Fiqh Anticipation: Mitigation Concept Based on Islamic Law

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Abstract. Disasters as social phenomena that occur when a community suffers from disruption and loss due to natural processes or technological accidents. Based on this definition, earthquake, tsunami and other disasters are not limited to natural disasters, it can also be a social disaster if the natural disaster is directly in contact with humans and causes material and immaterial losses. Indonesia as a country with the largest Muslim population in the world cannot be separated from Islam in various aspects of life, including the issue of disaster mitigation. for Indonesian Muslims, religious entities are perceived to be bigger than state entities. Therefore, the mitigation approach of science must be harmonized with religious teachings. With the result that natural disaster mitigation is widely accepted by the community. Contemporary Islamic scholars, especially those who have been involved in statistics and other related sciences, will dare to state that future estimates based on honest and correct statistical calculations can be regarded as reality, because according to scientific calculations it is relatively certain to occur. Therefore Fiqh anticipation as one of the mitigation management in Islam can take the form in the following three steps; (1) Reducing or avoiding the impact of losses from natural disaster hazards; (2) Ensure fast arrival of assistance to victims; (3) Achieve a quick and effective recovery of society.

Keywords: Islam, fiqh anticipation, natural, disaster, mitigation.

1. Introduction

The natural disasters of the earthquake and tsunami that occurred in Palu, Donggala, Sigi and Parigi Moutong added to the long list of state failures in anticipating potential natural disasters that come along with people's lives. Indonesia is very familiar with natural disasters. Various natural disasters which are based on geographical, geological and hydrological conditions should encourage Indonesia to build community resilience in the face of natural disasters.

The territory of Indonesia is the largest archipelago in the world. Geographically, Indonesia located between the continents of Asia, Australia, the Indian and Pacific Oceans it has 17,508 islands [1]. Although Indonesia has natural wealth and the beauty of islands, it is also important to realize that the archipelago has 129 volcanoes active, or known as the ring of fire, and located at the confluence of three world active tectonic plates: Indo-Australian, Eurasian and Pacific Plate [2].

Ring of fire and being at the meeting of three tectonic plates puts the archipelago in the potential to threaten natural disasters. On the other hand, its position in the tropics and hydrological conditions trigger other natural disasters, such as tornado, extreme rain, floods, landslides and drought [3].

There are many examples of major natural disasters that have occurred in Indonesia such as earthquakes, tsunamis and volcanic eruptions with huge casualties and property. Mount Krakatau was erupted in 1883, and then the earthquake that followed the tsunami in Aceh on December 26, 2004 with a total of 130,000 people died. The 8.7-magnitude earthquake in Nias caused the death of approximately...
900 people, the Yogyakarta earthquake killed 300 people, the Padang earthquake in 2009 with the death toll of 500 people. The Mentawai earthquake in October 2010 caused 509 people to die, the Lombok earthquake killed 563 peoples and the last earthquake and tsunami in Central Sulawesi which according to the latest data released by The National Agency for Disaster Countermeasure (BNPB) has resulted in 1,571 deaths and that is not including those missing [4]. All that does not include natural disasters caused by flash floods in Wasiir which claimed up to hundreds of people.

Based on the Asia-Pacific Report 2010 data compiled by the United Nations Economic and Social Council (ECOSOC) for the Asia Pacific region, since 1980 to 2009 natural disasters in Indonesia have recorded huge losses of 191,164 people killed (second place in Asia Pacific), 17 million people the victim (ranked ninth) with economic losses reaching USD. 22.582 billion. In 2010, losses reached Rp. 5 trillion [5]. Facing the threat of material and mental losses of natural disasters, it is considered important to realign the way to view natural disasters and the efforts that can be done in order to deal with these threats presented in an Islamic perspective in the following explanation.

The role of religion in post-disaster such as reducing psychological its impact, religious-based organizations relief and assistance have been widely acknowledged. In fact, every disaster always causes the feeling of worry, uncertainty, sadness and distress of the survivors especially those who lost their lovely family members [6]. Religious-based relief or ganizations have been playing important role both in assisting survivors socially and psychologically in building their life. There has been acknowledged that Holy Book contains explanation about the meaning of human sacrifice, life, death and life after death then connects to natural disaster events.

On the other hand, the increase in unpredictable natural disasters events for a decade has led to put the disaster preparedness as a central issue in disaster management. Despite such efforts to encourage people to take preparedness action, previous studies on natural disaster is that people neglect to take preparation for such disaster events [7]. The question is that can the religious teaching contribute to motivate people to be more prepared for disaster as the dominance of religious views that disaster is caused by God’s wrath?

2. Methodology of Study

In order to extract the most suitable and related verses from Quran as well as important Hadith from accessible and translated Hadith compilation (for this study: Bukhari and Tirmidhi) keywords that are related to disaster issues were researched.

The difficulty of this methodology was that the occurrence of these keywords was very low and that verses found did not give sufficient information that would be useful in the context of fiqh anticipation as mitigation concept based on Islamic law. Therefore the keywords to be researched were extended, which proved to be necessary shift in methodology to come to appropriate results.

The next step consisted of compiling both Quranic verses and Hadith and the attempt to comment each keyword. The comments however are based on the experience and the knowledge of the author and try to connect the verses and Hadith to the context of disaster preparedness and response. The translated of Quran used here is The Meaning of Holy Quran by Abdullah Yusuf Ali [8].

3. Qur’an and Disaster

In the Qur’an, there are three terminologies related to disasters, namely: muṣḥab (misfortune/disaster), balā’ (tremendous trial), ‘azāb (penalty/punishment) [9]. While fitnah (tumult) is part of the disaster itself. All disasters that afflict unbelievers are called ‘azāb. Like the flood of Noah, the survivors of the disaster were only believers who followed the teachings of Noah. Infidels to Prophet Lot destroyed but people who pious survived. Those who do not believe to the Prophet Shelah are afflicted with a terrible plague, but strangely, a believer even though his house is next to him is not affected by the disease, while the infidels are destroyed by a terrible disease. Moreover, the plague that attacked all eaters of camel
meat of both the Prophet Shelah and the Prophet Jethro (Syuaib) were all affected by the virus, but those who did not eat were not infected with the virus. Abraha’s army was destroyed because punished by God with the stone which Ababil’s bird threw, but nothing happens around. So, the ‘azāb is intended for people who are disobedience and unbelief to God [10].

Whereas musībah aims to test the faith of a Muslim. But musībah is take more massive level, because musībah is no deal whit religion, nation, language, color and sex. Everyone could be hit by musībah. Therefore, in Qur’an chapter 2 verse 155 God explains that musībah takes the form of fear (khawf), hunger (jauw), some loss in goods (naqṣ min al-amwāl), some loss in lives (naqṣ min al-anfus) and loss some fruits (naqṣ min al-tsamīḥ). all of these are forms of testing from God (wa lanabluwannakum).

While balāʾ are more individual and mechanical in nature. Such as when God gave an individual test to the Prophet Abraham to slaughter his son Ishmael, whose test was mechanically aimed at improving the spiritual quality of Prophet Abraham. That’s why in Qur’an chapter 37 verse 106 God calls the test as al-balāʾ al-mubn (individual tremendous trial) [11].

From above explanation I conclude that natural disasters have attacked Indonesia are not punishments from God but ordinary natural calamities mentioned in Qur’an as musībah (disaster). Disaster must be regarded as ordinary natural events. Comes anytime, anywhere, without having to believe and do things that are mythical. There are several attitudes that must be considered in responding to disasters. Firstly, how to improve our insight in the face of disaster including disaster preparedness. second, do not understand the disaster as a curse, punishment or penalty (‘azāb) from God, but it’s only natural phenomena. Third, do not mythologize natural disaster, because its polluting the purity of faith. And fourth, in Islamic view, disaster has a positive dimension, namely to pay off our sins in the day afterlife. In this case The prophet Muhammad said “Never a believer is stricken with a discomfort, an illness, an anxiety, a grief or mental worry or even the pricking of a thorn but Allah will expiate his sins on account of his patience”

4. Natural disaster and Islamic teaching
Smith and Petley defines disasters as social phenomena that occur when a community suffers from disruption and loss due to natural processes or technological accidents [12]. Based on this definition, it can be understood that natural disasters are actually social phenomena due to natural events. Not all natural events such as earthquakes or landslides can be called natural disasters. But when in contact with humans and cause loss of property and soul, that is what is called a natural disaster. Based on this definition, earthquake, tsunami and other disasters are not limited to natural disasters, it can also be a social disaster if the natural disaster is directly in contact with humans and causes material and immaterial losses.

Indonesia as a country with the largest Muslim population in the world cannot be separated from Islam in various aspects of life, including the issue of disaster mitigation. for Indonesian Muslims, religious entities are perceived to be bigger than state entities [13]. This at least shows how disaster victims shout for help from their gods not to their country or government. Therefore, the mitigation solution for Indonesian Muslims does not only focus on science, but even the mitigation approach of science must be harmonized with religious teachings. With the result that natural disaster mitigation is widely accepted by the community.

In Islam, natural disasters that hit humans are qadha from Allah (god’s predestination) [14]. However, behind the god’s predestination there is a natural phenomenon that can be digested. Including efforts to avoid it before a natural disaster occurs. In the event of a natural disaster there is a domain that is in the power of human beings and that is beyond human control [15]. All efforts that can minimize and even avoid the dangers and risks of natural disasters are in the domain of human power. Natural events that produce natural disasters cannot be prevented or eliminated. But all efforts to avoid interaction between
natural events that cause natural disasters with humans, this is included in the efforts of management and mitigation of natural disasters in fiqh disaster countermeasures [16].

Save our own self or others from danger is included in the category of endeavor (effort) that must be done. Umar bin Khattab was said to have avoided an area that was plagued by an epidemic. When asked whether such acts do not mean avoiding destiny because being infected is a destiny that if God has determined it, then humans will not be able to avoid it. Then Umar replied that he was avoiding a destiny to lead another destiny [17]. This story illustrates that fatalism in a natural disaster situation is an attitude that is not justified by Islam. God forbids believers to despair when natural disasters occur and requires to be positive thinking (husn al-dhann) for Allah’s help. In this case God said: *wa la tai ’asu min rauhillah innahu la ya’iasah min rauhillah ila qaumul kafirun* (no one despairs of relief from Allah except the disbelieving people) (Quran, 12:87).

In the same spirit even though in a different context, the Prophet Muhammad peace be upon him requires his people to fulfill their safety rights, for example the prohibition on fasting along time and states that the human body and eyes have the right to rest in order to stay healthy [18]. In a broader sense, this means the obligation to save human life.

Technically, efforts to manage natural disasters in Islam are not much different from the many methods that have been implemented today across the world. But the difference in view at the source of the creator of natural disasters, namely with the provision of God, resulted in a slight difference in the initial steps when a natural disaster occurred, as exemplified by the Messenger of Allah and the caliph afterwards, Umar bin Khattab [20].

Once there was an earthquake in Medina. The prophet then put his hands on the ground and said, “Calm down ... the time has not yet come for you”. Then, Muhammad turned to the companions and said, “God is rebuke us with this disaster” [21]. Apparently, Umar bin Khattab recalled the incident. When an earthquake occurred during the Caliphate, he said to the people of Medina, “O Man, what is this? How fast are you doing (from immorality to Allah)? Caliph Umar bin Abdul Aziz also did not remain silent when an earthquake occurred during his leadership. He immediately sent a letter to all the guardians of the country. He writes: “In fact this earthquake was a warning from Allah to His servants” [22].

The initial step taken when a natural disaster occurs is to repent while remembering what disobedience is done which caused God to send the disaster to human being [23]. It also serves as the guardian of the consciousness and spiritual condition of the community, especially those in natural disaster-prone areas to always maintain adherence to religious teachings within the scope of individuals and society, because natural disasters possible to come at any time and destroy everyone in the area.

5. **Fikh Anticipation as a Model of Mitigation in Islam**

*Fiqh* is Islamic jurisprudence. *Fiqh* is often described as the human understanding of the divine Islamic law as revealed in the Quran and the Sunnah (the teachings and practices of the Islamic prophet Muhammad) [24]. In *fiqh* there is a situation called emergency (*al-dharurah*). If this situation occurs (afflicts someone), then he is given permission to commit prohibited actions that are not normally done in normal circumstances [25]. Emergencies in general are always associated with saving lives. A frequent example, in a state of extreme hunger, which is thought to be life threatening, a person or group of people may eat *haram* food to avoid death.

The books *Qawa'id al-Fiqh al-Kulliyah* that I read, all of them stated that this great principle (*qaidah kulliah*) was accepted and practiced in all schools of thought in Islamic law (mazhab) [26]. The argument for that is some Qur’anic verses and the Prophetic traditions (*hadits*) that are understood inductively. One of them, which is relatively very popular is hadith “*la dharara wa la dhirara*” (there is no harm/ do not hurt yourself and others) [25]. Islamic scholars, when explaining this principle includes an important
requirement, that the prohibited acts in an effort to save themselves or others, should not be an act that would harm others, moreover to the level of endangering the lives of others [27].

An extreme example that is often used, in a ship accident (sinking at sea), passengers may fight over life jacket as long as they have not been controlled by someone. If the life jacket has been controlled by someone, then other people may no longer grab it, because the struggle is strongly suspected to threaten the life of the previous life jacket holder [24]. According to the ulamas (Islamic scholars), the lives of both people (holder and robber of life jacket) at the same level must be protected by fiqh [28]. Thus there is no right for the second person to take it from the first person. Thus, there is no right for the second person (robber) to take it from the first person (holder).

Although the ulamas agreed on the basic principle, they were still discussing about emergency category in fiqh [29]. The majority of Islamic scholars agreed that an emergency actually encompasses everything that threatens the five main things that must be protected (al-dharuriyyat al-khamsah), namely protection of religion, life, reason, descent (self-esteem), and property [30]. But in the descriptions, they seem to limit themselves only to saving lives. Most books do not give examples for the protection of religion, reason, descent (self-esteem) and property [31].

A condition called emergency if truly threatening life, for example being lost in the forest, falling into a cave, displaced on a rural island, severe famine season, suffering from illness (which is strongly suspected will cause death) and so on. This life-threatening situation must be truly real, already in sight, not just a possibility or a guess. If someone is afflicted with a disease that is difficult to heal, but not to the level of life threatening, then the situation is not considered an emergency. This situation is considered only to the level of need (hajiyyat) only [32].

The problem that now arises, what if the alleged disaster, loss of life or mental and physical disability that is expected to appear is not really real. For example, today's scientists have been able to estimate areas prone to earthquakes, even though they have not been able to estimate when exactly an earthquake will occur [33]. But they dare to ensure that at one time, in the future, there will be an earthquake that is very likely to be very powerful that will take a lot of casualties. The scholars agreed that the prediction of the impending disaster must be anticipated [34], for example by making houses that are earthquake resistant or not making houses in earthquake-prone areas.

Contemporary Islamic scholars, especially those who have been involved in statistics and other related sciences, will dare to state that future estimates based on honest and correct statistical calculations can be regarded as reality, because according to scientific calculations it is relatively certain to occur [35]. According to scientists the results of statistical calculations that meet the requirements, will be considered as sunnatullah, because almost never wrong [29].

If the results of the study of statistics can be accepted as a reality or even sunnatullah in predict something that has not happened in the future. Therefore Fiqh anticipation as one of the mitigation management in Islam can take the form in the following three steps [20]:

1. Reducing or avoiding the impact of losses from natural disaster hazards.
2. Ensure fast arrival of assistance to victims.
3. Achieve a quick and effective recovery of society.

Management of natural disasters aims to reduce or avoid potential losses from hazards caused by natural disasters, ensure prompt and appropriate assistance to victims of natural disasters, and carry out a fast and effective recovery process [36]. The natural disaster management cycle describes an ongoing process in which religious teachings and civil society plan to reduce the impact of natural disasters react when and after natural disasters, and take steps to recover after natural disasters occur [35]. Appropriate action at all stages in this cycle results in better preparedness, better awareness, and will reduce the level of vulnerability to natural disasters in the period the next repetition of this cycle [20]. A complete natural disaster management cycle includes aspects of public policy preparation and good planning in modifying...
the causes of natural disasters or reducing the impact of natural disasters on people, property and infrastructure [37].

Mitigation and preparedness phases are carried out to anticipate natural disasters. A sustainable development perspective plays a key role in contributing to community mitigation and preparation to effectively deal with natural disasters [17]. When natural disasters occur, those involved in natural disaster management are involved in the rapid response phase and long-term recovery [13]. The four management phases of natural disasters described here are not always carried out in a fixed order. Often the phase in this cycle overlaps and the duration of each stage depends largely on the severity of the natural disaster [38]:

1. Mitigation. Minimizing the impact of natural disasters. Example: building standards and zoning prone to natural disasters; vulnerability analysis; public education.
2. Preparedness. Planning to respond to natural disasters. Example: preparedness plan; emergency training; prediction and early warning system.
3. Response. Efforts to minimize the hazards created by natural disasters. Example: search and rescue; emergency assistance.
4. Recovery. Normalization of people’s lives. Example: temporary housing; grant; medical treatment

6. Conclusion
Islam should take a central role in efforts to avoid the impact of natural disasters or minimize them. Since before natural disasters, during the emergency response period, until the recovery period and life return to normal.

In essence, disaster is something that cannot be separated from life. This view provides direction that disasters must be managed thoroughly both before, during and after a disaster. Therefore, a special management is needed to handle it. At present, in the disaster management, there have been several patterns of shifting views, namely from being responsive to being preventive, from government affairs to community participation, from the responsibilities of several sectors to the responsibilities of various sectors, as well as from the pattern of dealing with impacts to reducing risk.

In the Qur’an chapter 3 verse 200 it is said that the person who believes to always be in a state of alert before a dangerous thing will happen, “O you who believe, be patient and strengthen your patience and stay prepared and fear Allah so that you are lucky”. Furthermore, in chapter 6 verse 131 God Says “That is because your Lord does not destroy cities with persecution, while the population is in a state of neglect”. The Qur’an advocates for a populated area and has a government to have standby planning which leads to readiness and ability to estimate, reduce impacts, deal effectively and recover from impacts, and if possible prevent disasters themselves.

Chapter 59 verse 18 is an important part of the Qur’an which emphasizes the concept of planning in all fields. Prominent scholars such as Imam Al-Ghazali interpret the verse as an order to humans to improve, increase faith, and devotion to god through a process of life that must not be the same as the previous life. Al-Ghazali also affirmed the word pay attention to where humans must pay attention to every act that has been done, and prepare themselves (plan) to always do the best for tomorrow (Al-Ghazali: 1999).

The concept of planning in chapter 59 verse 18 is the same subject as the guidelines for the preparation of contingency plans issued by the The National Agency for Disaster Countermeasure (BNPB) in 2011. There are five aspects that can be seen from the similarity of the planning concept, namely: First, planning must involves the process of determining the desired future state (impact analysis), second, the desired future situation compared to the present reality so that the gap can be seen (gap analysis). Third, to close the gap needs to be done an effort that can be done with various endeavors and alternatives (emergency scenario). Fourth, it is necessary to choose a good alternative, in this case includes effectiveness and efficiency (allocation of tasks and resources). Fifth, the alternatives that have been chosen should be
detailed to be able to provide guidance and guidelines in decision making and policy (synchronization and harmonization). The features of the mitigation concept in fiqh are not limited to prevention and alertness in dealing with natural disasters, but also offers a spiritual solution when the impact of the disaster concerns a community.

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