

Create.Connect: Summary of Evaluation Findings

The evaluation examined the experience of visitors to the *Create.Connect* exhibition (and, to a lesser extent, visitors to partner institution exhibitions) and the experience of the professionals working to develop and adapt the exhibition. The evaluation focused on four broad dimensions:

1. Visitors' behaviors in the exhibition,
2. Visitors' attitudes towards the exhibition,
3. Visitors' conversations in the exhibition, and
4. Partner institution's experiences with and perspectives on the exhibition.

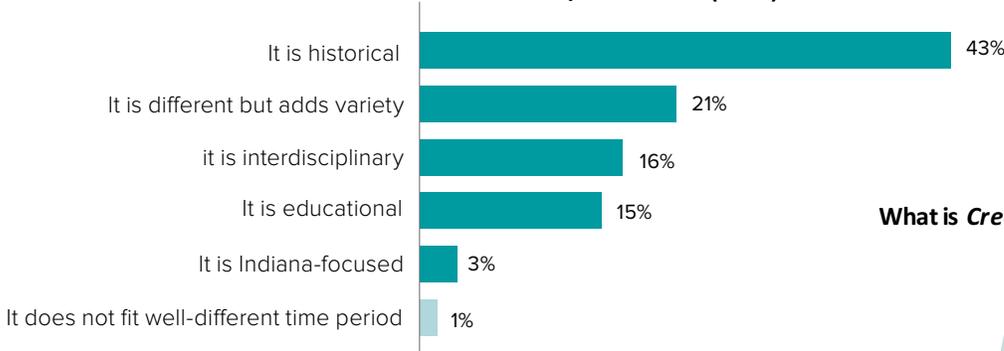
We found that the work accomplished has had significant impact on both staff at partner institutions and visitors to the exhibitions. Following are some of the major findings:

Impact on Visitors to *Create.Connect*

Visitor Experience

- All respondents said they are likely to return to *Create.Connect* on their next visit to Conner Prairie.
- Almost all visitors surveyed (99%) felt *Create.Connect* fits in at Conner Prairie. Some mentioned that it was different from the rest of Conner Prairie, and they liked the variety.
- Respondents reported the hands-on STEM activity table were an enjoyable aspect of their time in *Create.Connect*. These activity tables were also the most frequently visited components.
- Engagement with adults (staff or visitor) increased stay times, instances of iterative behavior, and reaching an endpoint among the children visiting *Create.Connect*.
- Offering a more immersive environment with interactive historical objects seemed to help visitors slow down and spend more time in the exhibition.

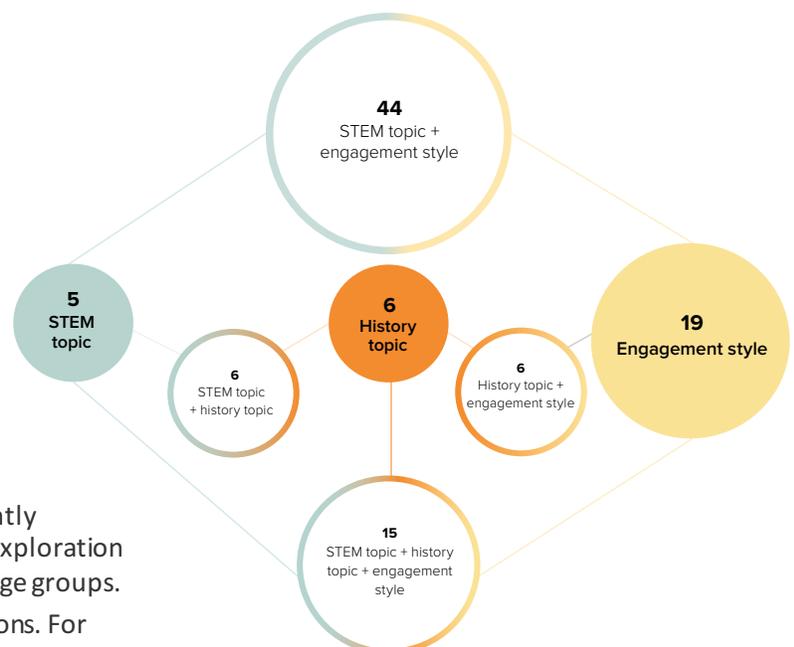
What about *Create.Connect* makes it seem like it fits/doesn't fit? (n=66)



Interdisciplinary Dialogue

- Visitors had on-topic conversations through nearly their entire visit in *Create.Connect*.
- Roughly half of visitor groups verbally explored STEM and History ideas within the same conversation. This talk is indicative of the type of interdisciplinary learning that the *Create.Connect* project was designed to promote.
- History Exploration conversations happened more frequently among older children than younger children, while STEM exploration happened with the same (very high) frequency across all age groups.
- Different activities prompted different kinds of conversations. For example, the Wind Turbine Bench was frequently the site of modeling conversation, while conversations at the Plane Activity Table focused more on cause and effect.

What is *Create.Connect* about? (n=101)



Impact on History Institutions and Staff

Collaborative Approach

There was a shared commitment among all involved to find places where STEM and History complement one another in meaningful ways. This clear focus highlighted important decision points and helped establish the framework for finding local historical narratives that complimented STEM activities.

Supporting Partners

- Each of the four *Create.Connect*-inspired exhibitions built by history institutions was well-received by its staff and visitors.
- Partner institutions reported the exhibition easily integrated with their existing space.
- Partner institutions reported participating in the project has resulted in or supported additional initiatives aimed at bringing STEM learning into history institutions.
- The collaboration with the four partner institutions revealed that future work in this area will likely be supported through existing professional networks and affinity groups.

We're at a farm. We do a lot of STEM already with science and technology and engineering because of all the advances of technology and mechanical improvements. We already talk about [STEM] and have kids figuring that out. This was the perfect segue to moving things from the historic farm to the modern setting. The STEM is perfectly logical. That was the easy part. The surprising aspects were the basic exhibit design.

~Oliver Kelley Farm (Final Interview)

People are happy and excited to be in the space. One of the best indicators that we got was when we met with some 4th grade teachers. They were able to talk about how they used the exhibit. The teachers were saying this is a great tool to use as a second classroom. We still need to think about the exhibit's future, and how we expand the thoughts in it, but those teachers' responses make it feel like we were on the right road.

~ Wabash County Historical Museum (Final Interview)

Continuing to Develop the STEM/History Framework:

Emergent Theories

The *Create.Connect* exhibition and interpretation strategies were developed out of discussions about how to develop experiences that integrated STEM and History learning. These conversations were informed by both formal and informal educational research literature from both disciplines, as well as prior experience. But these resources often felt unsatisfying for **the interdisciplinary goal of the project: "sustained, creative activity where visitors engage in creative approaches to solving problems incorporating STEM and historical thinking."** As the project team began to develop the exhibition and put their assumptions, beliefs, and ideas into action, a few "emergent theories" developed. The working theories listed below are a combination of those that were incorporated into the *Create.Connect* exhibition and suggestions for further areas for exploration—both for exhibition development and informal education research:

1. Historical empathy is an important skill. In *Create.Connect*, one way to build that empathy is to have visitors explore STEM challenges people faced in the past.
2. Understanding historically based, real world applications of science can motivate children to explore STEM concepts, and experimenting with STEM concepts can motivate children to explore real world application of science, both present and past.
3. Visitors are willing to be multi-disciplinary learners who make connections and explore different topics while incorporating their own relevant experience and perspectives.
4. Multiple entry points, open-ended exploration, and narrative storytelling at each of the exhibit nodes are key for engaging families and providing access to all learners.
5. Extended stay times allow visitors to explore STEM processes and historical thinking more deeply; adult-child interactions (with both staff and family members) help support longer stay times.