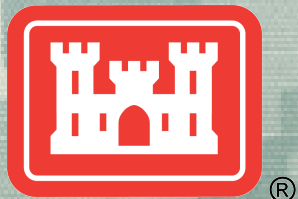


# Probabilistic Flood Hazard Assessment

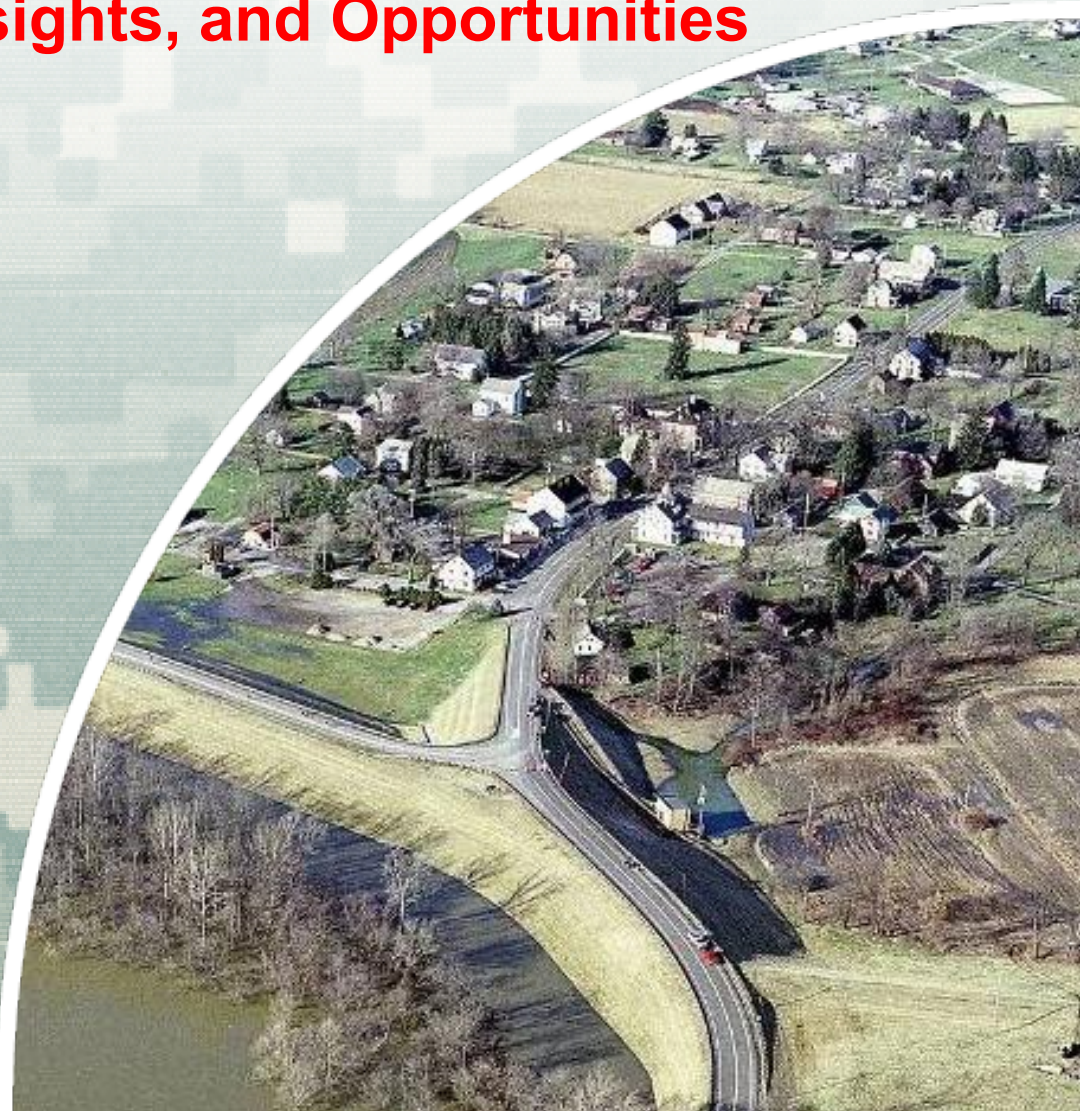
## Panel 8 – Observations, Insights, and Opportunities

Rockville, MD

31 January 2013



US Army Corps of Engineers  
**BUILDING STRONG**®



# Panel 8

- Respect the past while looking forward toward the future
- Hang ups to address – Some are not technical
- Don't miss or double count the important uncertainties even if they cannot be quantified



# Panel 8

- Large contribution from combinations of less than extreme events
- Scalable and flexible methods – Challenge the existing guidance and methods
- In hindsight we often realize what we could have known



# Risk Informed is a Process, Not A Calculation

- Gather
  - ▶ Evidence using multiple sources and methods
- Apply
  - ▶ Art, science, critical thinking, judgment
- Improve
  - ▶ Knowledge, understanding
- Inform
  - ▶ Credible decisions
- Communicate



# Truth

- In our quest for the truth, we are very good at making many assumptions that allow us to precisely calculate things that are very uncertain
- In theory there is no difference between theory and practice. In practice there is. (Berra)



# Paradigm Shift

Follow the Guideline  Imagine

Meet the Standard  Make the Case

Estimate Things  
Right  Estimate The Right  
Things

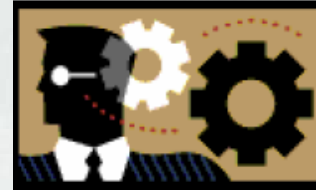




# Data + Imagination



Frequentist



Bayesian

