
MMM SEMINAR RAL

CASA (Collaborative Adaptive Sensing of the Atmosphere) Analyses on Human Behavioral Response to Tornadoes

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In 2008 researchers from University of Delaware's Disaster Research Center (DRC) began conducting quantitative interviews as part of the National Science Foundation (NSF)-funded Engineering Research Center for Collaborative Adaptive Sensing of the Atmosphere (CASA) project. The survey was administered as a telephone interview using a computer assisted telephone interviewing (CATI) system in operation at the DRC. The instrument was designed to better understand public response to tornado and severe storm warnings by bringing together knowledge from social science insights on weather warnings. This seminar will present findings and implications from the analyses that have come out this dataset including geographic specificity of warnings, understanding of false alarms, and understanding of weather alerts. The first of these explored the impact of storm based warnings on public response. While a significant relationship was not found between being inside the warning polygon and taking protective action, proximity to the tornado was shown to be an important factor. The next study examined perception of false alarm as a concept and false alarm rates. Surprisingly, the majority of the respondents perceived false alarm frequency as quite low. On the other hand, actual false alarm rates in their area did impact protective action. The final study looked at respondent understanding of tornado watches and warnings. It was common for people to confuse the terms and misunderstand the required action for each.

A second survey was conducted in 2012 using similar methods, but sampling only the Dallas Fort Worth area. The seminar will also briefly discuss some ongoing, preliminary analyses utilizing this dataset including emotions and risk perception and use of warning channels. The former study explores emotions associated with tornado risks, while the latter examines favored warning messages channels.

In addition, this seminar will address some preliminary observations during a quick response field trip to Moore, Oklahoma following the 2013 tornado event. Around 30 interviews were conducted with survivors of the tornado. These interviews focused on respondents overall experience during the event, receipt of weather alerts, and level of tornado preparedness. Some characteristics of a disaster subculture were noted throughout the interviews. For instance, complacency and specific beliefs toward tornadoes were exhibited by many. Additionally, unique sheltering practices emerged such as driving out of the path of the storm.

*This seminar will be recorded and available via webcast at:
<http://www.fin.ucar.edu/it/mms/fl-live.htm>*

Thursday, 21 November 2013, 3:30PM

Refreshments 3:15 PM

NCAR-Foothills Laboratory

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