United Nations Institute for Training and Research

Unitar Online Catalogue

Rapid Response Mapping in Disaster Situations

Type:	Course
Location:	Geneva, Switzerland
Date:	4 Jun 2012 to 6 Jun 2012
Duration:	3 Days
Thematic Area:	Satellite Imagery and Analysis
Website:	http://www.unitar.org/unosat
Price:	$0.00
Event Focal Point Email:	unosat@unitar.org
Partnership:	University of Geneva

BACKGROUND

"When disasters strike, the first thing the international early response community needs is information: What has happened, where did it happen, what is the effect, what response is needed? Not only can satellite imagery taken immediately after an event like an earthquake or tropical cyclone show what has happened through images of destroyed infrastructure or flood surge, but with their inherent geo-coding, one can tell immediately where the event took place and the apparent magnitude and impact of the disaster. This is key information for an efficient planning and coordination of emergency response operations as well as to perform a GIS based preliminary impact and damage assessment".

EVENT OBJECTIVES

The aim of the course is to provide training participants with concepts and GIS methodologies to perform satellite based rapid response analysis including the understanding of the benefits and limitations of using geo-spatial information technology in the immediate aftermath of a disaster.

LEARNING OBJECTIVES

AT THE END OF THE COURSE STUDENTS SHOULD BE ABLE TO:

· Explain the role of Geo-information in the response phase of a disaster.

· Gain awareness of GIS methodologies related to the rapid mapping processing chain to support emergency response.

· Identify, access, search, collect, organize and analyses geospatial data for emergency response mapping.

· Apply basic GIS methodologies to perform impact analysis and preliminary damage assessment in the immediate aftermath of a disaster.

CONTENT AND STRUCTURE

The course consists of the following modules:

Introduction to UNOSAT and to the training programme (Presentation)

The use of satellite imagery for disaster relief and recovery (Presentation)

Searching, exploring, gathering, and integrating geospatial data for emergency response mapping (Presentation and practical exercises)

Impact analysis and preliminary damage assessment (Presentation and practical exercises)

Building damage assessment (Presentation and practical exercises)

Open Discussion

METHODOLOGY

This is a face to face course. Full time lectures and GIS lab exercises using real case disaster scenarios from past events (80% Lab Exercise, 20% lectures and discussions).

TARGETED AUDIENCE

Professionals working in governmental organizations who wish to strengthen their GIS skills in emergency response mapping. It is recommended that participants taking the course have a working knowledge of English including basic experience in GIS and Remote Sensing applications.