2011 STAM – CCPRC Meeting
Plenary Session 2
November 16, 2011, 1:15-2:30 p.m.

Applying the Implementation Science Lens to Early Care and Education Research

Description

Cross-disciplinary research demonstrates that effectively implemented programs share a common set of successful supports that help ensure the full and effective use of new innovations. These supports are referred to as core implementation components or as drivers of implementation. This plenary session outlined the core components associated with successful implementation and the ways these components can contribute to the development of early care and education (ECE) programming, research, and evaluation efforts. This session also highlighted the different stages of implementation and outlined best practices in program implementation. Key terminology was introduced and explained, and examples within ECE practice and research were shared.

Presenters

Allison Metz, University of North Carolina at Chapel Hill
Tamara Halle, Child Trends

Scribe

Amy Blasberg, Child Trends

1. **Documents in Session Folder**
   - "Applying the Implementation Science Lens to Early Care and Education Research and Evaluation," Allison Metz and Tamara Halle

2. **Summary of Presentations**
   - **Summary of Presentation #1:** Allison Metz
     - Implementation science is applicable to many different content areas. Implementation is often thought of as secondary to intervention, but it is imperative to think about implementation in order to achieve the desired goals for the intervention. This presentation is organized around four main questions: who, what, how, and why.
     - Critical Components of Implementation. Implementation science works well on every aspect of a systems change. It is important to tease apart the components of the system to figure out how it will impact children and families; each component needs to be operationalized fully to be supported and implemented. Another key piece of implementation is to define the current state and future state (what the system can and should be). Implementation occurs in service to a well-defined intervention.
     - Installing and Improving the Implementation Infrastructure. There are many necessary but insufficient methods to improve infrastructure, including laws or compliance, financial incentives, dissemination of information, or training. Effective intervention strategies must be combined with effective implementation strategies to be successful. Successful implementation requires active use of the implementation

core components, purposeful matching of implementation activities to the stage of implementation, and focus on improvement processes.

- o The core components can be divided into two sets of drivers: *competency drivers* (selection, training, coaching, and fidelity), and *organization drivers* (decision support data systems, facilitative administration, systems intervention, and fidelity). Tamara shared some practice examples that involve competency drivers, such as licensing inspection, home visiting, QRIS, and system-wide professional development initiatives. However, none of the individual competency drivers would be enough to support an initiative that would benefit children. We need organizational infrastructure and a willingness to move towards system change in order to have effective interventions. Leadership is also important and can happen at any level within an organization.

- o An important part of systems change occurs when a "ghost system" becomes a "host system." While initially a few members of an organization may work together to implement a program, systems change is necessary to make the program sustainable. The *stages of implementation* are exploration, installation, initial implementation, and full implementation. It is important to think about the drivers at each stage of implementation and at each level of the system. It is also important to match the activities to the stage of implementation and to think about sustainability throughout the stages of implementation. Lastly, looking at the drivers through an implementation lens and tailoring each component to the context of the innovation is critical. Focusing on the "unteachable" factors when selecting staff or coaches will help the innovation succeed.

- o A Cascading Logic Model as a Way to Measure and Define Change. The cascading logic model identifies each population of concern and allows an independent variable (a process variable, for example) at one level of the system to become the dependent variable (intervention outcome) in the next level of the system. For example, to achieve improved child outcomes (outcome), practitioners must use effective early care and education strategies (process). To ensure that practitioners use effective early care and education (outcomes), they must receive timely and skillful training and coaching in a supportive environment that promotes their improved performance (process). Identifying each outcome and process in this cascade continues through every level of the system. We need to be purposeful about change in order to get to good improvement processes, and feedback loops are a way to reach that goal.

- **Summary of Presentation #2:** Tamara Halle
  - o Implications for Early Care and Education Research. What knowledge and tools are needed for researchers to help identify and determine effective practices and program? What measurement strategies need to be in place? Are we measuring implementation at every level of the system? What is the role of researchers in providing programs feedback for continuous program improvement?

3. **Summary of Discussion with Presenters and Participants**
   - Question: The cascading logic model creates a really nice work plan, but what often happens is that one piece of the model might not happen, but there's still a mandate on the part of the state to get to the outcome. How do you help states when one outcome

doesn't happen? Answer: When we go into States, we start by building an infrastructure where we obtain buy-in at every level of the system. States are often moving along, and sometimes the researchers or TA providers can see where the gaps are. Often we collect data to show where the gaps are. For example, collecting baseline data that shows how the system is working and how it links to outcomes. If you can show holes in the infrastructure and predict why outcomes aren't being maintained, it is often very successful. Some of the changes that need to be made are very hard, so it can be useful to look for "quick wins." Outlining best next steps through the logic model and identifying two actions that will show immediate results is a good strategy. Don't let the perfect become to enemy of the good, but it takes 4-5 years to develop a good system that can inoculate against things like administration changes.