

# She Can STEM



## **Event Planning to Reach Underserved and Underrepresented Populations**

**Idaho South and East EcosySTEM (ISEE STEM) Event Planning Committee**

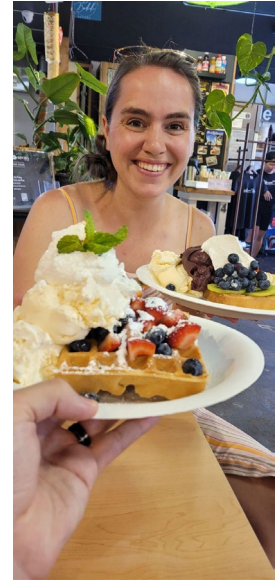
# Meet your Presenters!

Heather Smith- White Pine STEM Academy  
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# Process

- Forming of the committee
- Decision-making
- Planning
- Preparation
- Execution
- Lessons Learned

# Forming the Committee

- Ashley Schaffner- Regional Hub Coordinator, STEM AC point-of-contact, funding
- Heather Smith- Community Outreach Coordinator- WPSA, planner, industry connections
- Michelle Anderson- 4th grade teacher- JRSE, connection to American Falls students, STEM tools access
- Erika Meadows- Idaho Science Coach, connections to schools

# Deciding on an event

Why

What

Who

Where



# Preparation

Asking community partners

Ordering and reimbursement

Shirts, banner, printing key chains

Food

Day of:

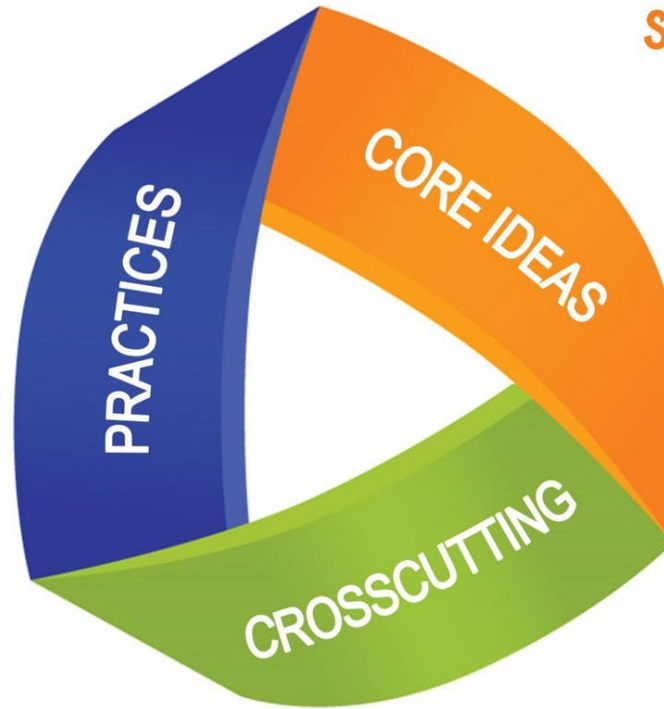
- Set-up
- Manning table
- Organizing speakers and vendors

# Execution



# 3D Science

“What  
students  
do.”



“What  
students  
know.”

“How  
students  
think.”



# Lessons and Standards

## Idaho Power: Wind Turbine Experiment

**MS-PS-3.2** Students who demonstrate understanding can: **Develop a model** to **describe the relationship** between the **relative positions of objects interacting at a distance and the relative potential energy in the system.** Cause and Effect

**MS-ESS-2.5** Students who demonstrate understanding can: **Collect data to provide evidence** for **how the motions and complex interactions of air masses results in changes in weather conditions.** Cause and Effect

# Lessons and Standards

## Idahoan Potatoes: Dehydrated Potato Experiment

MS-PS-1.3 Students who demonstrate understanding can: **Construct a scientific explanation, based on evidence, to describe that synthetic materials come from natural resources.** Structure and Function

*Further Explanation: Emphasis is on natural resources that undergo a chemical process to form the synthetic material. Examples of new materials could include new medicine, foods, plastics, and alternative fuels.*

# Lessons and Standards

## INL Cyber Security

*6-8.IC.02 Explore how computer science fosters innovation and enhances other careers and disciplines.*

*6-8.IC.09 Predict positive and negative social impacts of existing or student created content and computational artifacts (e.g. economic, entertainment, education, or political).*

# Lessons and Standards

## Idaho State Forensics Laboratory

MS-LS-1.1 Cell Theory **Conduct an investigation to provide evidence that living things are made of cells**; either one cell or many different numbers and types of cells. **Scale, Proportion, Quantity**

HS-LS-1.1 DNA, Genes, and Proteins **Construct an explanation based on evidence for how the structure of DNA determines the structure of proteins which carry out the essential functions of life through systems of specialized cells.** **Structure and Function**

# Lessons Learned

Do not ride the bus with your students if you are working the event!

1 point of contact

Development of turnkey documents

Expectations for presenters

Reminder (NOT a lesson learned): patience, kindness

# Super STEM Girl- Idaho State University



Goal was to expose girls to traditionally male-dominated STEM programs at ISU

Sued because it appeared to be an exclusive event (Title 9 action suit)

Transitioned to STEMx:

- Exposes boys to traditionally female-dominated programs or career paths (ex. healthcare)
- Exposes girls to traditionally male-dominated programs or career paths (ex. engineering).



Questions?