



Case study in disaster relief: A descriptive analysis of agency partnerships in the aftermath of the January 12th, 2010 Haitian earthquake

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ABSTRACT

This study analyzes the disaster response and recovery efforts following the January 12th, 2010 Haitian earthquake through the eyes of 18 different relief agencies. Focusing on the formation and maintenance of partnerships after the catastrophic earthquake, this paper explores the concepts of cooperation, mutual understanding, and connectivity among agencies responding to the earthquake. The case study is based on results from interviews and interactions with 18 agencies during a month-long trip to Haiti in the summer of 2010. Of the agencies interviewed, it was found that agencies that had no partnerships or presence in Haiti prior to the earthquake were most likely to build new clinics, orphanages, and schools. Additionally, we found that agencies were more likely to develop new partnerships from new contacts rather than dormant contacts. By studying the partnerships between local and international agencies, it was found that their relationships were less stable than partnerships between international agencies. This study hopes to increase understanding and applicability of research in disaster relief networks by providing a new perspective into how agencies work together.

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1. Introduction

On January 12th, 2010 at 4:53 PM, an earthquake measuring 7.0 on the Richter scale struck 13 miles west of the Haitian capital of Port-au-Prince. There were reports of up to 59 aftershocks, each registering greater than 4.5 on the Richter scale, in the 11 days following the earthquake [1]. Official estimates of the death toll range from 200,000 to more than 250,000 people, making the January 12th earthquake the 5th most deadly earthquake in recorded history [1–3]. Estimates by the Inter-American Development Bank put the cost of the damage to the region somewhere between \$8.1 and \$13.9 billion dollars using data from previous disasters to guide their estimates [4]. Different sources of aid, personnel, and funding have poured into the region from around the world in an international effort to respond to the earthquake and give the Haitian people hope for a brighter future.

The size and scope of the disaster in Haiti has attracted much attention from governments and agencies around the world. While there is a great deal of good that can come from individual agency efforts, the importance of coordination between different agencies has been shown to increase agency efficiency [5]. Agencies responding to the earthquake could maximize operational efficiency

by working together to reduce duplicated services and maximize utilization of available resources. Using interviews from a cross-section of agencies responding to the disaster in Haiti, this research aims to identify trends in partnership development and utilization during the Haitian recovery. This paper addresses the following four areas in the context of optimal resource allocation: 1) key dynamics affecting partnership efficiency and logistics 2) trends in partnership development and utilization 3) changes in agencies' level of involvement before and after the earthquake, and 4) common metrics that could be used for agency efficiency assessment.

This paper is organized into 6 sections. Section 2 provides a discussion of relevant literature and provides an analytic framework for this research. Section 3 provides details about the approach for the study conducted in Haiti, while Section 4 provides results of 18 interviews conducted with agencies responding to the earthquake in Haiti acquired during a four-week trip to Haiti. Some case-specific results that provide insight into the dynamics of this particular study are reviewed in Section 5. Finally, Section 6 reviews the key conclusions from the study, as well as enumerating some research topics for further analysis.

2. Literature review

In this section we discuss some relevant literature. Through a discussion of some of the modern literature on disaster relief, we

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provide evidence that this study adds context and greater understanding to knowledge about disaster relief operations by refocusing on the agencies that respond. In this review we explore literature on partnerships between organizations from beginning to end. We also provide new context for the discussion by examining the impact that disasters and relief work can have on such partnerships.

2.1. Interagency cooperation

Interagency cooperation among different responding entities is a critical component of effective response operations. This has been identified as a significant factor in disaster response operations following recent disasters such as hurricane Katrina and the Indian Ocean tsunami [5,6]. Interagency cooperation has also been discussed in work on improving the work of the US military in Afghanistan and Iraq as part of a holistic exit strategy [7]. Despite this factor having been identified in previous research, it has not been well defined or expanded on sufficiently, and a more complete understanding of the dynamics within effective partnerships remains under development. Kapucu's work [8] following the September 11th, 2001 (9/11) attacks in the United States provides significant insight into the functionality of inter-agency partnerships. Additionally, it also identifies a lack of prior communication and a lack of trust as two of the most common reasons for communication challenges. Effective inter-agency cooperation is especially important when there is a severe lack of governmental oversight and regional management [9].

2.2. Common understanding in partnerships

In order for agencies to effectively coordinate their activities, there needs to be a common language and understanding of operational approach, resource allocation, and of an agency timeline. Bryson, Crosby, and Stone [10] state that since conflict will likely occur at some point or another in a partnership, these collaborative efforts are more likely to succeed if mechanisms are put in place early to "equalize power" in the relationship. Wishart [11] noted that agency representatives saw the best partnerships come out of relationships where those involved treated all others as equal rather than subordinate. Mitchell reported that the need for active partnerships has become widely recognized and accepted in the emergency response community [12]. He argued that "Partnerships that are solely marriages of interests are easily sundered by events; those based on something more substantial – like expansive, compelling ideas – are likely to prove more durable [12]." However, the dynamics that help control these partnerships effectiveness has not been previously documented following a major disaster recovery operation. This work aims to provide an extensive case study to explore some the potential trends in how agencies perceive each other during a disaster relief operation.

2.3. Emergent agencies

Studies of other major disasters, such as hurricanes Katrina and Rita, in addition to the 9/11 attacks, provide insight into the dynamics of inter-agency relationships during the response and recovery phases. New agencies are often formed in the wake of a large-scale disaster [9,13], and must be considered by public officials [14] in the development of any holistic response model. Though these agencies have the potential to add more resources or a new perspective in the wake of a disaster, they also vary greatly in terms of reliability and efficiency. They often develop in order to meet some need, which the leaders believe to be unmet [13,14] and are often received with skepticism in the field by older, more

experienced agencies. Mhatre, Wenger, and Prater [15] observed that though emergent agencies are an integral part of the immediate work following a disaster (the response phase), they can just as quickly collapse, failing to survive as a useful part of the long-term recovery. In this study we explore the concept of emergence and expansion of these new agencies to see how they contribute and what kind of partnerships they tend to form.

3. Research objective and approach

The research approach and framework was derived from first-hand information about emergency management practices. Immediately after the earthquake occurred in Haiti, the research team began exploring possible avenues to enter the country to collect data from agencies responding to the disaster. The research team developed a survey and an interview script in partnership with agencies actively involved in the field of emergency management. To collect accurate data on circumstances in Haiti, and develop rapport with responding agencies, a member of the research team went to Haiti. Meeting agency representatives in person and conducting interviews in the field helped to increase research credibility, diversify the types of data shared, and increase the volume of information collected.

3.1. Terminology defined

In order to provide the reader with a consistent lexicon for this paper, this section explicitly defines some of the key words used in our discussion.

- **Agency:** An organization that provides some service or product. In this paper, we use the term generally to reference profit, non-profit, governmental, military, or volunteer organizations.
- **Benefit:** A specific functionality, resource, or methodology available through a partnership. This benefit may be achieved through a single partnership, multiple partnerships, or internally with varying degrees of efficiency.
- **Contact:** Defined in this paper as a loose relationship between agencies or personnel in agencies where no sharing of resources is taking place, nor is any information shared regarding operations, on a regular basis.
- **Cooperation:** Interaction between agencies that does not require sharing of any resources, but provides for increased efficacy in both operations primarily through communication and potentially sharing other information.
- **Disaster Recovery:** The long-term process of removing debris, rebuilding, and returning to "normalcy."
- **Disaster Response:** The initial pouring of supplies and relief and remediating of any remaining hazards from the initial disaster.
- **FBO:** Faith Based Organization. Generally considered a type of NGO with a special focus on a particular religion or belief structure. Churches and other agencies that are established with a specific location-centric focus are not considered International FBOs.
- **NGO:** Non-Governmental Organization. Such agencies are non-profit in the United States and are separate from a for-profit corporation. For this paper we use NGO to mean Non-Governmental Organizations from other countries.
- **Partnered Agency:** An agency that has partnerships in Haiti and provides a service, aid, personnel, or other services to an agency currently active and present in Haiti.
- **Partnership:** A partnership is a relationship that provides information, service, money, or other resources to two or more agencies involved in the partnership.

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