FOCUSING THE LESSONS OF DISASTER THROUGH THE LENS OF RESILIENCE A Case for More Case Studies

> CDR Russ Bowman, JD, USCG Northeastern University Center for Resilience Studies

Disaster as Opportunity

• "Policy Windows" (Kingdon 2011)

• "Focusing Events" (Birkland 2006, 1997)



Photo from: National Commission on BP Deepwater Horizon Oil Spill and Offshore Drilling Report, available at: http://www.oilspillcommission.gov/final-report

A Promising Premise

Wider use of multi-case research methodologies that utilize a common, broadened conceptualization of resilience will produce materials better suited for leveraging the windows of opportunity (for meaningful policy reform) that disasters present.

The Study of Disasters

Then (1917)

Now









The Proliferation of Centers

- Center for Disaster Management & Humanitarian Assistance
- Center for Disaster Research and Education
- Center for Earthquake Research and Information
- Center for Emergency Education and Disaster Research
- Center for Hazards and Risk Research
- Center for Hazards Assessment Response and Technology
- Center for Hazards Research and Policy Development
- Center for Natural Hazards and Disaster Research
- Center for Natural Hazards Research
- Center for Public Health and Disasters
- Center for Resilience Studies
- Center for Risk Management of Engineering Systems
- Center for Urban and Regional Studies
- Disaster Management Center
- Disaster Mental Health Institute
- Disaster Research Center
- Emergency Administration and Planning (formerly the Center for Public Service)
- George Perkins Marsh Institute
- Hazards and Vulnerability Research Institute
- Institute for Crisis, Disaster, and Risk Management

- International Hurricane Research Center
- James and Marilyn Lovell Center for Environmental Geography and Hazards Research
- John A. Blume Earthquake Engineering Center
- MAE Center
- MCEER (Multidisciplinary Center for Earthquake Engineering Research)
- National Center for Atmospheric Research Societal Impacts Program
- National Drought Mitigation Center
- National Wind Institute
- Natural Hazards Center
- Pacific Earthquake Engineering Research Center
- Program for the Study of Developed Shorelines
- Southern California Earthquake Center (SCEC)
- The Arkansas Center for Earthquake Education and Technology Transfer
- The Center for Catastrophe Preparedness & Response
- The Florida Catastrophic Storm Risk Management Center
- Wharton Risk Management and Decision Processes Center

Resilience – A Broad Concept

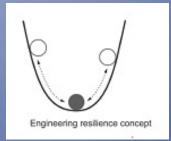
Ecology (C.S. Holling 1973)

Ecological resilience concept

Absorb, change, persist

- adaptive capacity
- "bounce back"
- maintaining existence
- alternative equilibria

Engineering / Economics



Resist, absorb, return

- "hardening" or"robustness"
- maintaining or quickly returning to original function

Ball-in-cup diagrams: Gordon, 2014. "Reflections on 'resilience' one year on." Royal Society http://blogs.royalsociety.org/in-verba/2014/05/08/reflections-on-resilience-one-year-on/

Resilience – A Broadened Definition

The ability to

- <u>prepare fo</u>r and
- *adapt to* changing conditions
- and the ability to
 - <u>withstand</u> and
 - <u>recover rapidly from</u> disruptions ("all hazards").



President Policy Directive (PPD) 21

"Critical Infrastructure Security and Resilience," February 12, 2013

AP

Focusing the Lessons of Disaster

Widespread use of this expansive definition of *resilience* will help to get scholars, professionals, and policymakers studying and thinking about how previously stove-piped disaster research findings implicate, and are interconnected with, all phases and aspects of disasters, and the various disciplines and literatures related thereto.

Using Existing Case Data

Secondary Analysis of Prior Studies & AARs – Overcomes typical disaster research hurdles

- Timing
- Access

• Generalizability (i.e., external validity)

- Effective methodology in disaster context (Moynihan 2008) (Faith, Jackson, and Willis 2011)
- History of breaking new ground this way (Barton 1969)



Mission: To play a leadership role in building societal resilience by learning from disasters and teaching and advancing the lessons learned.

Works Cited

- Birkland, Thomas A. 1997. *After Disaster : Agenda Setting, Public Policy, and Focusing Events*. Washington, DC: Georgetown University Press.
 - —. 2006. *Lessons of Disaster: Policy Change After Catastrophic Events*. Georgetown University Press.
- Faith, Kay Sullivan, Brian K. Jackson, and Henry Willis. 2011. "Text Analysis of After Action Reports to Support Improved Emergency Response Planning." *Journal of Homeland Security and Emergency Management* 8 (1).
- Holling, C. S. 1973. "Resilience and Stability of Ecological Systems." *Annual Review of Ecology and Systematics* 4: 1–23.
 - __. 1996. "Engineer Resilience Versus Ecological Resilience." In Engineering Within Ecological Constraints, edited by Peter Schulze, 31–43. National Academies Press.
- Kingdon, John W. 2011. Agendas, Alternatives, and Public Policies. Second. Boston: Longman.
- Moynihan, Donald P. 2008. "Combining Structural Forms in the Search for Policy Tools: Incident Command Systems in U.S. Crisis Management." *Governance* 21 (2).