city or town or head of the village nor anyone able to exercise the authority of the mayor of the city or town or head of the village as set forth in para. 1 and the first part of para. 2 above is present. Should self defense officers dispatched for disaster relief take measures under the provisions of para. 1 and the first part of para. 2 above, they shall immediately inform the mayor of the city or town or head of the village thereof. 9. When structures etc. have been removed under the provisions of para. 2 of the preceding article as applied to para. 7 above or the preceding paragraph, the police or maritime safety officials or the self defense troops dispatched for disaster relief shall present said structures etc. to the chief of the police station and others having jurisdiction over the original location of said structures etc. or to the chief officer of the troops as set forth in art. 8 of the Self Defense Force Act and designated by the Prime Minister ("self defense troop chief officer" for the remainder of this article) and the chief of police

or self defense troop chief officer in turn are required to keep them in custody. 10. As regards the custody of structures etc. by the chief of police or self defense troop chief officer under the preceding paragraph, the provisions of paras. 3 through 6 shall also apply. However, if 38 structures etc. cannot be returned at the end of six months from the date of public notice under para. 3, their ownership shall revert to the prefecture to which the police station belongs if said structures etc. are under police custody, and to the national government if they are under the custody of the maritime safety regional headquarters or the self defense troop chief officer. Art. 65. When a disaster involving the area of a city, town or village has occurred or is imminent, the mayor of the city or town or the head of the village may, when deemed urgently necessary to carry out emergency measures, cause any local residents or any persons who are on the scene to engage in operations under such emergency measures. 2. The provisions of art. 63 para. 2 shall, where and as necessary, apply to the preceding paragraph. 3. The provisions of para. 1 above shall apply to the carrying out of the duties of selfdefense force troops dispatched for disaster relief provided that neither the mayor of the city or town or head of the village nor anyone able to exercise the authority of the mayor of the city or town or head of the village as set forth in para. 1 above is present. Should self defense officers dispatched for disaster relief take measures under the provisions of para. 1, they shall immediately inform the mayor of the city or town or head of the village thereof. (Special cases of disposition for flotsam in time of a disaster) Art. 66. When flotsam or submerged goods as provided under art. 29 para. 1 of the Sea Casualties Rescue Act (Act No. 95, 1899) have been removed, the chief of the police station and others may keep such objects in custody, the provisions of said paragraph notwithstanding. 2. The provisions of chapter II of the Sea Casualties Rescue Act shall, where and as necessary, apply to cases in which the chief of the police and others have taken into custody flotsam or submerged goods under the preceding paragraph. (Request for support from other cities, towns or villages) Art. 67. When a disaster has occurred involving the area of a city, town or village, the mayor of the city or town or the head of the village may, if deemed necessary in implementing emergency measures, seek support from the mayors of other cities or towns of the heads of other villages. In such cases, the mayor of the city or town or the head of the village so requested may not refuse support except for legitimate reasons. 2. Those who render such support under the preceding paragraph shall be under the direction of the mayor of the city or town or the head of the village and others who have requested support so far as the 39 implementation of

emergency measures is concerned. (Request for support etc. from prefectural governors and others) Art. 68. When a disaster has occurred involving the area of a city, town or village, the mayor of the city or town or the head of the village may, if deemed necessary in implementing emergency measures, request support or implementation of emergency measures from the governor of the prefecture. 2. The provisions of the latter part of para. 1 of art. 67 shall apply, where and as necessary, in cases under the preceding paragraph. (Request to call up self defense force troops for disaster relief) Art. 68-2. The mayor of the city or town or head of the village may, when a disaster occurs or threatens to occur in the territory of the city, town, or village and it is deemed necessary to implement emergency measures, request the governor of the prefecture to issue a call as set forth in art. 83 para. 1 of the Self Defense Force Act ("call" or "call up" in the next paragraph). 2. When unable to issue the request set forth in the preceding paragraph, the mayor of the city or town or head of the village may inform the director-general of the Defense Agency or a person to be designated by him of his inability to issue the request and the disaster conditions in the territory of the city, town or village. In such cases, the directorgeneral of the Defense Agency or the person designated by him, having been informed as described above and in light of the

information received, deeming there to be particular urgency and no time to wait for a call-up, may dispatch the troops set forth in art. 8 of the Self Defense Force Act for the protection of life and property without waiting for a call. 3. When he has made the notifications described in the preceding paragraph, the mayor of the city or town or head of the village shall inform the governor of the prefecture thereof with all due haste. (Special cases of procedure for delegation of business in time of a disaster) Art. 69. When a disaster has occurred involving the area of a city, town or village, the mayor of the city or town or the head of the village may, if deemed necessary in implementing emergency measures, delegate by ordinance its business or part of the business under the purview of the mayor of the city or town or the head of the village to another local government and cause the chief officer of said local government or any other executive agency to carry it out, the provisions of art. 252 para. 14 and art. 252 para. 15 of the Local Autonomy Act notwithstanding. 40 (Emergency measures at the prefectural level) Art. 70. When a disaster has occurred involving the area of a prefecture or appears imminent, the governor of the prefecture shall, by law or under an appropriate area disaster prevention plan, implement promptly such emergency measures as fall under his purview. In such cases, the governor of the prefecture is also required to see that emergency

measures at the level of cities, towns and villages within the area are carried out correctly and effectively. 2. When a disaster has occurred involving the area of a prefecture or appears imminent, the committee of the prefecture or its members shall, by law or under an appropriate area disaster prevention plan, implement such emergency measures as pertain to its business under the direction of the governor. 3. When it is deemed necessary in the interest of implementing emergency measures under para. 1 or of ensuring a correct and effective implementation of emergency measures at the city, town or village level within the area, the governor of the prefecture may request the implementation of emergency measures by the chief officer of a designated national or local administrative organ, or by any other executive agency of said prefecture, or by a designated national or local public corporation. (Governor's orders to work in emergency measures) Art. 71. When a disaster has occurred involving the area of a prefecture, the governor of the prefecture may, if deemed necessary in implementing emergency measures under art. 50 para. 1 (4) through (9), invoke the provisions of arts. 24 through 27 of the Disaster Relief Act (Act No. 118, 1947) and issue orders for work, cooperation or custody, so that he may administer, employ or requisition any establishment, land, house or materials, or cause his officials to enter and inspect any establishment, land,

house of materials, or any place where such materials are held in custody, or to ask for a report from individuals who have been assigned the custody of such materials. 2. Part of the authority of the governor of a prefecture under the preceding paragraph may by ordinance be delegated to the mayor of the city or town or the head of the village concerned. (Governor's orders) Art. 72. When it is deemed specifically necessary in the interest of implementing correctly and effectively emergency measures at the city, town or village level in a prefecture, the governor of the prefecture may give necessary orders with respect to the implementation of emergency measures or with respect to support for mayors of other cities or towns or heads of other villages. 2. Those who engage in support under orders from the governor under the preceding paragraph shall 41 act under the direction of the mayor of the city or town or the head of a village receiving support insofar as the implementation of emergency measures is concerned. (Execution of emergency measures on behalf of a prefectural governor) Art. 73. In time of a disaster involving the area of a prefecture, when the city or town or village finds that it is unable to conduct its business or the bulk of it as a result of the disaster, the governor of the prefecture shall act on its behalf to implement, in whole or in part, such emergency measures as the mayor of the city or town or the head of the village

shall carry out under art. 63 para. 1, art. 64 paras. 1 and 2, and art. 65 para. 1. 2. When the governor of a prefecture has begun or completed the conduct of business on behalf of the mayor of a city, or town or the head of a village under the provisions of the preceding paragraph, he shall make public this action. 3. Other necessary matters for the governor of a prefecture in acting on behalf of the mayor of a city or town or the head of a village under para. 1 shall be provided by ordinance. (Request for support from another prefectural governor) Art. 74. When the governor of a prefecture deems it necessary in time of a disaster involving the area of the prefecture, he may seek support from other prefectural governors, who in turn may not refuse support except for legitimate reasons. 2. Those engaged in support under the preceding paragraph shall act under the direction of the prefectural governor who has requested support, insofar as the implementation of emergency measures is concerned. As regards the police, they shall perform duties of the public safety commission of said prefecture under that commission's direction. (Special cases of delegation of business in time of a disaster) Art. 75. When it is deemed necessary in implementing emergency measures in time of a disaster involving the area of a prefecture, the governor of said prefecture may by ordinance delegate the business, or part of the business, under his purview to another prefectural governor so

as to cause the latter to direct and execute said business, the provisions of art. 252-14 and art. 252-15 of the Local Government Law notwithstanding. 42 (Traffic restrictions in time of disaster) Art. 76 When deemed urgently necessary by the prefectural public safety commission for accurate and smooth emergency disaster response measures because of a disaster that has occurred or is likely to occur within the prefecture or adjoining or nearby prefectures, the public safety commission may, by ordinance, designate sections of road (districts and sections of roads in the locale where the disaster has occurred or is likely to occur, and in nearby areas) as banned from or restricted to vehicular traffic other than emergency vehicles ("emergency automobiles" as defined in art. 39 para.1 of the Road Traffic Act [Act No. 105 of 1960] or other vehicles for which there is a particular need to assure passage in order for emergency disaster response measures to be implemented in an accurate and smooth manner and which are designated by government ordinance, and so in the next article and art. 76-3 as well). 2. In the event that vehicular traffic is banned or restricted as set forth in the preceding paragraph ("traffic ban(s)" for the remainder of this article, para. 1 and para. 2 of the next article, and art. 76-4), the prefectural public safety commission issuing the traffic ban and prefectural public safety commissions with jurisdictions adjoining or nearby the prefectural

public safety commission that issued the traffic ban shall immediately take measures to inform parties within the territory of their prefectures of the areas and roadways for which the traffic ban is in effect ("traffic ban zone(s)" in the next paragraph and in art. 76-3) and any other necessary information. Art. 76-2. When a traffic ban is in effect for a section of road, the drivers of vehicles subject to the traffic ban in that section of road shall quickly move said vehicles to a place outside of said section of road. In such cases, if it is difficult to quickly move said vehicles to places outside said section of road, drivers shall wherever possible park their vehicles along the lefthand side of the road or in some other such manner so as not to be an impediment to the passage of emergency vehicles. 2. When a traffic ban is in effect for an area, the drivers of vehicles subject to the traffic ban in that area shall quickly move said vehicles to a place outside of said area. In such cases, if it is difficult to quickly move said vehicles to places outside said area, drivers shall wherever possible park their vehicles along the left-hand side of the road or in some other such manner so as not to be an impediment to the passage of emergency vehicles. 3. The provisions of chap. 3 sec. 9, and art. 75 para. 8 of the Road Traffic Act shall not apply for parking under the provisions of para. 2 above. 4. Notwithstanding the provisions of para. 1 and para. 2 above, should the driver of a vehicle in a traffic

ban zone receive instructions from a police officer, the driver shall move or park his car as instructed. 43 5. The bans and restrictions on vehicular traffic set forth in para. 1 of the preceding article shall not apply when moving or parking vehicles in accordance with the provisions of para. 1, para. 2, or para. 4 above. Art. 76-3. Police officers may, when they deem it probable that vehicles or other property in traffic ban zones will impede the passage of emergency vehicles and thereby substantially hinder the implementation of emergency disaster response measures, order the occupant, owner, or manager of said vehicle or other property to move said vehicle or other property to a nearby place off of the road or to take other measures so as to ensure the smooth passage of emergency vehicles in the traffic ban zone. 2. In cases such as described in the preceding paragraph in which the party ordered to take the measures described in the preceding paragraph does not take said measures or the party to whom such an order would be issued is not present and cannot be ordered to take said measures, the police officer may take said measures himself. In such cases, the police office may, to the extent that is unavoidable in taking said measures, damage the vehicle or other property for which said measures are taken. 3. The provisions of para. 2 above shall apply to the execution of civil defense force duties by troops etc. dispatched for disaster relief provided that there

is no police officer present. In such cases, the words "passage of selfdefense force emergency vehicles (refers to emergency vehicles used by the self defense forces and being operated in order to implement emergency disaster response measures, and so throughout this paragraph)" shall be substituted for "passage of emergency vehicles," and the words "smooth passage of self defense force emergency vehicles" for "smooth passage of emergency vehicles" in para. 1 above. 4. The provisions of para. 1 and para. 2 shall apply to the execution of the duties of fire department personnel provided that there is no police office present. In such cases, the words "passage of fire department emergency vehicles (refers to emergency vehicles used by fire-fighting agencies and being operated in order to implement emergency disaster response measures, throughout this paragraph)" shall be substituted for "passage of emergency vehicles," and the words "smooth passage of fire department emergency vehicles" for "smooth passage of emergency vehicles" in para. 1 above. 5. The bans and restrictions on vehicular traffic set forth in art. 76 para. 1 and the provisions of para. 1, para. 2, and para. 4 of the preceding article shall not apply when taking measures ordered under the provisions of para. 1 above (including such cases as these provisions are applied in the previous two paragraphs) or when taking measures under the provisions of para.

2 above (including such cases as these provisions are applied in the previous two paragraphs). 6. Should self defense officers dispatched for disaster relief or fire department personnel issue orders 44 under the provisions of para. 3 or para. 4 above or take measures under the provisions of para. 2 above as applied to the situations set forth in para. 3 or para. 4 above, they shall immediately inform the chief of police with jurisdiction over the place in which said orders were issued or said measures taken thereof. Art. 76-4. The national public safety commission may, when deemed particularly necessary for the accurate and smooth implementation of emergency disaster response measures, issue instructions to relevant prefectural public safety commissions regarding traffic bans as specified in government ordinances. (Emergency measures by the chief officer of a designated administrative organ) Art. 77. When a disaster has occurred or appears imminent, the chief officer of a designated administrative organ or of a designated local administrative organ is required, by law or under an appropriate disaster prevention plan, to implement promptly such emergency measures as pertain to business under his purview and to take necessary steps in the interest of a correct and effective implementation of emergency measures at the level of the prefecture, city, town or village. 2. In cases under the preceding paragraph, the chief officer of a designated national or local

administrative organ may, if deemed necessary for implementing emergency measures, request or order the prefectural governor, the mayor of the city or town, or the head of the village, a designated national or local public corporation to implement emergency measures. (Requisitioning by the chief officer of a designated administrative organ and others) Art. 78. When in time of a disaster it is deemed especially necessary in the interest of implementing emergency measures pertaining to matters under art. 50 para. 1 (4) through (9), the chief officer of a designated national or local administrative organ may, under an appropriate operational disaster prevention plan, order the storage of materials necessary for emergency measures by individuals whose occupations are the production, collection, marking, storage or shipping of such materials; the administrative officers may also requisition such materials as are necessary for emergency measures. 2. When the chief officer of a designated national or local administrative organ deems it necessary in the course of ordering the storage of materials or requisitioning materials under the preceding paragraph, he may cause his officials to enter and inspect the place where said materials are stored or located. 3. The chief officer of a designated national or local administrative organ may, when deemed necessary, ask for a report from individuals who have materials in their custody under

the preceding paragraph, or 45 cause his officials to enter and inspect the place where such materials are stored. (Priority use of communication facilities) Art. 79. When in time of a disaster it is particularly urgent to make necessary communications implementing emergency measures, the chief officer of a designated national or local administrative organ, the prefectural governor, or the mayor of a city or town or the head of a village may, unless otherwise provided by law, use on a priority basis public electric communication facilities, or use facilities for electric communication or radio facilities installed by individuals under art. 3 para. 3 (3) of Electric Communication Act. (Emergency measures by the designated public corporations and others) Art. 80. When a disaster has occurred or appears imminent, a designated national or local public corporation shall by law or under an appropriate disaster prevention plan implement promptly emergency pertaining to business under its purview and shall take necessary steps in the interest of a correct and efficient implementation of emergency measures by the chief officer of a designated local administrative organ, a prefectural governor and others, or the mayor of a city or town or the head of a village and others. 2. When a designated national or local public corporation deems it particularly necessary in implementing emergency

pertaining to business under its purview, it may by law or under an appropriate disaster prevention plan, ask for support from the officer of a designated national or local administrative organ, a prefectural governor, or the mayor of a city or town or the head of a village to ensure the availability of labor, establishments, equipment or materials. In such cases, the chief officer of the designated national or local administrative organ, the prefectural governor, or the mayor of the city or town or the head of the village whose support has been requested may not refuse support except for legitimate reasons. (Serving of requisition orders) Art. 81. When a prefectural governor, or the mayor of a city or town or the head of a village, or the chief officer of a designated national or local administrative organ wishes to take action under the provisions of art. 71 or art. 78 para. 1, he shall serve a requisition order before taking action. 2. The following matters shall be entered in a requisition order provided under the preceding paragraph: (1)the name and address of the prospective recipient (for a corporation, its designation and the address 46 of its main office). (2)legal provisions justifying such action. (3)As to orders for work, the kind of activity to be engaged in, its location and duration; for orders of custody, the kind and amount of materials to be held in custody, the place of custody and duration; for administration, employment or requisition of establishments, the

location of the establishment etc. to be administered, employed or requisitioned, and the duration of such action. 3. In addition to the provisions of the two preceding paragraphs, the form of requisition orders and other necessary matters concerning them shall be provided by ordinance. (Compensation for loss, etc.) Art. 82. When an action provided under art. 64 para. 1 (including such cases as these provisions apply to art. 64 para. 7) has been taken under the provision of art. 63 para. 2, art. 71, art. 76 para. 3 item 2 and all subsequent items (including cases in which these provisions apply to para. 3 and para. 4 of said article), or art. 78 para. 1, the central or local government concerned shall be responsible for compensation for any normal loss that may result from such action. 2. The governor of a prefecture is required, by standards to be set by ordinance, to compensate for actual costs incurred by persons who have engaged in work under an order for work in emergency measures under art. 71. (Requirements with respect to entry) Art. 83. When an official of prefecture, or a city or town, or a village makes an entry (into a place) under art. 71, or when a member of a designated national or local administrative organ makes an entry under art. 78 para. 2 or 3, the person shall notify the administrator of the place in advance. 2. In such case, the person shall bear a proof of identification, and shall present it at the request of parties concerned. (Compensation for

persons engaged in the work of emergency measures) Art. 84. When the mayor or a city or town or the head of a village, or a police official or a maritime safety official or a self defense force member dispatched for disaster relief has, under art. 65 para. 1 (including such cases as these provisions apply to art 65 para. 3) or under art. 63 para. 2 as applied to art. 65 para. 2, caused residents of the area of the city, town or village concerned or persons on the 47 scene covered by an emergency measure to work in operations related to emergency measures, and when a person has died, been injured or become ill, or been crippled as a result of the work, the city, town or village shall, by its ordinance and according to standards set by its ordinance, compensate the person, his surviving family, or his dependents, for the loss sustained. 2. When a person who has engaged in the work of emergency measures by order of work under art. 71 has died, been injured, has become sick or disabled as a result, the prefecture shall, by its ordinance and by standards to be set by its ordinance, compensate the person concerned, his surviving family or his dependents for the loss sustained. (Reduction and exemption of public assessments for disaster victims) Art. 85. The State may, by other Act, allow reduction, exemption or deferment of national taxes and other assessments or take other necessary action for the benefit of disaster victims. 2. A local government may, by other Act or by its

ordinance, allow disaster victims reduction, exemption or deferment of local taxes or other assessments imposed by local government, or take other necessary action. (Special cases of loaning government property, etc.) Art. 86. When the State, deeming it necessary in implementing emergency measures in time of a disaster, lends government property or other articles of government ownership, or allows them to be used, the consideration for the loan of property or the use of articles may, as specified by law, be made free of charge or fixed at a rate lower than the current rate. 2. When a local government, deeming it necessary in implementing emergency measures in time of a disaster, lends property or articles under its ownership, the consideration for the loan of property or the use of articles may, as specified by law, be gratuitous or fixed at a rate lower than the current rate. Chapter VI Rehabilitation (Responsibility for rehabilitation after a disaster) Art. 87. The chief officer of a designated national or local administrative organ, the chief officer of a local government, any other executive agency, a designated national or local public corporation, and other parties responsible for the implementation of rehabilitation shall, by ordinance or under an appropriate disaster prevention plan, implement the work of rehabilitation after disaster. 48 (Fixing of rehabilitation expenses) Art. 88. With respect to a rehabilitation program whose expenses are

met by the Government, in part or in whole, or which is subsidized by the Government, the fixing of the amount which devolves upon competent Minister shall be done appropriately the expeditiously on the basis of a report from the governor of the prefecture, data presented by other local governments, and results of on-site investigations. 2. In fixing the amount of expenses for a rehabilitation program under the preceding paragraph, the competent Minister shall exercise full care with respect to work pertaining to the creation or renovation of an establishment to be pursued concurrently with said rehabilitation program in the interest of preventing a recurrence of disaster. (Report to the disaster prevention council) Art. 89. When the competent Minister has fixed the amount of rehabilitation expenses, or when he has established standards for the implementation of a rehabilitation program, he shall by ordinance report a summary of his action to the Central Disaster Prevention Council. (Early payment of Government's share of expenses or/and subsidies, etc.) Art. 90. When the Government deems it necessary in the interest of an effective implementation of a rehabilitation program undertaken by a local government or its agency, the Government shall make an early delivery of tax transfer, and shall, by ordinance, make an early payment of its share of rehabilitation expenses or its subsidy, or finance required funds or

intercede for advancing loans. Chapter VII Financial Measures (Financial responsibilities for disaster prevention, etc.) Art. 91. Except as otherwise specified by ordinance or when a special action is undertaken within the limits of the budget, expenses for disaster prevention and emergency measures against disaster, and expenses for the implementation of this Act shall be borne by parties responsible for its implementation. (Financial responsibilities for emergency action when other local governments have cooperated) Art. 92. Any local government whose chief officer has received support from the chief officer of 49 another local government or its committee or any member of the committee under art. 67 para. 1, art. 68 para. 1, or art. 74 para. 1 (hereinafter referred to as "chief officer of a local government and others") shall be responsible for the expenses incurred by such support. 2. In case under the preceding paragraph, when the local government whose chief officer has received support is unable to defray the expenses incurred on time, it may ask the chief officer and others of the local government which has rendered support to advance the sum on a reimbursable basis. (Prefecture assuming expenses for emergency measures taken at the city, town or village level) Art. 93. Of the expenses, for emergency measures taken or for support rendered, incurred by the mayor of a city or town or the head of a village on instructions from the governor

of the prefecture as provided by art. 72 para. 1, the portion which is deemed difficult or inappropriate to assess on the city, town or village under the chief officer who has received instructions for support and the city, town or village under the chief officer who has received the support, shall by ordinance, be borne, in whole or in part, by the prefecture concerned, exclusive of that part of the expenses which are to be charge against the State. 2. In cases under the preceding paragraph, the prefecture may ask the city, town or village concerned to advance the sum provided in said paragraph on a reimbursable basis. (Government's share or subsidy toward expenses for emergency measures) Art. 94. With respect to expenses for emergency measures pertaining to disaster prevention, the Government may, as specified by law or within the limits of its budget, bear a portion of said expenses or subsidize it. Art. 95. In addition to the provisions under the preceding article, of the expenses incurred by the chief of a local government in implementing emergency measures on instructions either from the chairman of the headquarters for major disaster control under art. 28 para. 2 or from the chairman of the headquarters for emergency disaster control under art. 28-6 para. 2, any portion which is difficult or inappropriate to assess on that local government and which shall be provided by ordinance may, by ordinance, be subsidized, in whole or in part, by

the Government. (Government's share and subsidy for rehabilitation expenses) Art. 96. With respect to expenses required for rehabilitation programs and other programs undertaken in relation to a disaster, the Government may, as specified by ordinance or within the limits of its budget, bear them, in whole or in part, or subsidize them. 50 (Sharing of expenses for emergency measures for a disaster of extreme severity rehabilitation) Art. 97. In time of a disaster of extreme severity, the Government shall, as specified by law, take action so that emergency measures and rehabilitation efforts may proceed expeditiously and appropriately, and at the same time, shall, as specified by law, enforce policies in the interest of making equitable the burden of expenses on the local government etc. whose area has sustained the disaster and of arousing enthusiasm for rehabilitation. Art. 98. With respect to the Act described in the preceding article, it should be avoided, insofar as practicable, to enact such a Act at the time of each disaster of extreme severity and the Act shall be so designed as to rationalize the system concerning assumption of the financial burden by the State consequent upon disaster, and serve efficiently to carry out measures against disasters of extreme severity described in the preceding article. Art. 99. The Act provided under article 97 shall specify the matters listed below: (1)standards by which special property

assistance and auxiliary assistance against a disaster of extreme severity will be lent as a matter of policy. (2) special financial support by the State to local government in the interest of an appropriate implementation of programs as well as rehabilitation programs as regards a disaster of extreme severity. (3)special incentives for victims of a disaster of extreme severity. (Financial measures by the State to deal with disaster damage) Art. 100.In order to be able to deal with disaster damage without adversely affecting an efficient management of national finances, the Government shall strive to take necessary financial measures. 2. In order to achieve the objectives under the preceding paragraph, the Government shall exercise full care with respect to the appropriation of reserve funds, and action for bearing deficits in the Treasury (as the one under art. 15 para. 2 of the National Finances Act (Act No. 34, 1947)) and other measures. (Local government disaster funds) Art. 101. The local government shall, as specified by law, establish a disaster fund to meet emergency expenses for policy measures against disaster. 51 (Special cases of issuing bonds) Art. 102. In the cases listed below, the local government may by ordinance issue local bonds as a financial resource exclusively for the year of the occurrence of a disaster as specified by ordinance, the provision of art. 5 of the Local Finances Act (Act No. 109, 1948) notwithstanding: (1)in cases where there

have been reductions and exemptions by a Ministry of Local Autonomy ordinance of local taxes, rents, fees and other collections, to cover a deficit in revenue in the amount considered commensurate with the degree and extent of damage wrought by said disaster. (2) as a resource to cover that portion falling on the local government in the general account of expenses, as provided by a Ministry of Home Affairs ordinance, for prevention of disasters, emergency measures in time of a disaster, or rehabilitation after the disaster, 2. The Government shall, insofar as its financial situation will allow, accept local bonds provided in the preceding paragraph by a fund of the trust fund bureau or by reserves in the special account for postal life insurance and annuities (hereinafter referred to as "Government Funds"). 3. When local bonds provided under para. 1 have been accepted with Government funds, the interest rate, method of redemption and other necessary matters shall be provided by ordinance. (Measures for rehabilitation programs not subsidized by the State) Art. 103. The State and the local government may, as specified by law, take special steps to contribute toward resources for expenses of rehabilitation programs, when the portion of expenses for rehabilitation involving a disaster of extreme severity is not met by Government subsidy and the resulting burden on the local government is deemed excessive. (Loans for disaster) Art. 104. When

a disaster, as provided by ordinance, has occurred, banking facilities related to the Government and other banking facilities designated by ordinance shall provide special loans in connection with the disaster, and shall endeavor to extend the term of redemption or the period of deferment, convert old loans to new ones, and where necessary, lower interest rates and take other measures pertinent to circumstances. 52 Chapter VIII State of Emergency (Declaration of a state of emergency) Art. 105. In time of an extraordinary disaster whose repercussions on the national economy and public welfare are serious and far-reaching, the Prime Minister may, when he deems it particularly necessary in the interest of enforcing emergency measures, declare a state of emergency involving the whole or part of the affected area, upon referring the matter to a Cabinet Conference. 2. Such a declaration provided under the preceding paragraph shall specify the area concerned, give a brief account of the situation warranting such action, and set the date and time when the declaration takes effect. (Parliamentary concurrence and repeal of a declaration of a state of emergency) Art. 106. When a state of emergency has been declared under the provisions of the preceding article, the Prime Minister shall put the matter before the Diet for its consent not later than twenty days from the date of declaration. However, when the Diet is in adjournment or the House of Representatives has been dissolved, he shall seek parliamentary consent at the earliest session of the Diet thereafter, 2. When there has been a resolution to refuse consent as provided under the preceding paragraph, or when the Diet has voted to repeal the declaration of a state of emergency, or when there is no longer the necessity for the declaration, the Prime Minister shall promptly revoke said declaration. (Establishment of headquarters for emergency disaster control under a state of emergency) Art. 107. When there has been declared a state of emergency under art. 105, the Prime Minister shall, if a headquarters for emergency disaster control has not already been established for said disaster, establish a headquarters for emergency disaster control with jurisdiction over the area covered by the declaration of a state of emergency under the provisions of art. 28-2. Art. 108.(Deleted). (Emergency measures) Art. 109. In case of an urgent need to preserve the economic order of the nation and to ensure the public welfare when confronted with a situation of emergency as a result of disaster and when the Diet is in adjournment or the House of Representatives has been dissolved, and further, when the situation does not allow time to call the Diet in session or request an emergency session of the House of Counselors 53 for action, the Cabinet may enact an ordinance in order to take necessary steps on the matters listed

below: (1) rationing of materials of daily necessity in critical shortage; restriction or ban on their transfer or delivery. (2) fixing a ceiling on prices of commodities, consideration for labor, fees for services in the interest of emergency measures, rehabilitation and a stable life for the citizens. (3)deferment of monetary debts (exclusive of wages, compensation payments for disaster damage, payment of monetary debts involving labor relations, withdrawals from accounts in banks or backing facilities for such payment); extension of the duration of a creditor's rights. 2. An ordinance enacted under the preceding paragraph may provide that any person in violation of any provision of said ordinance shall be liable to imprisonment at hard labor for not more than two years or imprisonment of the same length without hard labor, or a fine of not more than one hundred thousand yen, detention, a police fine, or confiscation, or a combination of any two penalties; that when a representative of a corporation or individual, or any agent or other employee either of the corporation or the individual has acted in violation of any provision of said ordinance with respect to the business of the corporation or the individual, the representative, agent or other employee shall be punished, and in addition, a fine, a minor fine, or confiscation prescribed in this paragraph shall be imposed also on the corporation and the individual; and that where confiscation of goods cannot be enforced

either in whole or in part, the monetary value of such items shall be additionally collected. 3. When an ordinance enacted under paragraph 1 is no longer required, the Cabinet shall immediately revoke it. 4. The Cabinet shall, upon enactment of an ordinance under paragraph 1, decide on the convocation of the Diet in extraordinary session or to seek an emergency session of the House of Counselors; it shall further take steps to enact a Act to replace said ordinance of such measures as taken under that ordinance are to be continued, and for other cases, it shall seek consent to the ordinance enacted. 5. Any ordinance enacted under paragraph 1, unless it has already been repealed or has expired, shall lapse, either with the implementation of a Act which may have been enacted at an extraordinary session of the Diet or at an emergency session of the House of Counselors to replace that ordinance, or with a decision which may have been taken at either session not to enact such a Act to replace said ordinance. 6. In addition to cases described in the preceding paragraph, an ordinance enacted under paragraph 1 shall, unless already repealed or unless it has expired, become null and void twenty days from the date 54 of opening of an extraordinary session of the Diet or of the termination of the extraordinary session, whichever is earlier, or ten days from the date of opening of an emergency session of the House of Counselors or of the termination

of the emergency session, whichever is earlier. 7. When an ordinance has become null and void under the two preceding paragraphs, the Cabinet is required to make public this fact. 8. If penalties are provided for in an ordinance enacted under paragraph 1, application of penalties to acts committed while the ordinance remained in effect shall continue even after the ordinance has been repealed, or its effective period has ended or it has lost its effect under either paragraph 5 or paragraph 6. Art. 109-2. When unable, during times of disaster, to quickly and smoothly accept assistance from other countries for the relief of disaster victims according to the Act, and the Diet is in adjournment or the House of Representatives has been dissolved, and further, when the situation does not allow time to call the Diet in session or request an emergency session of the House of Counselors for action, the Cabinet may enact an ordinance in order to take necessary steps to accept said assistance. 2. The provisions of paragraphs 3-7 of the preceding article shall apply to the preceding paragraph. Chapter IX Miscellaneous (Application of this Act to a special ward) Art. 110. For purposes of application of this Act, a special ward shall be considered to be a city. (Distinguished service awards in disaster prevention) Art. 111. The competent Minister may, as decided by an ordinance of an appropriate Ministry, award a person who has been recognized as having distinguished himself by his services in the work of disaster prevention. (Matters for an ordinance) Art. 112. In addition to what is specified in this Act, procedures for the implementation of this Act or other necessary matters shall be provided by ordinance. 55 Chapter X Penal Provisions (Penal provisions) Art. 113. Any person falling under either one of the items below shall be liable to imprisonment at hard labor for not more than six months or a fine of not more than three hundred thousand yen: (1) any person who has failed to comply with an order for work, an order of cooperation or of custody issued by the governor of a prefecture (including the mayor of a city or town or the head of a village to whom authority has been delegated under art. 71 para. 2) under the provision of art. 71 para. 1. (2) any person who has failed to comply with an order of custody issued by the chief officer of a designated national or local administrative organ (including an official to whom authority has been delegated under art. 27 para. 1 or art. 28-5 para. 1) under the provision of art. 78 para. 1. Art. 114.A driver of a vehicle who has failed to comply with a restriction or ban placed by a prefectural public safety commission under the provisions of art. 76 shall be liable to imprisonment at hard labor for not more than three months or a fine of not more than two hundred thousand yen. Art. 115. Any person falling under either of the following items shall be liable to a fine of not more than two hundred

thousand yen. (1) any person who has refused, hindered or avoided an entry and inspection under art. 71 para. 1 (including cases where there was delegation of authority under para. 2 of said article; to be applicable hereunder in this article), art. 78 para. 2 (including cases of delegated authority under art. 27 para. 1 - also cases where the same paragraph is applied, as appropriate, to art. 108 para. 4), or art. 78 para. 3 (including cases of delegated authority under art. 27 para. 1 or art. 28-5 para. 1, to be applicable hereunder in this article). (2) any person who has failed to make a report or has made a false report under the provision of art. 71 para. 1 or art. 78 para. 3. Art. 116. Any person who falls under either of the two items below shall be liable to a fine of not more than one hundred thousand yen or detention: (1) any person who has employed signals related to disaster prevention as provided by an ordinance of the Office of the Prime Minister under art. 52 para. 1 for other than legitimate purposes, or has employed similar signals. 56 (2) any person who has failed to comply with a ban, restriction or order for departure enforced by the mayor of a city or town or the head of a village under art. 63 para. 1 (including a prefectural governor acting on behalf of the mayor of a city or town or the head of a village under art. 73 para... 1), or by the police maritime safety officials under art. 63 para. 2 or by members of self defense troops dispatched for disaster relief under

the provisions of art. 63 para. 1 as applied to art. 63 para. 3. Art. 117. When a representative of a corporation or individual, or any agent or other employee either of the corporation or the individual has acted in violation of any provision of article 113 or 115 as regards the business of the corporation or individual, the representative, agent or other employee shall be punished, and in addition, the corporation and the individual shall be liable to a fine under this article. Supplementary Rule: This Act shall be implemented on a date to be fixed by ordinance, within a year from the day of its promulgation. (Implemented on July 10, 1962, by ordinance no. 287, 1962)

Japan's Basic Act for National Resilience Contributing to Preventing and Mitigating Disasters for Developing Resilience in the Lives of the Citizenry (abbreviated to the Basic Act for National Resilience) was enacted on December 11, 2013. It aims to build national resilience, which means to build a country that has the toughness and flexibility to survive large-scale natural disasters in the future, with four goals: protect human lives; avoid critical damage to important functions of the nation and society; minimize damage to the property of the citizenry and public facilities; and contribute to swift recovery and reconstruction.

Based on Article 10 of the Basic Act for National Resilience, the Fundamental Plan to Promote Measures for National Resilience (abbreviated to the Fundamental Plan for National Resilience) was adopted by the Cabinet on June 3, 2014. It provides for policies to promote measures in each of 15 sectors, such as administrative functions/police and fire services, housing and cities, and energy.

The supplementary provision of the Basic Act for National Resilience includes the following: "It is indispensable that not only the national and local governments but also other entities including local residents, business entities, and relevant parties share information on the status of damage and others, prepare for large-scale disasters even in ordinary times, and utilize leading-edge technology and devices based on new technology innovation," indicating that public and private partnership and companies' cooperation are important.

The Sendai Framework for Disaster Risk Reduction (SFDRR) 2015-2030 as the successor to the Hyogo Framework for Action 2005-2015 was adopted on March 18, 2015 at the Third UN World Conference on Disaster Risk Reduction (WCDRR) in Sendai, Japan. This framework is a call to action of the next fifteen years to make the world a safer place and to reduce the risk of human-made and natural hazards. It is designed specifically to achieve the substantial reduction of disaster risks and losses in lives, livelihoods and health. Among the four (4) priorities under the first goal on preventing new and emerging risk and reducing existing risk include Priority 2: strengthening disaster risk governance which means having a clear strategy, strong institutions, laws and budget to ensure the efficient management of disaster risk; and Priority 3: investing in disaster risk reduction for resilience which includes public and private investment and measures which would prevent and reduce disaster losses.

3. RESEARCH METHODOLOGY

This chapter discusses the research design used in this study, the research locale and data gathering procedure.

3.1 Research Design:

This research used an observational method and survey method on descriptive research design. In survey method research, clientele answer questions administered through interviews along with the lecture or questionnaires given beforehand. After participants answer the questions, researchers describe the responses given. In order for the survey to be both reliable and valid it is important that the questions are constructed properly. Most of the questions were written so they are clear and easy to comprehend. And in observational method (or field research) is a type of correlational (i.e., non-experimental) research in which a researcher observes ongoing behavior.

3.2 Research Locale:

This research was conducted in various areas in Japan such as in Kansai Region or Kinki Region (Hyogo, Nara, Wakayama, Osaka and Kyoto); Hokkaido Region (Sapporo City, Minamifurano Michinoeki and Toya); Kanto Region (Tokyo and Kanagawa) and Kouchi Region (Kochi City).

3.3 Data Gathering Procedure:

The Researcher visited various Disaster Risk Reduction and Management Center, Institution, Offices, Facilities, Communities and Universities as scheduled by ADRC to attend lectures, orientations, seminar and briefing. The Researcher ask questions to the Resource Speaker, Lecturers and Facilitators to clarify and define issues which are related to the research topic.

4. PRESENTATION AND INTERPRETATION OF DATA

This section of the research paper provides a glimpse of information based on gathered data by the researcher related to the statement of problem identified.

A. What are the Response Mechanisms/Algorithms of Response of the Philippines Government and Japanese Government from:

- > National
- > Regional / Prefectural; and
- City / Municipal respond during the onset of disaster?

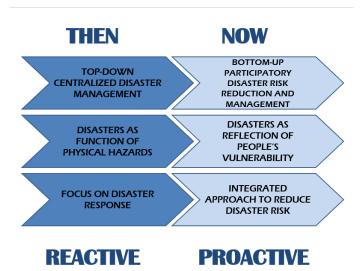
♣ Philippine Government Response Mechanism/ Algorithm

DRRM is defined as the systematic process of using administrative

directives. organizations, and skills operational and capacities to implement strategies, policies and improved coping capacities in order to lessen the adverse impacts of hazards and the possibility of disaster.



Here is a quick summary of the said paradigm shift brought about the law. Before, we used to have a top-down centralized approach to disaster management. Now, we are taking a bottom-up participatory DRRM approach.



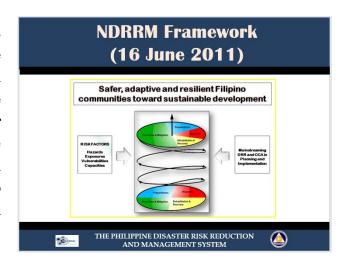
Also, we used to consider disasters as function of physical hazards. Now, we view disasters as a reflection of people's vulnerability. Before, we used to focus on disaster response. Now, we just don't look at response. Instead, we take an integrated approach by looking at all aspects to reduce disaster risk.

Overall, from reactive, we have shifted from reactive to the proactive stance in DRRM.

To bring down DRRM down to the grassroots, RA 10121 further provides for the establishment of the "DRRM Network", or the replication of the NDRRMC from the national down to the regional, provincial, city, municipal and barangay levels.



The law also stipulates the development of the NDRRM Framework, which was approved on 16 June 2011. The Framework is our overall guide to achieve the vision of safer, adaptive and resilient Filipino communities toward sustainable development.



On March 28, 2012, the NDRRMC Memorandum Circular was signed by NDRRMC Secretary, DND. It provides the implementing guidelines on the use of Incident Command System under the Philippine Disaster Risk Reduction and management System.

On September 4, 2012
President Aquino signed the Memorandum No. 82
entitled: Operationalizing the Practical Guide for National Crisis Manager and the National Crisis Management Core Manual; Establishing National and Local Crisis Management Organization; and Providing Funds Therefor.

NDRRMC Memo Circular No. 4, 2012

Signed on March 28, 2012, this provides the implementing guidelines on the use of ICS under the Philippine DRRM System.







INCIDENT COMMAND SYSTEM EXECUTIVE COURSE

Executive Order No. 82, 2012

Signed on September 4, 2012, this mandates the activation of ICS for human-induced crises.

MALACAÑAN PALACE
MANILA

BY THE PRESIDENT OF THE PHILIPPINES

EXECUTIVE ORDER NO. 82

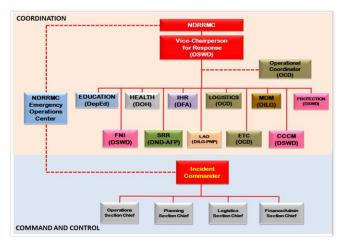
OPERATIONALIZING THE PRACTICAL GUIDE FOR NATIONAL CRISIS MANAGERS AND THE
NATIONAL CRISIS MANAGEMENT CORE MANUAL; ESTABLISHING NATIONAL AND LOCAL
CRISIS MANAGEMENT ORGANIZATIONS; AND PROVIDING FUNDS THEREFOR

INCIDENT COMMAND SYSTEM EXECUTIVE COURSE

Specifically, under section 4D, it states that "As soon as an incident is declared, as approaching crisis level, the responding Crisis Manager, activates the Incident Command System

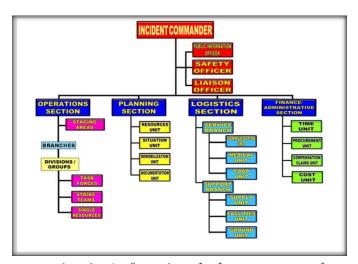
Philippine Response Algorithm

The dynamics of NDRRMC Response Cluster, ICS and EOC can be best illustrated by the following diagram. As general rule, the Chairperson of the DRRMC or Crisis Manager of the CMC is situated at the EOC, together with cluster/sector leads, to make strategic decisions.



They will then use the facilities of the EOC to communicate their guidance to the IMT. The IMT then undertakes tactical operations based on the directives from the EOC. The IMT also reports back to the EOC about situation updates on the ground. The clusters will then continue to coordinate with the IMT to provide assistance especially in terms of resource mobilization. This interoperability framework can also be adopted by the DRRMCs at the regional and local levels as appropriate.

The ICS organization is built around five major functions that are applied on any incident whether it is large or small. A major advantage of the ICS organization is the ability to fill only those parts of the organization that are required. For some incidents, and in some



applications, only a few of the organization's functional elements may be required. However, if there is a need to expand the organization, additional positions exist within the ICS framework to meet virtually any need.

Japan's Response Algorithm

Japan and Natural Disaster
By
Central Disaster Management Council

A wide range of natural disaster occurs



It is critical to protect citizens lives, safety and property from natural disasters



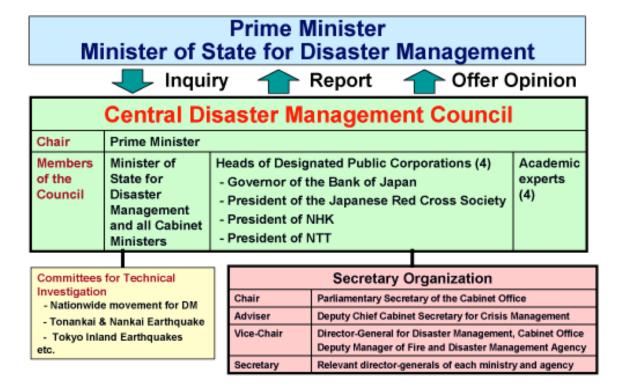
By implementing prevention and initial response drills, as well as recovery and reconstruction measures against disasters in close cooperation with related governmental agencies

Central Disaster Management Council

Roles:

To formulate and promote the implementation of the Basic Disaster Management Plan and Earthquake Plans

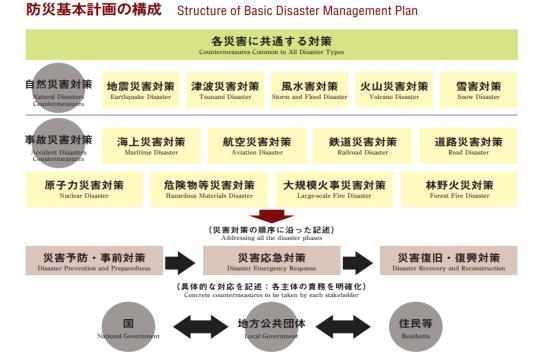
- To deliberate important issues on disaster management according to requests from the Prime Minister or Minister of State for Disaster Management (basic disaster management policies, overall coordination of disaster countermeasures and declaration of state of disaster emergency)
- 2. To offer opinions regarding disaster management to the Prime Minister and Minister of State for Disaster Management



Under the Disaster Countermeasures Basic Act, the Central Disaster Management Council was formed, its brief being to ensure the comprehensiveness of disaster risk management and to discuss matters of importance with regard to disaster management. The council consists of the Prime Minister, who is the chairperson, Minister of State for Disaster Management, all ministers, heads of major public institutions and experts. Within the Cabinet Office, which is the secretariat for this Council, the Minister of State for Disaster Management has been assigned as the Minister State for Special Missions for this issue. This Minister is assisted by the department of the Cabinet Office Director-General for Disaster Management his mandate being to handle planning and central coordination with regard to matters relating to basic policy on disaster risk reduction, and matters concerning disaster countermeasures in the event of a large-scale disaster.

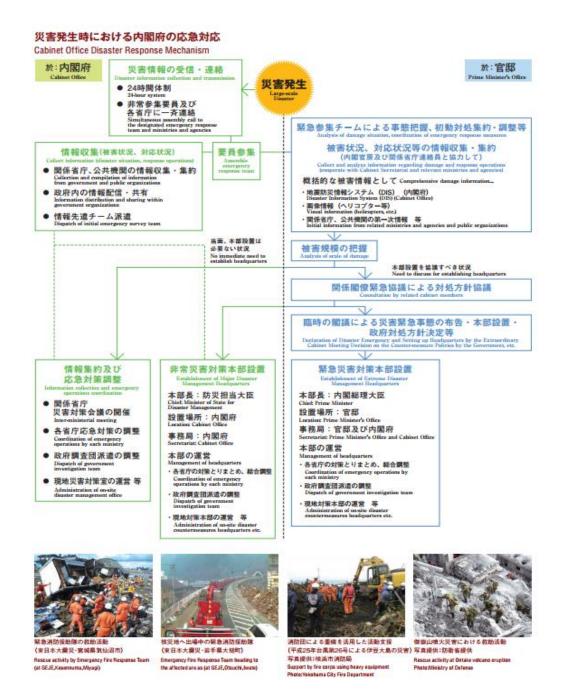
In prefectures and local municipalities, the prefectural and municipal Disaster Management Councils are established with the members of representatives of local government organizations including police and fire management department, and designated local public corporations. Implementation of disaster risk management measures is based on the Local Disaster Management Plans drafted by the Councils.

STRUCTURE OF BASIC DISASTER MANAGEMENT PLAN



The Basic Disaster Management Plan is a comprehensive and long-term disaster management plan forming a foundation for the Disaster Management Operations Plan and Local Disaster Management Plan. It stipulates provisions for the establishment of the disaster management system promotion of disaster management measures, acceleration of post disaster recovery and reconstruction measures, and promotion of scientific and technological research on disaster management. The plan was revised entirely in 1995 based on the experiences of the Great Hanshin-Awaji Earthquake. It defines responsibilities of each entity such as the national and local governments, public corporations and other entities. It consists of various plans for each type of disaster, where specific countermeasures to be taken by each entity are described according to the disaster management phases of prevention and preparedness, emergency response, as well as recovery and reconstruction. Further, based on the lessons learned from the Great East Japan Earthquake, a new chapter was created in December 2011, for Tsunami Disaster Countermeasures and changes were made in September 2012 and January 2014, reflecting amendment of the Disaster Countermeasures Basic Act and reflecting the study results by the Nuclear Regulation Authority (NRA) respectively. In November 2014, another change was made to reinforce the measures for removing unattended cars in case of emergency.

CABINET OFFICE DISASTER RESPONSE MECHANISM



Outline of Disaster Emergency Response

In the event of a disaster, the national and local governments quickly collect and share disaster and damage information, and secure communications to carry out effective emergency activities such as emergency rescue and medical operations. Based on such information, local governments set up a disaster management headquarters and related organizations establish their own operations mechanism. The national government collects disaster information at the Cabinet Information Collection Center 24 hours a day. When a large-scale disaster strikes, an emergency team composed of the director generals of the respective ministries and agencies gathers immediately at the Crisis Management Center in the Prime Minister's Official Residence to grasp and analyze the disaster situation, and report the results to the Prime Minister. Disaster Management meetings at the ministerial or high-ranking senior official level are held, if and as necessary. According to the level of damage, the government may establish the Headquarters for Major Disaster Management (headed by the Minister of State for Disaster Management) or the Extreme Disaster Management Headquarters (headed by the Prime Minister), to establish the policies for the disaster countermeasures, and to coordinate various emergency measures to be taken by various organizations.

Further, in order to grasp the situation in the disaster area, a government investigation team headed by the Minister of State for Disaster Management may be dispatched, or if quick and swift actions are needed to be taken with overall coordination of emergency activities on site, the government may establish the onsite headquarters for disaster management.

From the Non-Government Organization of Japan



Japan Platform (JPF) is an international emergency humanitarian aid organization which offers more effective and prompter emergency aid, in response to the world situation, focusing the issues of refugees and natural disaster. JPF conducts such aid with a tripartite cooperation system where NGOs, business community, and government of Japan work in close cooperation, based on equal partnership, making the most of the respective sectors' characteristics and resources.

Vision

To expand Japanese assistance globally and create a world where all individuals can open a path to the future.

Cooperation for effective assistance

Assembling the wisdom of NGOs, the government of Japan, business communities, and intellectuals and forming a platform to practice effective operation, to provide sustainable and optimal assistance to beneficiaries.

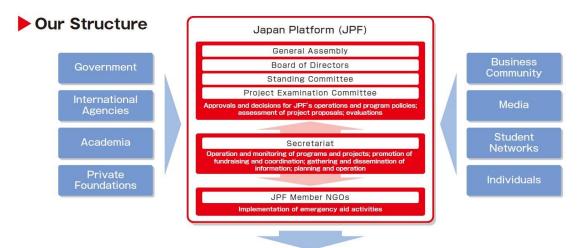
Support for the self-reliance of afflicted people

Building a society where people with different backgrounds can live together under the spirit of coexistence and self-reliance.

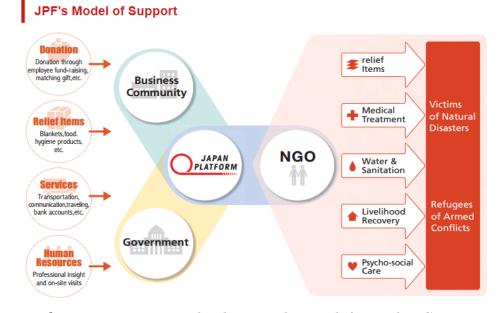
Leadership for NGO activities

activities in humanitarian assistance

Acting as a central role domestically and internationally to achieve assistance to promote the role model of NGO aid in Japan.



Refugees of Armed Conflicts, Victims of Natural Disasters



Taking into account the lessons learned from the Camp Japan plan, a new framework, a "Japan Platform" conception was formulated. The objects of the framework is that NGOs, business community, and a government agency (Foreign Ministry) work together for the prompter and more effective implementation of emergency aid with a tripartite cooperation system, based on equal partnership, making the most of the respective sectors' peculiarities and resources. In preparation for a flood of refugees or a devastating disaster, Japan Platform has improved standby functions, such as making emergency aid plans and storing emergency aid supplies, taking advantages of know-how and resources of the respective actors.

Also, Japan Platform aims to offer financial support to financially fragile Japanese NGOs through establishing a fund utilizing Foreign Ministry's ODA funds as well as inviting donations from private sector.

FROM THE SPECIFIC INSTITUTION OF JAPAN

Hyogo Prefecture, Miki Management and Training Center

Timeline based on Disaster Relief Act (Relief Contents (general standard)

Relief	Occurrence (Day1)	Within 3 days	Within 7 days	Within 10 days	Within 14 days	Within 15 days	Within 20 days	Within 1 month	Over 1 month
Conduct damage	(= 4, 5)		, , , , ,			20 000,0			
assessment									
Establish a team									
for DRA									
Enact DRA									
Rescue the									
affected									
Prepare and									
provide food									
Provide water									
Midwifery:									
support delivery									
and hygiene									
materials									
Provide or rent									
clothes, bedding,									
other necessities									
Search and									
dispose of dead									
bodies									
Bury dead bodies									
Remove obstacles									
Medicine:									
diagnosis,									
medication,									
operation									
Provision of									
school items:									
stationery, school									
supplies									
Provision of									
school items:									
textbooks									
Conduct									
emergency									
restoration of									
houses									
Provide									
emergency									
temporary houses									
*Start									
construction within 20 days									
* In asso of exceed		. 1 1		. 1 . 1	. / 111		1 . 4 1 .	.1) '4 '-	

^{*} In case of exceeding the standard mentioned above (called general standard), it is necessary to set the special standard and consult with Prime Minister from Governor

Japans Lessons Learned and Innovations

(Note: Items enumerated in this section are just few out from the many and does not cover the entire Lessons Learn and Innovations of Japan)

I. Japans Lessons Learned out from Earthquake Disaster

The Idea "The concept of reduction should be included in disaster management."

Lessons:

- 1. Natural disaster will definitely occur in the future.
- 2. Communities protect the lives of their community members.
- 3. Actions not usually done in daily lives will surely not be undertaken in disaster situations.

The Idea "It should be a creation of a civic society where self-governing citizens are unified through community solidarity."

Lessons:

- 1. The meaning of recovery changes as time goes by.
- 2. Recovery should be tackled flexibly through an interrelated recovery field.
- 3. Community development is accomplished or enhanced by individual self-governing activities.
- 4. Community development can be advanced by daily collaboration and individual participation.
- 5. Recovery mean the challenge to propose and create new systems.

II. Lessons from Ministry of Land, Infrastructure, Transport and Tourism (MLIT's) Experience of the Great Eastern Japan Earthquake:

"We made all possible preparations. What we prepared was still not enough. We must first be prepared, then transcend those preparations."

- ➤ Mission of the Regional Bureaus Pertaining to Disaster
 - It is important to remember that delays in the RBs' initial response initiatives may also lead to delays in the overall rescue efforts.
- ➤ Missions of Officers in Command at Various Levels
 - Under normal conditions, government offices usually make their decisions through consultative process, from the bottom up. However, this system must be altered in an emergency situation, so commanding officers have the authority to make top-down decisions.

Within One Hour of the Disaster

- Officers in command should therefore realize that the first hour is the "golden time" when they can form the initial response framework and issue numerous instructions in quick succession.

Section 1: Actions that should be taken in the First Hour after the Disaster

Points for Improvement:

1. As noted, the earthquake tremors caused a great deal of damage to general personnel offices at the Tohoku Regional Bureau (TRB). There was, however, minimal damage to the senior management offices, as these were fewer heavy objects such as filing cabinets and printers. Also, of the five hundred personnel were able to convene in the Disaster Operations Room within ten minutes of the earthquake. The other employees, who's offices

sustained more severe damage, temporarily evacuated the building. Senior Officials therefore spent little time assessing and offering assistance for the staff injuries, choosing to concentrate on information gathering and disaster response. This was deemed appropriate to the given circumstances. RBs should as in this instance, prioritize operations or injuries as the situation demands.

- 2. As noted, the TRB offices were fortunate to avoid any fatalities or severe injury. However, if there had been a serious injury, the senior officials' response would have been deemed inadequate or too slow. It would therefore be prudent to make provisions through which to check on health of personnel in the aftermath of a severe earthquake.
- 3. In place senior officials, who cannot leave the Disaster Operations Room, the RBs should appoint other personnel to ascertain and report on the condition of the RB Buildings and on employees' location and well-being.

Section 2: Setting Up an Initial Response Framework

Item 1: Initial Organization of Available Personnel

Item 2: Recalling Absent Senior Officers

Item 3: Sharing Awareness among All Staff

Item 4: Disaster Response Headquarters

Points for Improvement:

1. The Disaster Prevention Operation (DPO) assigns department directors to the response headquarters and their deputies as the leaders of each subordinate response group. However, sudden changes in the authority can negatively impact on departmental functions. Following the Great Eastern Japan Earthquake, the TRM altered the framework in the DPO Plan so that the directors would remain the leaders of each group. The content of DPO Plan should be revised to reflect this practicality.

- 2. The current DPO Plan calls for activation of an International Support Group to assist with initial response. However, these support personnel are often made to assist in reserve. On March 11, the International Support Group was given (and completed) the mission of securing food supplies. However, they could also have been ordered to assist he recording and documentation team, or to ascertain injuries or damage in the RB Buildings.
- 3. The DPO Plan stipulates, that, if it is difficult for employees to assemble in their workplace, they should attend the nearest local branch office or other locations where communication lines have been secured. However, these employees should report their location to the nearest departmental office and return to their ow workplace as soon as possible (except those assigned to special missions).
- 4. At this initial stage of operations, instructions to personnel were being issued verbally. Although execution was consistent, verbal instructions should have been followed with written instructions for the purpose of confirmation and documentation. Instructions after 23:33 on the day of the disaster were given verbally and writing, and this helped to improve awareness and communication between staff.
- 5. It is important that RB personnel are assured of their families 'safety in the large-scale natural disaster. The DPO should be revised to indicate when and in what circumstances there should be automatic checks on personnel and their relatives (for example, in an earthquake measuring level four or above on the JMA Seismic Intensity Scale).
- 6. If the operation headquarter is damaged by the disaster and must move, the DPO Plan stipulates that it should

transfer t the Tohoku Engineering Office in Tagajo City. There, however, limits to the Togajo Office functionality.

- 6.1 There are questions as to whether the alternative facility has the emergency stores, communication lines and other functions sufficient for a headquarters.
- 6.2 There is a limit to office supplies and materials that staff can take on a move.
- 6.3 The location could be inconvenient for personnel who have to commute there for extended periods.
- 6.4 People may assume that the location, address and telephone number for the headquarters would stay the same throughout a crisis. Sudden changes could cause confusion.
- 7. If possible, the headquarters building should be reinforced and repaired if there is damage. If the headquarter must be moved, it is most logical to plan a temporary move and return to the original location at the earliest possible date.

Section 3: Initial Instructions:

- Item 1: Information Gathering (Framework)
- Item 2: Information Gathering (Operation Management and Facilities)
- Item 3: Utilizing Disaster Response Helicopters
- Item 4: Preparation of Information for the General Public
- Item 5: Dispatching Liaison to Prefectures and the Japan Self-Defense Forces
- Item 6: Recording and Documenting

Points for Improvement:

- 1. Information to be collected in a disaster had not been established in advance of March 11. This made communication complicated and troublesome. There was no standardized method for reporting findings, meaning that a data table format had to be created ad hoc. The requisite data and means for recording it should be decided before a disaster takes place.
- 2. There were eighteen cameras installed in the damaged ports (twelve controlled by the TRB and six by port administrators). However, all cameras became unusable due to loss of power caused by breaks in the dedicated circuits. Power outages at the Kakyoin Building also rendered its camera monitoring system unusable. To deal with future emergencies, RBs will install earthquakeresistant cameras, radio communication equipment and uninterrupted power supply system at RB Buildings.
- 3. For future disaster, establishing heliports on the rooftops of the regional headquarters would be a considerable improvement. This means that the helicopter could be called immediately to the headquarters so that bureau staff could board, enabling them to conduct damage survey.
- 4. For large-scale disaster, it is worth examining scenarios where helicopters can be allowed to fly without waiting on instructions from headquarters.
- 5. If the disaster zone extends over a wide area, the sports and recreation facilities that would usually be used as temporary heliports will be designated as primary evacuation centers. They therefore be unusable as provisional heliports. It is therefore prudent to prepare multiple locations in advance for use by the disaster response helicopters.

- 6. The TRB did not initially formulate a basic policy for releasing information to the public. There is room for improvement in this area.
- 7. There were some complaints that contact information for inquiries was not made available. More effective information transmission would have been possible if the availability of information on the TRB website had been publicized before the disaster.
- 8. The MLIT liaisons stationed at the JSDF headquarters had to work in a separate room from March 12, because the JSDF army, naval and air forces combined to form the Joint Task Force (JTF) and there was no space in the original office for MLIT staff. This caused major difficulties in operations. Further coordination with the JSDF regarding work space is therefore necessary.
- 9. Although the documentation team did capture valuable photographs, they did not move together with commanding officers to record their activities. Since leadership record were left to the commanding officers' own discretion, documentation of their actions was not initially sufficient. The documentation team should endeavor to work in the future at the core of response activities with their commanding officers.
- 10.On the other hand, there is a limit to what records and documentation team can accomplish. Individual records are therefore very important. Personnel should be made aware of this in training seminars and other similar activities.

Within the First Day of the Disaster

Section 1: Action should be taken on the Day of the Disaster

- "the first twenty-four hours is the time frame in which response team's must determine key policies for the initial response. The basic principle is to be ready for the worstcase scenario. It is crucial that they are prepared in advance and to the greatest extent as possible".

Section 2: Preparations for Securing Routes for Relief Activities

- "the team responsible for roads must take the initiative and act ahead of other relief efforts, to clear roads and open access routes to the disaster zone'.
 - Item 1: Preparation to Clear Roads
 - Item 2: Preparations to Clear Sea Routes
 - Item 3: Arrangements regarding Construction Companies and Machinery

Points for Improvement:

- 1. The roads to be cleared in response to an earthquake off the Miyagi Coastline had not been decided in advance of the Great Eastern Japan Earthquake. The routes that formed 'teeth of the comb" were only thought of in the disaster aftermath. With regards to future disaster, RDs should conduct case studies and construct access plans in advance and taking into account the location of major cities.
- 2. RBs should also consider the types of disaster and conditions that could arise in specific regions and conduct regular simulation training for each different response.

This training would give RB personnel the ability to respond to a variety of real-life disaster in an appropriate and effective manner.

- 3. As previously noted, earthquake resistant work on bridges along key access routes is an important part of disaster preparations.
- 4. In the case of a large-scale disaster, it is assumed that landlines and cellular phones may be out of service. Therefore, in order to make emergency contacts with the members of disaster-response agreements, a meeting place for members from the Bureau and those organizations should be determined in advance. Additionally, these organizations with disaster-response agreements also should prepare a contact network using satellite phones and priority lines.
- 5. After a tsunami, we must keep in mind that it may take several days for tsunami advisories to be lifted. During this period, we cannot go near the water lines, and it is difficult to obtain about certain local sites. In this case, surveillance cameras should be used. A surveillance camera system must be built so that it is still functional after being struck by a tsunami. This system should be earthquake resistant, have upgraded power sources for outages, and equipped with wireless transmission lines.
- 6. Case studies should be conducted beforehand envisioning the work necessary to reopen waterways after large scale disaster. It is especially important to assume a scenario for which there is a significant shortage of equipment such as work vessels. Sharing information y working with relevant organizations such as the Coast Guard and Port Management agencies is also essential.
- 7. RBs need to devise new means to issue request and instructions regarding road operations and cooperation with external companies. Pre-determining the details of

operations, depending on the nature, scale, location and other features of the disaster, would allow clearance work to begin at an earlier stage. Contact points and communications mechanisms with these companies should be revised. Regular simulation-type training would also help to improve the overall framework for cooperative response.

8. There were some difficulties in obtaining equipment, fuel and materials for construction companies, and in finding a location in which to store cleared rubbles. RDs should therefore consider making additional agreements with stockyards and other relevant organizations, to ensure that disaster recovery efforts are prioritized over private request.

Section 3: Preparation for Regional Assistance

- "the RB should dispatch liaison officers as soon as possible – even if the condition in the region are still unconfirmed"
- Item 1: Preparation for Dispatching Liaison to Municipalities

Item 2: Protection of Evacuees

Points for Improvement:

1. The Iwate River and National Highway Office anticipated that liaisons would be needed to respond to the disaster. The office therefore prepared a "regional familiarity list", based on the hometown locations and work assignments of each staff member in the past ten ears. Because of this list, the office was able to select its liaison soon after the transmission of the actual liaison request. Preparing such list in advance of a disaster is effective preparations for future response.

Within One Week of the Disaster (Operations)

Section 1: Operations to be Undertaken within One Week of Disaster

- "the first week after disaster ca, in other words, be thought of as the 'emergency phase' in which RBs are faced with the most severe decisions about how to put recovery plans into actions, even without pre-existing scenarios to assist them."

Section 2: Response Framework

Item 1: Establishing Chain of Command

- "RBs must ensure that the information needed to make decisions reaches the people who make them."

Item 2: Expansion of Response Framework

Item 3: Deploying TEC-FORCE

Points for Improvement:

- 1. The MLIT issued a directive on May 28, 2012, stating that TEC-FORCE members dispatched to a disaster zone entered under the leadership of the director-general at the local RB. This can be regarded as an outcome activity that followed March 11.
- 2. TEC-FORCE team members and liaison are generally dispatch in response to request from municipal governments. However, in the initial response to a large scale disaster, municipal governments are often working in extreme conditions where communications are paralyzed and there is no room for any objective other than saving lives. There were cases where the role and capabilities of the TEC-FORCE and liaison were not recognized; where the purpose of their deployment could not be confirmed; where governments hesitated about the deployment; and also where the deployment process fell into stagnation. Even in

these cases, TEC-FORCE units and liaison should be dispatched at once and without hesitation. In many cases, the capabilities of these personnel were recognize after their deployment. They became valued assets. The instance in which the TEC-FORCE was deemed unnecessary is important information in itself, and also where the deployment should not be thought of a waste.

3. For TEC-FORCE units deployed the day after the disaster, it works well if RBs have plan (including facilities) for how they should receive them. The plan should also cover survey content, TEC-FORCE team structure, survey formats, maps, and other materials needed for the TEC-FORCE to inspect the facilities of each RB and their administrative divisions. It would also be useful for RBs to construct a framework regarding staff who can explain disaster conditions and survey plan to TEC-FORCE members in the disaster zone, and to ensure that the personnel to perform these duties are designated in the DPO Plan.

Section 3: Securing Routes for Relief Activities

Item 1: Clearing Roads

Item 2: Reopening Waterways

Item 3: Emergency Drainage

- Time is of the essence when it comes to clearing roads. After a large-scale disaster, Disaster Response Headquarter should be quick to issue the overall operations plan and instructions for road clearing activities. Personnel in the disaster zone should begin information gathering and road clearing operations without waiting for directions. This is especially true for roads such as national highways that are evidently high priority. It is important that the personnel undertaking this activity take sufficient care regarding aftershocks and tsunamis, in order to prevent any secondary disaster

Points for Improvement:

- 1. Most of the vehicles remaining on the roads in the aftermath of the Great Eastern Japan Earthquake had been submerged in seawater and thereby rendered unusable. Their removal was therefore not a major problem. However, in the case of an earthquake affecting Tokyo or other more populated areas, there may be issues with removing abandoned but undamaged cars that are blocking the road. There is need to research on how to handle this scenario, so that post-disaster transport routes can be established at an early stage.
- 2. On this occasion, the Tohoku Expressways utility as main access for regional roadways meant that the plan for clearing roadways was constructed in a comb-like formation. The conditions of each disaster are, however, different and RBs should avoid relying too heavily on this design.
- 3. The particular characteristics of the March 11 earthquake and the seismic reinforcement performed after the Great Hanshin- Awaji Earthquake meant that there was relatively little damage to other structures. RBs should not, however, assume that road clearing activities will always focus on removing rubble. More extensive may require other activities.
- 4. A Business Continuity Plan (BCP) Council should be formed consisting of Port Administrator, Relevant Shipping/cargo handling companies, and Land Transport Companies in normal times and framework for early-stage action should be discussed and prepared. This improves the response speed for unexpected phenomenon that may occur after an actual disaster.

- 5. The TRB responded in the earthquake's immediate aftermath with its normal procedures for dispatching disaster response vehicles and apparatus. There was no pre-existing department to manage the entirety of drainage operations. This and the difficulties in acquiring accurate information led the TRB to respond on an ad hoc basis. It took time to assess the overall picture of the flooding, to change response system and to achieve integrated operations. If drainage operations and support (including fuel supply) in the disaster's immediate aftermath, the entire operation could have been more efficient and effective.
- 6. In ordinary disasters, it is expected that the cost of deploying drainage vehicles is shouldered by the local government that requests them. There were, however, no guidelines regarding cost burdens for flooding as extensive as on March 11. The TRB could not clearly answer questions about these cost and some local governments hesitated to request deployment. The national government ultimately exempted local government from paying for the drainage vehicles on this occasion. Local government may have been less concerned if the TRB had been able to make these assurances at an earlier stage. The New Flood Control Act (revised after disaster) now states that the MLIT can implement drainage operations for tsunami flooding as a "specified emergency flood control activity". The MLIT would also pay for these operations, reinforcing the support that is given to local government in a disaster-affected area.
- 7. Government personnel who were sent to disaster zone frequently received on-site request for drainage vehicles. They subsequently issued orders for the vehicles deployment. These orders, however, did not consider the overall allocation of drainage vehicles, drainage priorities or the availability of fuel. There was one instance where the location to which the drainage vehicle was dispatched could not physically be rained, because the damage and ground subsidence from the tsunami had caused the flood water to

connect with the ocean. Government officials involved with risk management must be careful with their words and actions, to ensure that they do not break the chain of command. RBs should also improve their means for disseminating information about drainage ump vehicle operations at an early stage.

- 8. In the initial stage of equipment dispatch command, personnel would respond to request by making successive orders to assembled operators to deploy equipment. This means that there was no connection between the equipment's "home" RB and the location to which they were dispatched, which in turn made it difficult to provide logistical support. When dispatch location was changed, the TRB aimed to concentrate equipment in accordance with the location of its associated RB (i.e making sure that the equipment from one RB was sent to sites in close proximity). This strategy made easier to carry out logistical assistance. It is, however something that dispatch command should consider from the start of operations.
- 9. The personnel and equipment operators that arrived from other bureaus came with sufficient readiness for their work. They were, however, obviously disconnected when they were put on standby without receiving any information. A certain amount of waiting time before deployment is unavoidable, but it is necessary for RBs to supply these personnel with sufficient information.

Within One Week of the Disaster (Logistical Support)

Section 1: Logistical Support to be Performed within One Week of the Disaster

"providing logistical support to personnel working in disaster zones is a crucial part of responding to a large scale disaster. During the initial period of a disaster response, the officers in charge will often focus on strategic operations at the site of the disaster. Logistical support is thus in many cases overlooked or regarded as an auxiliary component of response activity. Logistical support must be regarded as a primary activity, of the same importance as strategic operations. It is especially important that staff at the MLIT more senior levels place more weight on logistical activities. This will help to achieve a smooth disaster response."

Section 2: Logistics

Item 1: securing Communication

Item 2: Assisting Staff and their Families

- RBs should therefore from the onset offer firm guidance for maintaining the health of their employees. Commanding Officers should also pay close attention to the condition of each other's health.
- It is for this purpose that the Japanese custom of all personnel spending the night at work until the job is done should be actively prevented for the term of disaster response activities. A staff rotation schedule should be introduced at an early stage. It is, furthermore, important to communicate information about food, clothing and accommodation and to try and shift employees from an erratic crisis-driven lifestyle to a steady and sustainable schedule.

- There were also cases in which the family members of TRB personnel were either missing or living in evacuation facilities. These cases need to be taken into considerations.

Item 3: Transporting Materials and Personnel

Item 4: Securing Food

- Securing food supplies is the most fundamental aspect of a disaster response. Securing an adequate quantity is the minimum requirement, but if unusual living condition are expected to continue for a long period, it is necessary to consider the quality of food as well.
- RDs must especially give consideration to the following:
 - a. Too much food is better that than a food shortage. RDs should aim to procure large quantities of swiftly ad by all means available.
 - b. RDs should distribute food to meet the needs of local agencies, municipalities, evacuation centers and other organizations.
 - c. For staff inside the TRB, emergency food supplies should be distributed to all members for a set period of time.
 - d. As time passes, a greater variety of foods should be prepared.
 - e. Commanding Officers and Senior Officials should eat the same food as their employees, at the same place, and only when everyone else has received their share.
 - f. RBs should keep a record of the people and organizations that assisted with food supply, for the purpose of etiquette and later expressions of thanks.

Item 5: Securing Fuel

- When there is a power failure over a large area, fuel for emergency generator equipment becomes a lifeline to ensure the continuation of response activities, supporting everything from power in the RB Building to the continuation of communication. Bureaus should work to manage their remaining supply of electricity as soon as possible. In addition, RDs need a large quantity of fuel for road clearing, emergency restorations and immediate assistance to the disaster zone. They must, therefore, procure fuel supplies by all available means. It is especially difficult to obtain fuel from private markets in the first week after the disaster strikes. Procurement through the public sector, with help from RBs across Japan is essential.

Points for Improvement:

- 1. Confirmation regarding staff safety were completed within three days. However, the number of missing persons as well as the difficult state of communications in the Pacific coastal regions meant that it took much longer to confirm the safety of the families of TRB personnel. The number of families whose status was not confirmed was reduced to three on March 29. The TRB had no preparations for determining the evacuation status of families of the damage conditions at their homes. The response regarding family safety was thereby inadequate.
- 2. Much of the information about employees' homes and families only became clear through the process of collecting donations. This raised a number of issues. RBs need to take decisions in advance about the scope of private information to be collected at these times.
- 3. Number of pre-assembled temporary bridges should be obtain and kept in locations that will not be affected by tsunami
- 4. Regarding drivers, the youngest driver under RB employment are in their late forties. Amid the current personnel reductions, there are no plans for new driver recruitment. Under these conditions, there will be no drivers at RBs in the next ten years or so. It is thus important that RBs consider
- 5. Transporting fuel and using transfer stations required coordination with private companies. It may also advisable to

establish agreements for these operations in advance, in case of another emergency.

Section 3: Information Transmission

Item 1: Arranging Press Releases and Interviews

- Working in collaboration with news and broadcasting organizations is indispensable for transmitting swift and accurate information about disaster conditions to the outside world. If it is difficult for news media agencies to assess the situation due to harsh reporting condition, MLIT must provide them with the assistance they require. This includes proactive cooperation including the provision of video images and other materials

Item 2: Accommodating Domestic and Foreign Observation Missions

- Dealing with observation missions is often seen as burden to the side that has to receive them. There is, however, a substantial amount of information that can only be conveying through directly showing people the disaster zone. Having MLIT offices in the disaster zone handle missions and make visitors correctly understand the issues facing them has positive effects on the subsequent recovery activities. Observation missions should therefore be proactively welcomed. The process of making and explaining documents presented to the observation mission should be systemized in order to increase efficiency.

Points for Improvement:

1. Even in serious disaster like the Great Eastern Japan Earthquake, the Japan Self-Defense Force (JSDF) were able to prepare public relations plan that aligned their objectives and methods with the progress of their response activities. They developed this as strategic public information from their initial response to their final withdrawal from operations. The photographs they used with their releases captured not only working conditions but also the faces, gratitude and even happiness of the JSDF and should use them again in the

future. In addition, providing news agencies with information directly through the media briefings became a good opportunity for public relations. This is an area that merits strategic improvement.

2. "Earthquake Disaster Information" was released continuously to media organizations, but simply numbering releases (for example, Earthquake Disaster Information No.1) and ending them out mechanically did not accurately convey the TRB's intentions to the public. RBs should make innovations to ensure that press releases have visual impact and are understood at a glance.

Item 3: Using Internet

- When there is an excess information, RBs should abide by the ironclad rule of providing a user-friendly and simple interface. It is also useful to prepare temporary electronic bulletin boards on the internet for disaster-stricken communities, to communicate their needs as well as other information.

Section 4: Working with Related Agencies

Item 1: Working with Japan Self-Defense Forces

The Japan Self-Defense Forces and Regional Bureaus are two main organizations capable of conducting swift disaster response operations to protect the country in time of crisis. Together they can carry out operations to secure communications for a large area over multiple prefectures; they can maintain a chain of command; and thy can deploy disaster response vehicles and apparatus and personnel on a large scale. In the initial response period they work together as one team. It is desirable that the Regional Bureaus and Japan Self-Defense Forces complement and support each other's activities and respond in flexible manner. A close relationship should be built through regular dialogues and joint training sessions in normal times.

Item 2: Working with Japan Coast Guard

Item 3: Working with Construction Industry

Points for Improvement:

- 1. The JSDF and TRB enacted as mutual arrangements to dispatch liaisons and exchange information, and the TRB Liaisons sent to the JSDF were authorized to work in the JSDF Disaster Response Headquarters on the first day. However, the arrival of personnel from the air, land and maritime JSDF to form the disaster JTF meant that, from the second day, there was no space for TRB Liaisons. Having to work in separate rooms caused difficulty in performing operations. RD Liaisons should be allowed to work inside the JSDF Disaster Response Headquarters in the future, in order to enhance cooperation.
- 2. As a junction between land and sea (Japan Coastguard), road information should be also be examined in advance with road departments and announced in a way that is easy to understand.

Section 5: Preparation for a Swift Recovery

Item 1: Temporary Suspension of Normal Construction Work

Following a large scale disaster, it is necessary to concentrate the mechanical power and workforce of the construction industry on the disaster response. In addition, given that equipment, fuel and construction materials will fall into extreme shortage. Regional Bureaus should temporarily suspend other on-going public construction work and operations, in accordance with the scale of damage from the disaster.

Item 2: Emergency No-Bid Contracts

- Initial response activities and emergency restoration are a race against time for saving lives and supporting the day-to-day lifestyles of the victims. To pursue these actions swiftly and smoothly, RBS should utilize no-bid contracts based on the Public Accounting Act.



Innovations from Hyogo Prefectural Government:

The year 2015 marks 20 years since the Great Hanshin-Awaji Earthquake, as well as the 10th anniversary of the 2nd UN World Conference on Disaster Reduction. "Hyogo HFA Research Committee' was established and evaluated efforts in disaster-affected areas. Based on the outcome from the committee, Hyogo will share recommendation to promote the Post 2015 Framework for Disaster Risk Reduction (DRR) Action which will be discussed at 3rd UN World Conference on DRR.

Evaluation and Verification of 20 years Efforts- Recommendations towards the post 2015 Framework for Disaster Risk Reduction as follows:

Expected Outcome:

Substantial reduction of disaster losses, lives and in the social, economic and environmental assets.

Strategic Goals:

Goal 1: Integration of DRR into sustainable development policies and planning

- **Goal 2:** Development and strengthening of institutions, mechanisms and capabilities
 - **Goal 3:** Systematic incorporation of DRR into emergency preparedness and recovery

Priorities for Action

Action 1: Make DRR a National Priority

- 1.1 Initiative to pass on memories and lessons of the Great Hanshin-Awaji Earthquake (GHAE)
- 1.2 Emergency management system enhancement and reinforcement by local government
- 1.3 Establishment of Hyogo Disaster Management Center
- 1.4 Development of Voluntary Disaster Response Organization

Action 2: Know Risk and Take Actions

- 2.1 Preparation and release of Hazard Maps
- 2.2 Development of a disaster information delivery system

Action 3: Build Understanding and Awareness

- 3.1 Establishment and operation of the Disaster Reduction and Human Renovation Institution (DRI)
- 3.2 International disaster reduction cooperation by local government
- 3.3 Disaster Risk Reduction education in Hyogo
- 3.4 Promotion on DRR learning at community organization, NPO and workplace
- 3.5 The Great Hanshin-Awaji Earthquake verification and recommendation project

Action 4: Reduce Risk

- 4.1 Seismic resistance enhancement programs for buildings
- 4.2 Enhancement of forest conservation and river management
- 4.3 Disaster-resistant building programs
- 4.4 Development of Rokko Mountain Range Green Belt
- 4.5 Hyogo Mutual Aid System for Housing Reconstruction (Phoenix Mutual Fund)
- 4.6 Development of Mental health care system for disaster victims

Action 5: Be Prepared and Ready to Act

- 5.1 Development of Regional Emergency Management Bases
- 5.2 Support for volunteer activities
- 5.3 Development of Emergency Medical Service System
- 5.4 Implement of "Mobile Health Care Room" Program
- 5.5 Development of disaster victims support system

BUILD BACK BETTER THAN BEFORE

- 1. Promotion of well-planned reconstruction
- 2. The Great Hanshin-Awaji Earthquake Reconstruction Fund
- **3.** Promotion of Public-private Partnership
- 4. Rebuilding of Local Community
- **5.** Empowerment of gender perspective in reconstruction
- **6.** Helping disaster victims find something to live for
- 7. Creating a Disaster-resilient society

- 8. Phoenix Plaza
- **9.** Elderly independence Support
- **10.**Industrial recovery by cooperation with government and industry

RECOMMENDATIONS TOWARDS THE POST 2015 FRAMEWORK FOR DISASTER RISK REDUCTION

Recommendation for New Priorities of Action:

Developing "Build Back Better than Before

- Establishment of fund to meet disaster victims multifaceted need flexibly
- > Creating a disaster-resilient society
- Participation of citizens during the recovery process
- > Support disaster victims with various stakeholders
- Rebuilding local community
- ➤ Helping disaster victims find something to live for
- Maintain health condition of psychological and physical for disaster victims
- > Empowerment of gender perspective in reconstruction
- ➤ Development of Disaster Management and Disaster Risk Reduction by role-sharing and coordination of self-help and public-help
- Support the development of community-based disaster prevention organizations
- > Introducing housing reconstruction Mutual Aid Fund (for Homeowners)

Recommendation for New Perspective:

Developing International Disaster Reduction cooperation by Local Government

- Sharing the experiences and lessons from disaster
- Providing physical and personnel support
- > Implementing projects supported by donation

Enhancement of the Current Priorities for Actions:

- 1. Empowerment of DRR Capability of Local Government
 - Enhancement of Emergency Management System
 - Improvement of awareness and capability of the top level of the government
 - Empower community and local DRR capability
- 2. Highlight the importance of Disaster Risk Reduction (DRR) Education and Learning
 - Promoting DRR education in school
 - Training specialized personnel in universities
 - Utilizing school as community disaster management base
 - Creating schemes for School Disaster Management (prior to disaster
 - Promoting active learning of disaster management at community and household
- 3. Verification of Disaster, Passing on Lessons Learned
 - Initiative to pass on memories of disaster
 - Verification of past disaster and recommendations for future disasters

- Sharing the experience and lessons learn to the World
- Preservation and Utilization of Disaster remains

Innovations from Kochi Prefecture, Kochi City:

Kochi's efforts to disaster management as follows:

- Preparing for Nankai Trough Earthquake
- Promotion of Disaster Prevention related to Businesses to combat natural disaster
 - Support to achieve the local production, local consumption and external sales of disaster prevention related products and technologies;
 - Certification of Disaster related Products
- ➤ Promotion of Disaster-related Industry
 - Contributing to monitoring torrential rain and flooding
 - Plant-based drainage materials to improve soft ground
 - Speedily restoring bridges in the event of disaster
 - Quick reinforcing levees with file wall backbones
 - SONAERU Readiness Measures
 - NIGERU Evacuation
 - IKIRU Survival
- ➤ Measures of Self Protection- "Against Quake"
 - Accelerating Seismic Resistance of House

- > Measures for Tsunami Evacuation
 - Development/improvement of evacuation routes and sites.
- \succ 3rd Nankai Trough Earthquake Countermeasure Action Plan

Philippine's Response Innovation

Philippines is one the country who benefited the use of Incident Command System as an On-Scene Disaster Management namely during: Papal Visit 2015 for the victims of Yolanda (Haiyan in Tacloban wherein ICS was being implanted in every areas of engagement of the Pope, Miss Universe 2017, Marawi Crisis 2017, Surigao Earthquake 2017, Caraga Rescue Exercise 2014 and etc.

then response Since challenges such as coordination, command and control, life prioritization, who's in charge, optimizing the use of resources and its management, welfare of responders deployed were addressed and put to a minimum because of the use of ICS.







Philippine's Preparedness Innovation to Ensure Effective Response

To ensure that everything is in the right place and in the right track the Philippine Government conducted Quarterly Disaster Risk Reduction and Management Council Meeting that is being participated by all member agencies from the government, private sector, academe, civil society organizations, accredited disaster volunteers and other stakeholders.

Response Trainings such Incident Command System Training, Rapid Damage Needs Analysis Training, Medical First Responders Training, Collapse Structure Search and Rescue Training, Water Search and Rescue Training; Earthquake and Evacuation Drill, Tsunami Drill, Fire Drill and Simulation Exercises were also conducted regularly to ensure the safety of the country.









V. SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 Summary

This study aims to determine and enumerate the on-scene disaster response mechanism of the Philippines and of Japan.

Based on the gathered data, the Researcher found out that there are similarities and peculiarities on the implementation of Disaster Risk Reduction and Management especially on Response Mechanism such as:

Similarities:

- 1. Both countries are situated in the Pacific Ring of Fire where active faults, trenches, volcanic eruption, geohazards and hydro metrological hazards are so prevalent.
- 2. In times of disaster response, its top most priority is life preservation, incident stabilization and property conservation.
- 3. Presence and involvement of Disaster Volunteer in every village or town.
- 4. Involvement of Self Defense Force

Peculiarities:

- 1. Philippines has a greater number of Islands that composes the country. This is a challenge in terms of responding to an emergency as to accessibility and transportation issues.
- 2. The use of Incident Command System as an On-Scene Disaster Response Mechanism for the Philippines.
- 3. Institutional Mechanism and Coordination during emergency
- 4. Specific Agency, Department and Offices look into specific hazard for Japan

5.2 Findings –

Comparison of Japan and the Philippines Disaster Risk Reduction Management System (though the study is focuses mainly on the On-Scene Disaster Response Mechanism yet the Researcher find it also important to include other thematic areas of Disaster Management of Philippine and Japan in the table presented below)

Phases in DRRM	JAPAN	PHILIPPINES
Phases in DRRM Governance Legal Basis	JAPAN • Disaster Countermeasures Basic Act (1961) • Act on Prevention of Marine Pollution and Maritime Disaster (1970) • Act on Disaster Prevention in Petroleum Industrial Complexes and other Petroleum Facilities (1975) • Act on Special Measures for Large-scale Earthquakes (1978) • Act on Special Measures for Nuclear Disasters (1999) • Act on Special Measures for Promotion of Tonankai and Nankai Earthquake Disaster Management (2002) • Act on Special Measures for Promotion of	• Republic Act 10121 also known as Philippine Disaster Risk Reduction and Management Act of 2010. • PD 1566 (June 1978) • DRM Bill (May 27, 2010) • Local Code of 1991 • Building Code • Land Use Zoning • Fire Code
	• Act on Special Measures for Promotion of Disaster Management for Trench-type Earthquake in the	
	Vicinity of Japan and Chishima Trenches (2004)	

Disaster Prevention and Mitigation and Preparedness

- Erosion Control Act (1897)
- Building Standard Law (1950)
- Forest Act (1951)
- Act on Temporary Measures for Disaster Prevention and Development of Special Land Areas (1952)
- Meteorological Act (1952)
- Seashore Act (1956)
- Landslide Prevention Act (1958)
- Act on Special Measures for Disaster Prevention in Typhoon-prone Areas (1958)
- Act on Special Measures for Heavy Snow Areas (1962)
- River Act (1964)
- Act on Prevention of Steep Slope Collapse Disaster (1969)
- Act on Special Measures for Active Volcanoes (1973)

Act on Special Financial Measures for Urgent Earthquake

Lead Agency for Prevention and Mitigation:

Department of Science and Technology (DOST)

Priority Actions:

- Early warning systems
- Flood forecasting and monitoring
- Hazard and risk mappings
- Structural and non-structural interventions

Lead Agency:

Department of Interior and Local Government (DILG)

Using the Preparedness Plan

Priority Actions:

- Contingency planning
- Prepositioning and stock-piling
- Capacitating and organizing responders
- Training, drills and exercises
- Pre-Disaster Risk Assessment

Γ	I a	
Disaster Emergency Response	 Countermeasure Improvement Projects in Areas for Intensified Measures (1980) Act on Special Measures for Earthquake Disaster Countermeasures (1995) Act on Promotion of the Earthquake-proof Retrofit of Buildings (1995) Act on Promotion of Disaster Resilience Improvement in Densely Inhabited Areas (1997) Act on Promotion of Sediment Disaster Countermeasures for Sediment Disaster Prone Areas (2000) Specified Urban River Inundation Countermeasures Act (2003) Disaster Relief Act (1997) Fire Services Act (1947) Flood Control Act (1949) 	Department of Social Works and Development (DSWD) using the Response Cluster Plan Priority Actions: Rapid damage assessment and needs analysis Issuance of advisories and situation reports Activation of Response Clusters and Incident Command System Mobilization of responders Humanitarian assistance (eg relief distribution) Provision of financial assistance Management of evacuation centers
Recovery and Reconstruction, and Financial Measures	Insurance Act (1937) • Agriculture Disaster Compensation Act (1947) • Housing Loan Corporation Act (1950	Lead Agency: National Economic and Development Authority (NEDA)

- Act on Interim
 Measures for
 Subsidizing Recovery
 Projects for Agriculture,
 Forestry and Fisheries
 Facilities Damaged Due
 to Disasters (1950)
- Small-Medium Business Credit Insurance Act (1950)
- Act on National Treasury Share of Expenses for Recovery Projects for Public Civil Engineering Facilities Damaged Due to Disasters (1951)
- Public Housing Act (1951)
- Fishing Boat Damage Compensation Act (1952)
- Agriculture, Forestry and Fisheries Finance Corporation Act (1952)
- Railway Improvement Act (1953)
- Act on National Treasury Share of Expenses for Recovery of Public School Facilities Damaged Due to Disasters (1953)
- Act on Interim
 Measures for Financing
 Farmers, Woodsmen
 and Fishermen
 Suffering from Natural
 Disasters (1955)
- Airport Improvement Act (1956)
- Small-scale Business Equipment Installation

Using the Rehabilitation and Recovery Plan

Priority Actions:

- Post-disaster needs assessment
- Enhancement of policies and plans
- Reconstruction using "build back better" approach
- Resettlement
- Provision of new sources of livelihood

	Financial Support Act	
	(1956)	
	• Act on Special Financial	
	Support to Deal with	
	Extremely Severe	
	Disasters (1962)	
	• Fisheries Disaster	
	Compensation Act	
	(1964)	
	• Act on Earthquake	
	Insurance (1966)	
	• Act on Special Financial	
	Measures for Group	
	Relocation Promotion	
	Projects for Disaster	
	Mitigation (1972)	
	 Act on Payment of 	
	Solatia for Disasters	
	(1973)	
	• Act on Special Measures	
	for Reconstruction of	
	Disaster-stricken Urban	
	Areas (1995)	
	• Act on Special Measures	
	for Reconstruction of	
	Jointly Owned	
	Buildings in Disaster-	
	stricken Areas (1995)	
	• Act on Special Measures	
	for Preservation of	
	Rights and Profits of the	
	Victims of Specified	
	Disaster (1956)	
	 Act on Support for 	
	Livelihood Recovery of	
	Disaster Victims (1998)	
DRRM Organization		
National Level	Central Disaster	National Disaster
	Management Council	Risk Reduction
		Council (NDRRMC)
Secretariat of the	Cabinet Secretariat	Office of Civil
Council		Defense (OCD)
		Secretarial of
		NDRRMC

Dogional I1		Dogional Diagrature	
Regional Level		Regional Disaster	
		Risk Reduction	
		Council (18 Regions)	
		headed by the OCD	
		Regional Director	
		Secretariat of	
		RDRRMC - OCD	
		Regional Centers	
Provincial Level	Prefectural Disaster	Provincial Disaster	
	Management Council (47	Risk Reduction	
	Prefectures) headed by the	Council (81	
	Governor	Provinces) headed by	
	Governor	the Governor	
City/Municipal	City/Municipal Disaster	City/Municipal	
Level	Management Council	Disaster Risk	
	(1,800 City/Municipality)	Reduction Council	
	headed by Mayors	(145 City's) (1,489)	
	lieaded by Mayors	headed by the	
		1	
X7*11 .	D :1 : 11 1	Mayors	
Villages	Residential Level	Barangay Disaster	
		Risk Reduction	
		Council - 42,029	
		headed by the	
		Captain	
Disaster Monitoria	ng	T	
Flood Hazard	Japan Meteorological	PAGASA/MGB	
Monitoring	Agency	Flood Forecasting &	
	Ministry of Land,	Warning	
	Infrastructure and	NDRMMC OpCen	
	Transportation and	RDRRMC,	
	prefectural government,	PDRRMCs,	
	NHK	C/MDRRMCs	
	Internet and Mobile	BDRRMCs	
	Warning Alert System	Media	
	(JMA forecast are precise		
	and exact location and		
	trend with rainfall		
	measurement)		
Storm & Flood	JMA	PAGASA	
Countermeasures	OMA	IAUABA	
	Ministry of Land	DACACA	
Rainfall and	Ministry of Land,	PAGASA	
Water Level	Infrastructure and	Flood Forecasting &	
	Transportation and	Warning	
	prefectural government		

		Local Government	
		and Community	
Flood Mitigation	• Flood Control Act	DPWH/LGUs	
and	• Soil Conservation and		
Countermeasures	Flood Control Urgent		
	Measures		
	• Disaster		
	Countermeasures Basic		
	Act		
	• Act on Special Financial		
	Support		
	Building Code		
	• Specified Urban River		
	Inundation		
	Countermeasures Act		
	• Countermeasures for		
	Sediment Disaster Prone		
D:	Areas	DPWH/Local	
River	National for Class A River	,,	
Management	• Prefectural and	Government Units	
	Municipal for Class B Rivers		
Flood Prevention	• River Channel	DPWH/ Local	
Structural	Improvement	Government Units	
Measures	(embankment, channel	Government emis	
11200001100	excavation, bank raising		
	& channel expansion)		
	• Run-off Control		
	(construction of reservoir		
	and regulating basins)		
	Damage Mitigation		
	(establishment of		
	warning and evacuation		
	system, flood fighting,		
	publication of maps, use		
	of flood proof buildings,		
	IEC		
Flood Prevention	Hazard mapping	Hazard mapping	
Non-structural	• Water level gages	and vulnerability	
measures	• Flow meters	assess	
	• CCTV cameras	• Information,	
		education	
		campaign	

	• Information	• Community based
	dissemination,	rainfall and water
	evacuation, rescue	observation in
	• Drills and exercises	prone areas
		• Pre-emptive
		evacuation
Environmental		Environmental
• Land Use Plan	• Soil Conservation and	Law
	Flood Control Urgent	• Land use zoning
• Waste	Measures Act	Waste Segregation
Management	• Act on Promotion of	Management
	Sediment Disaster	• RA 8749 Clean Air
• Pollution	Countermeasures for	Act of 1999
	Sediment Disaster	
• Reforestation	Prone Areas with	
	amendments	
	• Flood Control Act with	
	Amendment	
	• Specified Urban River	
	Inundation	
	Countermeasures Act	
	• Forest Act	
	• Erosion Control Act	
	• Forest Act	
	• Act on Temporary	
	Measure for Disaster	
	Prevention and	
	Development of Special	
	Land Areas (1952)	
	• Seashore Act	
	• Landslide Prevention	
	Act (1958)	
	• Act on Special Measures	
	for Disaster Prevention	
	in Typhoon-prone Areas	
	(1958)	
	• River Act	
	• Act on Steep Slope	
	Collapse Disaster (1969)	
	• Act on Promotion of	
	Disaster Resilience	
	Improvement in Densely	
	Inhabited Areas	

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	Precipitation	
	• Engineering	
	Environmental	
	Maritime Disaster	
	Research	

5.3 Conclusions and Recommendations

Based on the findings of the study, the following conclusions and recommendation are drawn:

- 1. It is imperative that the culture of preparedness is being inculcated in every citizen and in all walks of life. Everyone has its role in making our environment safe to live.
- 2. Integration of DRR in school curriculum and make it as major subject from primary grade to college. This knowledge foundation plays a vital role keeping the whole of society safe from disaster.
- 3. Our nature changes and maybe this change is called "Natural Disaster" and is at our door waiting to happen. We humans being cannot say no to it. Therefore, we need to live in harmony with nature by mitigating and make preparations or else suffer its consequences.
- 4. Conveying the knowledge and experiences from the past generation to future generation, from indigenous knowledge to the way of science will play an important part in the integration of measures to increase the level of disaster awareness to reduce risk and vulnerability.
- 5. "Natural disaster will always be with us but disaster need not be"- by Gen. B. Ramos

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