Assessing What We Can versus What We Should:

What are the most important things to know about young children's development?

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Definitions of School Readiness

1. Ready to learn in school

"Children who enter school not yet ready to learn, whether because of academic or social and emotional *deficits*, continue to have difficulties later in life"

(Rouse, Brooks-Gunn, & McLanahan, 2005, pg. 6)

2. Prediction of future school performance

"A student who is measured as more 'ready' should have greater success in meeting the demands or challenges of school"

(Rock & Stenner, 2005, pg. 16)

3. Prepared for success in school

(Eastman & Monroe, 2001)

4. Involves both children and schools

"School readiness in its broadest sense involves children, families, early environments, schools, and communities"

(Maxwell & Clifford, 2004, pg. 42)

"Readiness is an interaction: As children need to be ready to make the most of their school experience, so too do schools need to be 'ready' to meet the diverse needs of young children and their families"

(Murphey & Burns, 2002, pg. 3)

Problems with the Definitions

1. Ready to learn in school

- Children are always ready to learn
 - Learning begins in utero and is an essential aspect of early childhood development
 - It is HOW children learn that is quite varied and of interest
- Assessing "deficits" is looking backwards
 - Focuses on what children can't do not they can
 - Leads to emphases in preschool curricula to fix children before school entry
 - ECE field needs a better "theory of change" -- How did those "ready" children learn what they know?

2. Prediction of future school performance

- If readiness so strongly predicts outcomes, what is the point of school?
- Schools should be about changing trajectories, not maintaining them.

3. Preparation for future school success

- School is a "black box" -- we have few analyses of what children are expected to do in classrooms, specifically.
- Expectations for behavior and performance are changing. How do readiness notions keep up?

4. Child and School Readiness

- At least 3 U.S. States include a readiness assessment of schools as well as of children
- School "readiness" assessments do not involve assessing the qualities of the school known to be important for later achievement, such as
 - Teacher turnover
 - Level of instructional demands
 - Sense of control and order
 - Number of poor children attending
- School "readiness" assessments mostly involve assessing efforts of schools to reach out to families, primarily in passive sorts of actions

The field of early childhood education lacks a developmental focus that would provide a clear picture of which early skills are related to later academic competence.

Example:

- Knowing the alphabet and letter-sound correspondence are highly correlated with reading competence up until the end of 2nd grade.
- They do not predict reading at 3rd to 5th grade
- Comprehension and vocabulary predict reading in later grades
- Those are hard to measure in young children.

Child Readiness Areas Identified by teachers

Concentration

- Persistence
- Paying attention to teacher-directed activities
- Following rules
- Focusing on activities independently



Child Readiness Areas

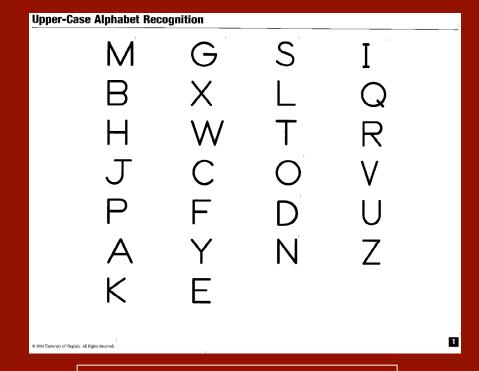
Cooperation

- Getting along with peers and the teacher
- Appropriate emotional responses
- Self initiation of activities
- Handling transitions



Child Readiness Areas

- Basic Concepts
 - Colors
 - Letters
 - Numbers
 - Concepts of print
 - Recognizes name
 - Uses pencils, crayons



Most often measured

PALS Pre-K Assessment

- Concentration, Cooperation, Concepts most often mentioned by teachers as lacking in children not ready for kindergarten
- Concentration, Cooperation most difficult to assess
 - Require seeing the child in the classroom situation, responding to formal demands of school
 - Depend on adult ratings
 - Teacher ratings can be influenced by other factors
 - Ethnicity of child
 - Poverty and education levels of child's family
 - Years of teaching experience
 - Composition of classroom and school

A Tale of Three Studies

1. Rural Southern U.S.

- Low income children in prekindergarten
- Primarily white
- Multiple school systems
- Followed through 1st grade (data from kindergarten)

2. Urban Southern U.S.

- Low income children in prekindergarten
- Single school district
- Followed through third grade
- Primarily African American

3. Rural Southern U.S.

- Single School system
- 1st year of implementation of literacy curriculum

Study 1 Participants

- 34 classrooms in 7 school districts in 6 middle south Tennessee counties
- Funded by TN Early Childhood Education program implemented in 1999
 - No specified curriculum model currently in use
 - ECE certified teachers + assistant in each class with up to 20 children
 - Focus is on success in school

Characteristics of Teachers and Assistant Teachers

- Teachers (N = 34)
 - 20 w/ Bachelor's degrees; 14 w/ Master's degrees
 - 9 ECE credential; 12 Elementary; 12 both ECE and Elementary; 1
 Special Education
 - Average years' teaching experience = 10.7
- Assistant Teachers (N=49)
 - 44 High School diploma; 1 Associates degree; 3 Bachelor's degrees; 1 Master's degree (retired teacher)
 - $\overline{-}$ Average years' teaching experience = 4.7

Characteristics of Children

Category	Number Recruited	Number Lost	Final Pre-K Sample	Final Kdg Sample
Gender				
Males	288		53%	
Females	260		47%	
Total	548	43	505 (92%)	473 (86%)
Ethnicity				
White (non-Hispanic)	383	70%	69%	
African-American	113	22%	20%	
Hispanic	25	3%	5%	
Asian	3	1%	.02%	
Other	3	0	.6%	
Mixed	28	4%	5%	
<u>Disability</u>	52		50 (10%)	

Child Achievement Tests

All children individually assessed in Sept and May of pre-K year and May of following year in kindergarten

- Woodcock Johnson III Subtests
 - Letter Word Identification
 - Quantitative Concepts
 - Applied Problems
 - Picture Vocabulary
 - Oral Comprehension
 - Story Recall
- Peabody Picture Vocabulary Test

Factor Analysis of Gains

Basic Skills

Complex Language

Classrooms Affected Skills Differently

- Classrooms that made positive gains in one aspect of basic skills (e.g., letter recognition) also affected gains in the other basic skills (e.g., numbers).
- Classrooms that effected positive gains in basic skills did not necessarily effect gains in complex language or on the PPVT
- Classrooms varied a great deal in how much gain and which areas they affected.
- Longitudinal assessments will tell us which cluster of skills is most related to later achievement

Study 2: Participants

1st Grade Sample

- 42 classrooms in 11 public schools, Guilford, Co, NC
- 87 target children who had attended Title I funded prekindergarten classes in public schools (67 followed through 3rd grade)

Child Achievement Measures

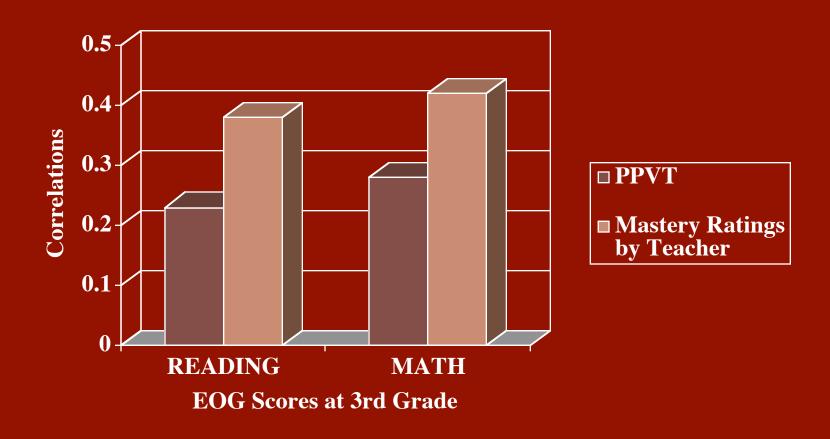
(Individually administered each spring)

- First Third Grade
 - PPVT
 - Peabody Individual Achievement Test (PIAT)
 - Math
 - Reading
- End of 3rd Grade Test

(Group test devised by NC)

- Math
- Reading

Predicting End of Grade Test Scores from 1st Grade Measures



The Issue of Standardized Group Tests

- Children were taking a formal group test for the first time
- Two early aspects of development predicted how well they would do in *both* content domains
 - PPVT
 - Teacher ratings of motivation, self-regulation and independence in 1st grade
 - Each of these addresses children's ability to function independently and to learn from the environment

Very important to determine what the outcome achievement measure is before deciding what to measure for "readiness"

PPVT as a Case in Point

- Children hear a word and point to the correct one of four pictures on a page, continuing until they miss 8 in a row
- Words measure complex concepts, not just nouns

- "Sorting" "Predatory"

- "Greeting" "Scholar"

- "Decorated" "Horrified"

• Understanding of these terms requires extensive experience in language interactions with better skilled partner (teacher, parent, other adult)

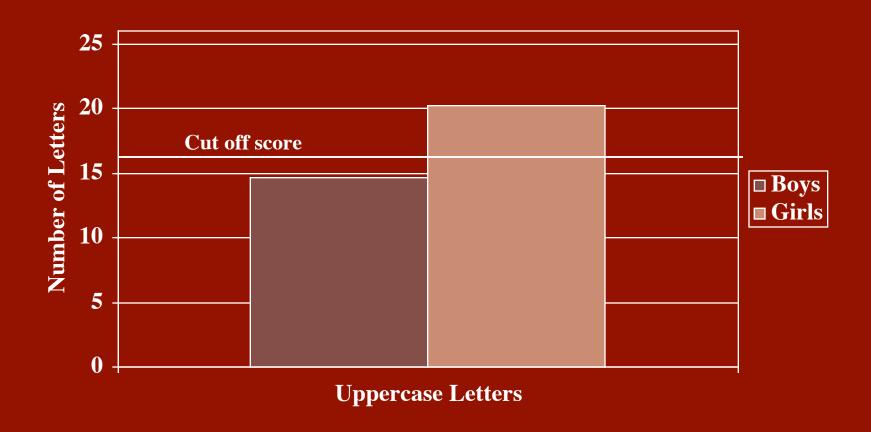
PPVT Perplexities

- One of the strongest early predictors of later school achievement, beyond decoding
- The measure on which poor children consistently score much lower than children from more affluent families
- The outcome least often affected by preschool intervention programs
 - Very hard to address in whole group instruction
 - Teachers seldom use rare words
 - Teachers seldom have individual conversations

Study 3: Participants

- 1 sparsely populated, rural county in TN
 - High unemployment
 - Low education level of parents
- Project to provide literacy experiences for every 4 year old in the county
- 8 prekindergarten classrooms, all implementing a new literacy full day curriculum (OWL, published by Pearson)
 - Multiple whole group sessions throughout the day
 - Primary content is language, literacy and readiness
- Children assessed on PALS Pre-K Uppercase Letter Naming Task as readiness measure for kindergarten

Comparison of Boys and Girls Letter Naming after 5 Month Literacy Curriculum



Basic Skills as Readiness Goal

- Relatively easy to teach
 - Method of teaching currently does not favor boys
 - Whole group
 - Listening rather than acting
 - Decontextualized language (letters, sounds)
- Children in preschools increasingly exposed to these skills
- The question is will this help them do better in school?
 - No one has this answer
 - Generalizing long term benefits from descriptions of children who learned without direct instruction

Success in School Requires Children to Develop

- The ability to concentrate and ignore distractions
- Self regulation
- Appropriate emotional responses
- Understanding of complex language and the *meaning* behind the words
- Positive relationships with teachers who provide interesting things to do

These skills are all very hard to assess early, especially if the child has not been exposed to the setting (classroom) in which he or she will function.

Final Thoughts

- Just because we can measure something does not mean we should
- It is important for a community to decide why they want assessments of children
- Different purposes require different strategies and different measures
- Deciding the purpose of assessing readiness may help define the measures.

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Papers Presented on Projects Described

- Farran, D., Lange, G., & Boyles, C. (April, 2003). Predicting standardized tests scores for low-income children. Round table presented at the annual meeting of the American Educational Research Association, Chicago, IL.
- Farran, D.C., Lipsey, M., Bilbrey, C. & Hurley, S. (April, 2005). Transition to kindergarten for children from rural low income families:Differential effects of two comprehensive curricula. Paper presented at the Biennial meeting of the Society for Research in Child Development, Atlanta, GA.