Review of information needs after natural disaster – Key findings

Introduction

Following a sudden onset disaster there is typically limited comprehensive information on what the impact of the disaster has been, including the scale and severity. At the same time the humanitarian community and donors are making key decisions on how to respond. Current practice suggests that these decisions are made based on assumptions formed through prior experience and lesson learned from similar past disasters that have taken place and have been responded to. In addition, there have been few studies[1] that have investigated the information needs of emergency decision makers in the first 72 hours post disaster. This is a critical period of time when organizations are, independently of each other, gathering information to analyse the scale, geographical spread and impact of the disaster and provide initial information on their response intentions to the wider humanitarian community. These response intentions are in the form of Flash Appeals, RC/RC Movement appeals and NGO initial proposals or applications.

To better understand the information needs of emergency decision makers in the immediate aftermath of a disaster, ACAPS has collected and analysed information needs from different organizations to improve information about needs being made available to emergency decision makers within the first days of a crisis.

Methodology

Semi-structured interviews with eleven agency emergency response decision makers by phone or face to face were undertaken. Staff from the United Nations, Red Cross and Red Crescent Movement and NGOs were interviewed between November and December 2010. These interviews included both sector specialists and generalist staff, located at field, regional and HQ levels. See Annex I for list of respondents and Annex II for the questionnaire. The scenario proposed for discussion was a sudden onset natural disaster.

The most important limitation of the survey is related to the sample size (11 respondents) and the location of the persons interviewed (8 of the respondents were HQ staff while only 3 were field or regionally based staff).

Key findings

Annex III provides a summary table with answers given by the interviewees. The following paragraphs provide a summary of the answers given per question and respondent answers categorized under three headings:

i.) information needs of decision makers
ii.) process of data collection
iii.) factors affecting the decision to intervene.

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[1] See "What influences decisions for deployment of international health relief following sudden onset disasters?", J Von Schreeb, nne N. Kubai, 2010

i. Information needs of decision makers

Respondents were asked what decisions they make during the first seventy two hours of a crisis. The answers of the respondents can be categorized into two types of decisions: **strategic decisions** and **operational decisions**. Examples of strategic decisions taken by emergency response decision makers include the identification of target population for assessment or intervention, priority areas for assessment and intervention and whether to intervene or not[2] based on an estimation of the scale and scope of an emergency. Operational decisions concern the type of operation and the resources needed for the operation, including budget, staff, skills and equipment.

Respondents indicated that information is needed to inform the decision making process of their respective organizations. Respondents noted different types of information they required. These were then categorized into information that can be collected prior to a disaster, i.e. pre-disaster information and specific information that relates to the disaster event and its impact, i.e. disaster specific information.

a)   Pre-disaster information:

Regarding pre-disaster information, **baseline data** (including demographic data) is noted by almost all decision makers as important. On a global level, **country background information**, e.g. area specific information, cultural habits, **information on risks**, such as a hazard profile, epidemiological profile and **in-country capacities**, including contingency plans are gathered.
On a regional and field level, **pre-existing vulnerabilities (and/or vulnerable groups)** and **previous disaster trends** play an important role. In addition, **risks**, **country background information**, (including coping mechanisms), and information on **in-country capacities** is needed.

b)   Disaster specific information

Disaster specific information describes the impact of the hazard/shock on the population. The answers of decision makers at headquarters and field level were similar. There is information needed on six main topics:
   1. Typology of crisis
   2. Impact (number of people affected, sectors impacted and people in need of immediate assistance, etc.)
   3. Response capacities (including OCHA 3W)
   4. Needs and gap analysis, per sector
   5. Operational constraints (communication, access, security, etc.)
   6. Donor mobilisation (funds allocation, positioning, etc.).

c)   Information gaps and needs

All decision makers in headquarters recognized the lack of sufficient and accurate information at the aftermath of a disaster and stated that they need **faster access to information**. They predominantly rely on pre disaster information and the limited amount of post disaster information available to take decisions within the first 72 hours after a disaster. However, this information is only useful if it is well classified and reliable. In addition, both global and regional/field decision makers need **more accurate information**. Some respondents noted that this information needs to be detailed and methods of obtaining the information must be clearly stated. Information on the **reliability** of the data or information being provided would be also appreciated.

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[2] Many respondents noted that often the decision to intervene or not also involved country level internal and external political processes.

All respondents indicate that they need **more analysis of new field data**. Similarly, all respondents answered that **better access to pre-disaster information** is required, suggesting that baseline and pre-disaster information is neither sufficiently collected nor fully utilized in humanitarian crises.

Table 1. Information needs
N.B. Total Number of responders=11 of which 3 are from Regional/Field offices

	Not much		Some		A lot	
	Global	Reg/Field	Global	Reg/Field	Global	Reg/Field
Quicker info		1/3	5/8	1/3	3/8	1/3
More accurate info			5/8	2/3	3/8	1/3
More analysis of new field data			2/8		6/8	3/3
Better access to pre-disaster info			1/8		7/8	3/3

ii. Process of data collection

The majority of respondents stated that information is not sufficiently pre-gathered prior to crises and disasters. However, a few respondents indicated that internal processes to pre-gather information are under development within their respective organizations.

Respondents both at headquarters and at field level use information produced by other **NGOs and UN organisations** as an information resource. **In-country sources** such as in country partners, key informants and relevant ministries are also mentioned as an information source. Decision makers in headquarters, while relying less on in country sources, included **news reports** and web resources such as 'Reliefweb' as key information sources. Several Headquarters respondents stated that **satellite images** and **donor information** is also an important source. A few decision makers on a global level use **internal monitoring and information systems** as a source.

The large majority of the interviewed use both **'personal' sources** as well as **external sources** to access information. 'Personal' sources include contact with personal and professional colleagues through e-mail and telephone to access information sources that may not be publicly accessible. External sources are often accessed by browsing the internet.

While collection of information takes place at both field and HQ level, the respondents state that analysis of the information is primarily done at HQ level (lack of time at in country level). The majority of the individuals interviewed use triangulation as a method to verify data from different sources. Only one respondent stated that no crosschecking takes place. The use of experience to estimate the credibility of the information was mentioned once as a technique to evaluate reliability and credibility of the information.

iii. Factors affecting the decision to intervene

Respondents indicated that the decision to intervene depends on several factors. On a global level, **added value, capacity, risks exposure** and the **scale of the crisis** are often mentioned as factors that influence the decision to intervene. In addition, factors such as **strategic interests** and **request of local partners** are mentioned. On a regional and field level, **the scale of the crisis, existing capacities and risks** are the key factors influencing the decision to intervene.

The majority of respondents in headquarters state that their organization does not yet have a decision making tool that is used to support decisions. Two out of three respondents from the field indicated that their organizations had a tool available; these included early warning systems and Virtual OSOCC.

The majority of those interviewed indicated that in-country presence plays a critical role in the decision to intervene or not. Accessibility to information is greater when field offices can relay the information to their HQ, and this provides increased credibility and confidence in the information being received. The presence of field offices also denotes a level of existing in-country capacity a key factor in deciding whether to intervene or not.

The timeframe for collecting and analysing the information needed to make decisions differs from one organization to another and can vary according to the type of disaster considered (slow onset vs sudden onset). On a regional and field level, the decisions need to be taken faster, in the majority of the cases **within 48 hours**. Globally, and if there is no presence on the ground, the respondents claim that the timeframe ranges from **6 hours to 7 days.**

Conclusion and next steps

Key informants interviews suggest crucial differences between HQ, regional and field level practices, regarding:

- The type of decision being informed (strategic vs operational decisions)
- The sources of information used (field relies more on personal contact and key informants in contrast to the HQ which uses more internet and official resources)
- The analytical capacity (field emergency responder's are rapidly shifting into operational mode and have limited capacity to follow and analyse the big picture, as well as to report about it)The distribution of roles and responsibilities regarding data collection, analysis and reporting as well as the decision making timeline, depending on the organization presence on the field prior to the disaster.

A second survey targeted at key emergency decision makers at the three levels (field, regional and HQ) is recommended to deepen understanding of the following issues:

- Differentiation between operational and strategic decisions and the various sets of information that may be necessary to inform them. Details per sector is required (interview of sector specialists) as well as per type of decision maker (Donor field/HQ, emergency responders field/HQ etc.)
- Decision making timeline for ONG with and without presence on the ground for sudden and slow on set disasters.
- Situation analysis capacity and practices at the different levels for sudden and slow onset disaster.

ANNEX I: List of respondents

Regional/field level:
- Regional emergency coordinator (OXFAM)
- Cluster lead Congo (WASH)
- Chief of Section Africa, Coordination and Response Division OCHA (Previously Head of Office OCHA Sri Lanka)

Global level
- Emergency desk (French Red Cross)
- Global WASH cluster (UNICEF)
- Two directors of operations (Solidarités)
- Emergency desk (Former Solidarités)
- Deputy Humanitarian Director (OXFAM GB)
- Global Nutrition Cluster Coordinator (UNICEF)
- Disaster Response and Recovery Officers (IFRC)

ANNEX II: Questionnaire

Draft Semi-Structured Questionnaire for Agency Interviews

Name of Interviewee_____　　　　　　　**Name of Organization_____**

Job Title_____

Name of Interviewer_____　　　　　　　**Date_____**

Base/Location _____

1.What decisions do you have to make in the first 72 hours post a disaster?
Please provide a timeline for when you have to make these decisions.

Are you the final decision maker or are others involved in deciding on whether to respond and how? If others are involved, who are they? What are their positions and bases/locations in the organization.

If others are involved in the final decision whether to respond or not, what is the usual timeframe by which they have a final decision?

2. What information (e.g. health Indicators, poverty indicators etc.) do you use to make/support these decisions?

3. What sources of information (e.g. DHS, UNDP website, agencies on the ground etc.) do you use to make these decisions?

What are your normal methods of obtaining this information, (e.g. internet, call to other agencies, know contacts or cold calling, etc.) ?

4. What other or better information do you want in the first 72 hours after a disaster?

5. What do you need more?

	Not much	some	A lot	Comments
Quicker Info				
More Accurate Info				
More Analysis of new field data				
Better Access to pre-disaster information				

6. How do you get this information:

Who collects it?
Who analyse it?
Is background info already compiled/or is compiled on case by case basis

7. How do you verify/cross check this information?

8. Do you have any clear intervention criteria in your organization that help you decide whether or not to intervene? What are these?

9. Do you use any decision making tools to enable systematic/ consistent decisions to be made?
N.B. remember to request a copy.

10. Are they any differences if you are in country compared to looking at a new country?

11. Any difference in processes if an emergency occurs over a weekend or holiday?

12. Beyond the 72 hour time frame can you describe the time-line your organizations follows for doing assessments, i.e. when you do multi-sector assessments and sector specific assessments.

ANNEX III: Summary table of answers

GLOBAL	Answers	REGIONAL/FIELD	Answers
Type of decision			
Strategic decisions			
Intervention decision	8/8	Intervention decision	2/3
Emergency classification (scale, impact, type)	5/8	Emergency classification	1/3
Operational decisions			
Resources needed (including budget, staff equipment)	6/8	Type of intervention	3/3
Type of required response	4/8	Resources needed	2/3
Appeal for funding	4/8		
Intervention sectors	1/8		
Which mandate	1/8		
Information needed			
Pre-disaster information			
Baseline data	8/8	Pre-existing vulnerabilities	2/3
Population figures/demographic data	6/8	Baseline data	2/3
In-country capacity	2/8	Previous disaster trends	2/3
Cultural habits	2/8	Contingency plans	2/3
Aggravating factors	1/8	Risks	1/3
Area specific information	3/8	Political situation/cultural background	1/3
Risk-profile	2/8	Cultural habits	1/3
Contingency plan	1/8	Coping mechanisms	1/3
Disaster specific information			
OCHA 3W	8/8	Impact (humanitarian caseload)	3/3
Humanitarian caseload (Number of people affected/injured/death)	7/8	Response capacities	3/3
Affected sectors and sector specific impact	7/8	Operational constraints (Access, communication, infrastructure etc)	3/3
Maps/photos (population figures/geographical location of needs etc)	6/8	Sector specific impact	2/3
Operational constraints	7/8	Response options	1/3
Affected regions (urban/rural)	5/8	Donor mobilisation	1/3
Type of crisis	3/8	Type of crisis (duration)	1/3
Donor mobilisation	3/8	Maps of affected area	1/3
Gap analysis	2/8	Patterns of displacement	1/3
Immediate, medium and longer term needs	2/8		
Stakeholders	1/8		
Priority areas	1/8		
Displacement patterns	1/8		
Decision timeframe			
Between 3/5 days	1/8	48 hours	2/3
Between 15 hours – 3 days	1/8	Varies	1/3

Between 6-24 hours	2/8		
Between 3/7 days	1/8		
Varies	3/8		
Sources			
News reports (including Reliefweb)	8/8	Relevant ministries	3/3
NGOs + clusters (surveys/sitreps)	8/8	Other NGO's. OCHA and clusters	3/3
In-country sources (government, partners)	5/8	Key informants	1/3
Monitoring/information systems within own organisation	2/8	Regional/national focal point	1/3
Satellite Images	2/8		
Donors	2/8		
Pre-disaster baseline data	2/8		
Who accesses the information			
HQ	6/8	Field/regional level	3/3
Field	2/8		
Analysis is done at:			
HQ level	7/8	HQ level	
Field level	1/8	Field/regional level	1/1
What are the ways to get the information			
Internal sources + own network	8/8	Internal sources + own network	2/2
External sources through internet (sitreps, media reports etc)	6/8	External sources through internet (sitreps, media reports etc)	
Information pre-gathered?			
No	4/8	No	2/3
Is under development	2/8	Is under development	1/3
Depends on in-country presences	2/8		
How is information crosschecked?			
Triangulation	6/8	Triangulation	2/2
No crosscheck	1/8		
Use of experience	1/8		
Intervention criteria			
Added value	4/8	HAP threshold	1/3
Capacity	4/8	Crisis scale	1/3
Security and risk exposure	2/8	Risk based	2/3
Crisis scale	2/8	Capacities	1/3
Strategic interest	1/8		
Long term intervention possible	1/8		
Unknown	1/8		
Post urgency positioning	1/8		
Request local partners	1/8		
Decision making tool			
No	5/8	Yes	2/3
Pre-qualified document	2/8	Examples but no templates	1/3
Intervention grid	1/8		
Difference presence or not in country			
Yes	6/8	Yes	3/3

No	1/8		
Not applicable	1/8		
Difference if holidays			
Yes	4/8	Yes	3/3
No	4/8		