

2012 CCPRC Annual Meeting  
Workshop Session B-4  
October 24, 2012, 3:30-5:00 p.m.

## **Challenges and Options for Studying Child Outcomes in the Context of Quality Improvement Initiatives and QRIS**

### **Description**

This session provided an overview of recent findings that relate to child outcomes in the context of quality improvement (QI) initiatives and Quality Rating and Improvement Systems (QRIS). Critical challenges in research on child outcomes were identified as were implications for QRIS validation studies.

### **Facilitator**

Louisa Tarullo, Mathematica Policy Research

### **Presenters**

James (Jim) Elicker, Purdue University  
Kathryn Tout, Child Trends  
Tamara Halle, Child Trends

### **Scribe**

Rebecca Starr, Child Trends

### **1. Documents in Session Folder**

- “Challenges and Options for Studying Child Outcomes in the Context of QRIS;” Kimberly Boller, Jim Elicker, Tamara Halle and Louisa Tarullo
- “Issues in Studying Child Outcomes in Quality Improvement Initiatives;” Kimberly Boller, Mathematica Policy Research
- “Child Care Quality and Child Outcomes in Indiana’s Child Care Quality Rating System;” James Elicker, Treshawn Anderson, Joellen Lewsader, Karen Ruprecht, and Carolyn Langill
- “Key Considerations for Examining Child Outcomes within Quality Rating and Improvement Systems;” Tamara Halle

### **2. Brief Summary of Presentations**

- **Summary of Presentation #1:** Kathryn Tout (for Kimberly Boller)
  - What are the key questions and challenges related to studying children’s outcomes in the context of QRIS?
  - QRIS evaluation logic model and definitions: logic model from the QRS Assessment Project. Focus is on outcomes—where does validation fit (somewhere between implementation and outcomes)?
  - Evaluation types:
    - Implementation evaluation: were the inputs and activities implemented as intended (fidelity to model); informs system improvement.

- Outcome and effectiveness evaluations: progress toward meeting outcomes; few rigorous studies at this point. Validation studies tend to be outcome evaluations--key question is how do quality levels relate to children's outcomes? We need to be thinking beyond child outcomes.
  - QRIS assumptions about quality and child outcomes: some basic assumptions cannot be assessed or are difficult to include in studies.
    - Examples of evaluations with child outcomes (correlation/descriptive) in nine States; these evaluations are finding small or no relationship between child outcomes and quality levels.
    - Next generation of QRIS outcome evaluations:
      - Think about how we can have more alignment between research questions, logic models, assumptions, and expected outcomes. What designs do we need to be able to look at these things?
      - Evaluation begins at early stage of QRIS implementation.
      - Inclusion of child and teacher-level attendance and continuity data.
      - Revisit implementation and quality dimensions.
      - Partnerships with states to address their questions.
- **Summary of Presentation #2: Jim Elicker**
  - *Quality and Child outcomes in Indiana*: INQUIRE has been very useful for the field and has contributed to what Indiana has done with Paths to Quality (PTQ), its QRIS.
    - Phase I: implementation/validation study 2008-2011
    - Description of PTQ: building block model with level I=licensing and level 4=accreditation. It is a voluntary system with a high participation rate.
  - Implementation evaluation looked at several questions: provider participation and perceptions; parent awareness and use of the system; and child outcomes.
    - An important part of the evaluation was to validate the rating system.
    - There were two main questions about child outcomes: are children from low-income families gaining access to the highest PTQ levels, and associations between ratings and child outcomes (preliminary).
  - Issues with assessing child outcomes: what can you legitimately look at during different stages of evaluation and program development?
    - The system needs to be fully implemented and validated.
    - Need focused hypotheses.
    - What will be the impact of the QRIS on child outcomes? What outcomes? What has to happen in order to improve outcomes for particular groups of children.
    - Look at effects of dosage etc. Can we make causal inferences?
    - This evaluation was a preliminary look, and many of these issues were not in place or addressed.
  - Specific questions: are children using CCDF vouchers gaining access to high-rated programs? What level of quality is the system providing? Are child outcome measures and quality associated?
  - Design (see "Child Care Quality and Child Outcomes in Indiana's Child Care Quality Rating System")
  - Results of study:

- Access. Among centers, children with subsidy vouchers were more likely to be in level 4 care.
  - Rating scale validation (ERS): there was a stair-step pattern with level 4 centers and homes having higher ERS global scores than level 1 providers. However, a lot of variability in quality was observed. These findings give partial support for the validity of rating system. They would like to see stronger results with less variation in ERS scores and more association between ERS scores and PTQ levels.
    - Is quality at the highest levels high enough to affect child outcomes? Is there a threshold?
    - Further analysis of ERS data needed including of the items that were holding programs back.
  - Child outcomes:
    - No associations found between PTQ rating levels and infant/toddler or preschool developmental status.
    - Some mild associations with other measures of quality were detected.
    - When control for SES variables, the researchers found small associations between adult-child interaction and receptive language in preschoolers and cognitive index in infant/toddlers.
- Implications
  - How can we improve chances that QRIS will improve child outcomes?
    - Raise quality standards for higher levels (levels 3 and 4).
    - Focus standards more on adult-child interactions, teaching quality
    - Make sure QRIS is ready for impact evaluation
    - Need rigorous designs to look at child outcomes.
- Phase II is planned (2012-2016)
  - Does PTQ help diverse child care providers advance to higher levels?
  - Does participation in higher rated programs improve child outcomes?
    - Will follow kids for 4 years during Phase II with 3 assessment points per child. Child care arrangements will be tracked every 6 months. Developmental growth trajectories will be observed as care is changed.
  - Are parents aware of PTQ? Do they use it to inform child care decisions?
- **Summary of Presentation #3: Tamara Halle**
  - Tamara discussed key considerations for using child outcomes measures with QRIS validation including best practices for use of child assessments.
    - Need to first think about the purpose of child assessment data. Be intentional about the purpose because this should guide decisions such as domains to be measured, tools to be used, who will be assessed, etc.
    - The assessments must have appropriate reliability and validity with the purpose and population of interest.
    - Need adequate infrastructure and resources to carry out the assessments and respond to findings including training for those involved with assessments and analyzing results.
  - Cautions and practical considerations when using child outcome data for assessing programs and systems.

- Need to consider the burden on programs, costs of assessments and possible issues with assessments. For example KRAs, looking at where children are at beginning of kindergarten. Purposes may be to “look back” at how ECE programs prepare children for kindergarten, but alignment may not exist between the assessments/domains used with preschool children and the assessments/domains used in KRAs.
- Need to consider the challenges in tracking important variables such as dosage, exposure to multiple settings, and the quality of those settings.
- *Caution:* It is inappropriate to use assessment data in isolation to make decisions about ECE programs and systems. Should gather multiple points of data and look at child progress over time; need to understand the background characteristics of families and children; need to collect direct indicators of program quality and consider program resources; and need to have a clear plan for program improvement.
- *Caution:* Associations between quality indicators and child outcomes are modest. Associations are stronger at higher levels of quality, but still relatively small. Associations are stronger for domain-specific relations between quality and child outcomes.

### 3. Brief Summary of Discussion/Key Issues Raised

- Studies really aren't finding associations between QRIS and child outcomes although Indiana has some evidence of interactions being associated with outcomes.
  - How do we incorporate measures of process quality into QRIS and use those measures for validation?
  - How careful are we being about identifying and tracking standards changes, policy changes, and financial incentive changes in relation to child outcomes? There are many variables to track, e.g., teachers, dosage, who is being assessed, etc. We need to think more about the alignment between research questions, logic models, assumptions, and hypotheses.
  - Kathryn: Minnesota did not find associations with CLASS. Need to think about the reliability and validity of all pieces of information collected in QRIS including documentation of indicators.
- So far there is little rigorous data concerning validation. A single outcome measure is not sufficient to evaluate a whole system. There may be other outcomes that can help validate the system (workforce, family, and system outcomes).
- Issue of tracking outcomes just for specific populations (i.e. vulnerable populations). How do things like density of subsidy/poverty affect outcomes? Jim: we haven't looked at program context. Kathryn: it would be helpful to be able to link data. How are studies addressing ELL children? It is discussed, but there aren't the measures available.
- Potential for using HLM to partition variance from child/program and by quality indicators, etc.? What are the features that may relate to child outcomes and which might be creating noise?
- There are many considerations in using child assessments for validation of QRIS systems. The purpose must be very intentional. Need to make sure we are using reliable/valid assessments that are appropriate for the age and population of interest. Also need to consider the burden and costs of conducting child outcome assessments. Other

challenges include the modest association between quality and child outcomes and the need to be cautious about using this data in isolation to validate systems.

- Next generation of QRIS outcome evaluations:
  - Think about how we can have more alignment between research questions, logic models, assumptions, and expected outcomes. What designs do we need to be able to look at these things?
  - Evaluation begins at early stage of QRIS implementation.
  - Inclusion of child and teacher-level attendance and continuity data.
  - Revisit implementation and quality dimensions.
  - Partnerships with States to address their questions.