Turning Disaster into Knowledge

Jonathan D. Bray, Ph.D., P.E., NAE
Faculty Chair in Earthquake Engineering Excellence
University of California, Berkeley

Advancing hazard-resistant design demands an understanding of what happens when a disaster occurs. Documenting and sharing the key lessons learned from extreme events around the world contributes significantly to advancing research and practice in hazards engineering. The detailed mapping and surveying of damaged areas provides the data for well-documented case histories that drive the development of many of the design procedures used by geotechnical engineers.

Many design methods are based on insights gleaned from observations from past events. Field observations are particularly important in the discipline of geotechnical engineering, because it is difficult to replicate in the laboratory soil deposits built by nature over thousands of years. Much of the data generated by an extreme event is perishable and therefore must be collected within a few days of the occurrence of the event. Thus, engineers should be ready to investigate the next important extreme event.

Jonathan Bray is the Faculty Chair in Earthquake Engineering Excellence at the University of California, Berkeley. Dr. Bray is a registered professional civil engineer and has served as a consultant on important projects and peer review panels. He has authored more than 300 research publications on topics that include liquefaction, ground motions, slope stability, surface fault rupture, and post-event reconnaissance. Dr. Bray is a member of the US National Academy of Engineering and has received several honors, including the Peck Award, Joyner Lecture, and Huber Research Prize.

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Massachusetts Room, Mullins Center

Doors open at 4, Lecture starts at 4:15
Light reception to follow

Presented by the
Civil & Environmental Engineering Department
Free and open to the public
Parking available in the Campus Center Garage