

**CE-409      HAZARD AND DISASTER MANAGEMENT      2(2+0)**

**Theory Cr Hrs, 2**

**Lab Cr Hrs, 0**

**Objectives**

- To familiarize students with the basic concepts of natural and human induced hazards
- To enable students to learn the techniques for pre and post-disaster management.

**Course Contents**

Introduction to Hazards and Disasters (earthquakes, floods, droughts, landslides, cyclones, etc.), Social & Economic Aspects of Natural and human induced hazards, Hazard and Disaster Investigation, Disaster Management, Pre-Disaster Phase (Prevention, Mitigation & Preparedness), Disaster Phase (Response, relief and recovery), Post-Disaster Phase (Rehabilitation, Development), Damage assessment, Disaster management policies and institutional infrastructure from national to local level Monitoring of Infra-structure facilities; strategies for protection against possible damages; maintenance for different infrastructure facilities. Rehabilitation and repair strategies, Predictions and preparedness strategies for natural disasters such as Earthquakes etc; Emergency management; Awareness Programs; Follow-on Disasters; Recovery plans; Strategies for protection, Risk and Vulnerability Analysis; Disaster Mitigation

**Recommended Books:**

1. Thomas D. Schneid, Disaster Management and preparedness, CRC Press; 1st Edition (2000)
2. David Alexander, Principles of Emergency planning and Management, Published in the United State of America by Oxford University Press Inc. (1998)
3. Timothy Beatley, Philip Berke, David J. Brower (1999) Natural Hazard Mitigation: Recasting Disaster Policy and Planning Island Press.
4. Charlotte Benson, Edward J. Clay (2004) Understanding the Economic and Financial Impacts of Natural Disasters World Bank Publications.
5. Mr. Aloysius J. Rego Director of Knowledge Sharing and partnerships and Co-Team Leader of Disaster management System team Asian Disaster preparedness Center (ADPC) 2003.