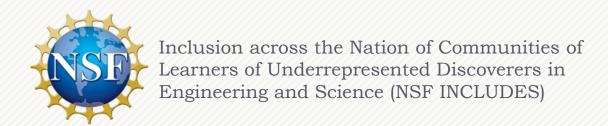
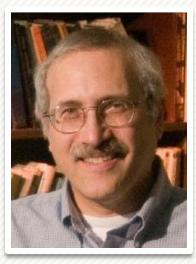
# Engaging Diverse Populations in Evaluation

Multi-Scale Evaluation in STEM Education





### \* MEET YOUR MODERATOR



Louis J. Gross, PhD

**Founding Director**, NIMBioS

Professor of Ecology and Evolutionary Biology and Mathematics, University of Tennessee, Knoxville



### WHO IS THIS PRESENTATION FOR?



Principal
Investigators
of NSF INCLUDES Pilot
Projects



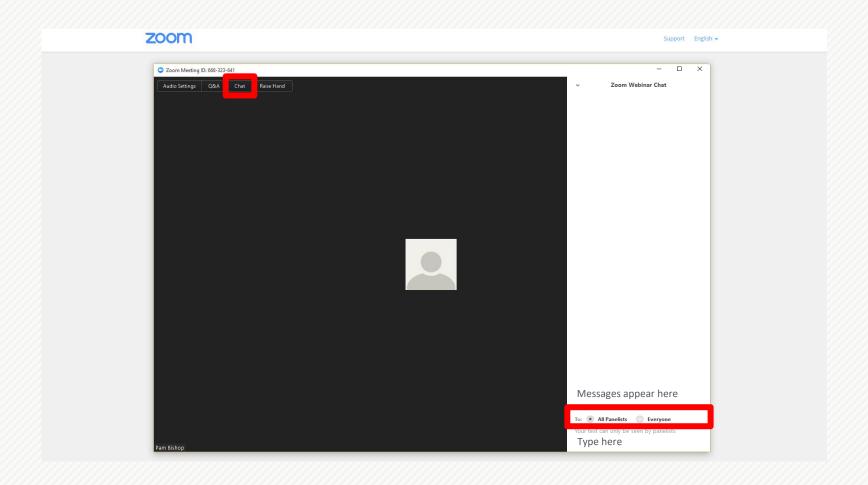
STEM Educators
planning to submit
INCLUDES Alliance
Proposals



STEM Educators
interested in learning
more about evaluating
program success



### HOW TO INTERACT TODAY



### \* MEET YOUR PRESENTERS



Pam Bishop, PhD

**Director**, National Institute for STEM Evaluation and Research (NISER)

**Associate Director for** STEM Evaluation, National Institute for Mathematical and Biological Synthesis (NIMBioS)



Kevin Kidder

Evaluation Associate, National Institute for STEM Evaluation and Research (NISER)



### **†** TODAY'S PRESENTATION

- **❖** What is NSF INCLUDES?
- ❖ What is culture?
- What is cultural competency?
- Essential practices in evaluation
- Questions and comments
- How to learn more



### **WHAT IS NSF INCLUDES?**

Inclusion across the Nation of Communities of Learners of Underrepresented Discoverers in Engineering and Science





### **WHAT IS NSF INCLUDES?**

- Inclusion across the Nation of Communities of Learners of Underrepresented Discoverers in Engineering and Science
- Three essential components:
  - Design and Development Launch Pilots (DDLPs)
  - National Network Coordination Hub
  - Alliances







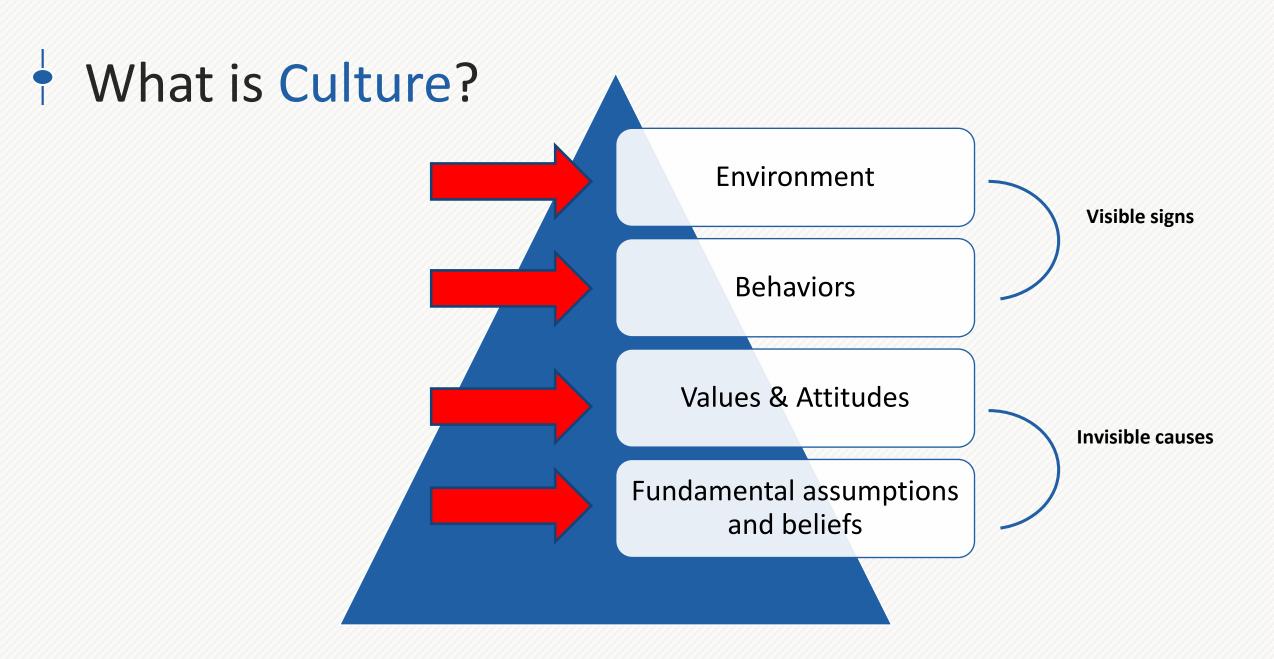
### Key Elements of Engaging Diverse Populations in Evaluation

- Defining culture
- Cultural competency
- Essential practices in evaluation



### What is Culture?







### \* What is Cultural Competency?

**American Evaluation Association Guiding Principles** 

- \*Awareness of self
- Reflection on one's own cultural position
- \*Awareness of others' positions
- Ability to interact genuinely and respectfully with others



# What is Cultural Competency?

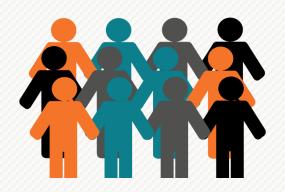
**AEA Guiding Principles** 

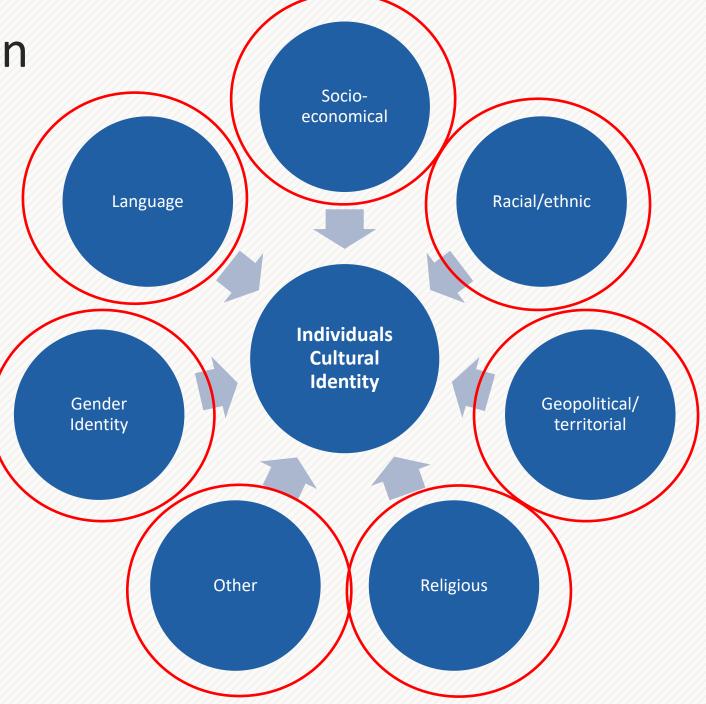


**Essential Practices in** 

### **Evaluation**

Acknowledge the complexity of cultural identity

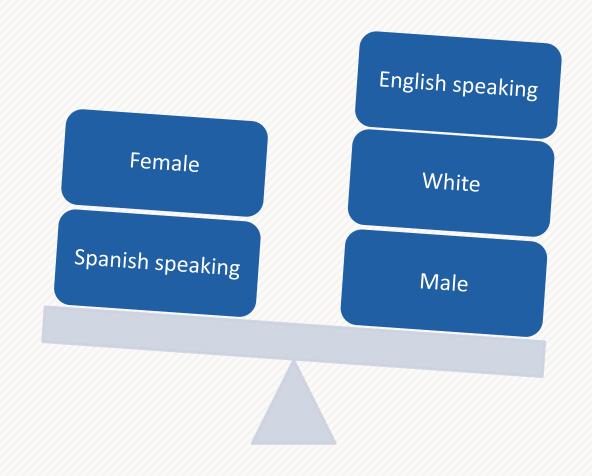






#### **Essential Practices in Evaluation**

Recognize the dynamics of power



#### **Essential Practices in Evaluation**

Recognize and eliminate bias in language

- Emails
- Proposals
- Surveys
- Interview/focus group protocols
- Reports



#### **Essential Practices in Evaluation**

Recognize and eliminate bias in language—An Example

### APA

i) Make sentence plural; ii) rewrite sentence and replace with article or iii) rewrite and drop pronoun; iv) combine both pronouns (he/she)

### Webster

Suggest using the plural pronouns where the writer thinks it sounds best and using singular pronouns where the writer thinks it sound best

### Oxford

Suggests that it can be used, but does not recommend in formal contexts.

#### **Essential Practices in Evaluation**

Employ culturally appropriate options



- Maintain an awareness of the populations in which we are evaluating/working with
- Use data collection/analyses/reporting techniques that align with our needs in working with culturally diverse populations

#### **Essential Practices in Evaluation**

Employ culturally appropriate options—some tips

- Ensure that the members of the evaluation team collectively demonstrate cultural competence in the context for each evaluation.
- Select or create data collection instruments that have been (or will be) vetted for use with the population of interest.
- Use intermediaries to assist with collecting data from persons whose participation would otherwise be limited by language, abilities, or factors such as familiarity or trust.
- Engage and consult with those groups who are the focus of the evaluation in the analysis and interpretation of data, to address multiple audience perspectives



#### **Essential Practices in Evaluation**

Be aware of your personal biases

- Listen carefully
- Check your privilege
- Be respectful
- Risk making respectful mistakes





### **Key Take-Aways**

#### Think about a bias that you may have

- Understand what both culture and cultural competency are
- Acknowledge the complexity of cultural identity
- Recognize dynamics of power
- Recognize and eliminate bias in language
- Employ culturally appropriate options
- ❖Be aware of personal biases



### TODAY'S Presentation

- **❖** What is NSF INCLUDES?
- ❖What is culture?
- What is cultural competency?
- Essential practices in evaluation
- Questions and comments
- How to learn more



### HOW TO LEARN MORE

ATTEND OUR FUTURE WEBINARS!: www.nimbios.org/IncludesConf/webinars

May 3 Qualitative Data in Culturally Rich Evaluations of NSF INCLUDES Projects Evaluation

June 7 Strategies for Measuring the Broader Impacts of NSF INCLUDES Projects

#### **NISER Resources**



stemeval.org



Facebook.com/NISERevaluation



#### Contact us!







kkidder@utk.edu



# Thank you!



Inclusion across the Nation of Communities of Learners of Underrepresented Discoverers in Engineering and Science (NSF INCLUDES)

These STEM evaluation activities are supported by the National Science Foundation through award HRD-1650390 to the University of Tennessee, Knoxville.



#### Additional Resources for Evaluators and PIs

- American Evaluation Association Guiding Principles
- American Evaluation Association public statement on cultural competence in evaluation
- Symonette, H. (2004). Walking pathways toward becoming a culturally competent evaluator: Boundaries, borderlands, and border crossings. In M. Thompson-Robinson, R. Hopson, & S. SenGupta (Eds.), In Search of Cultural competence in evaluation: Toward principles and practices. New Directions in Evaluation, 102, pp. 95-110.
- NSF User-Friendly Handbook for Project Evaluation Chapter 7: A Guide to Conducting Culturally Responsive Evaluation