Identifying Young Children at Risk: Top Ten Predictors

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Disclosure

Financial
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Objectives

• List the top ten characteristics of young children that predict learning difficulties
• Describe how to assess risk for developmental delay
• Use sample data to identify needed intervention and supports
Identifying Young Children at Risk: Top Ten Predictors
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Identifying Young Children at Risk

Young children perform a number of tasks with amazing skill

What are the abilities and skills young children need in order to demonstrate such complex behaviors?
Identifying Young Children at Risk

Growth and Development

- Brain: Neurons, Synapses, Experience
- Body: Physical Size, Motor Coordination, Health
- Mind: Thinking, Language, Concepts, Problem-Solving
- Person: Relationships, Social Understanding, Emotions

(Thompson, 2001)

Domains of Development and Learning

- Physical
- Communication
- Cognitive
- Adaptive Behavior
- Social-Emotional

Individuals with Disabilities Education Improvement Act (IDEIA)

Physical Development

- National Education Goals Panel
- National Association for the Education of Young Children
- Head Start

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**Gross Motor Skills**

- Children with many types of disabilities have been shown to exhibit problems with **postural control** (Westcott, Lowes, & Richardson, 1997).
- **Hopping** distinguished between a group of children considered normal and a group considered at-risk for future learning disabilities (Huttenlocher, Levine, Huttenlocher, & Gates, 1990; NASPE, 1990).

**Fine Motor Skills**

**Physical Development and Personal Care**

Typical preschool-age children are able to perform personal care tasks, such as feeding, dressing, brushing teeth, toileting, and washing hands.
Social-Emotional Development

How children feel about themselves, how they behave, and how they relate to others are predictors of learning outcomes.

Behavioral, Emotional, and Social Competence

Across a range of studies, the emotional, social, and behavioral competence of young children predict their academic performance in first grade, over and above their cognitive skills and family backgrounds.

(Raver, & Knitzer, 2002)

What are the behavioral, emotional, and social competencies that facilitate academic success?
Identifying Young Children at Risk

Facilitative Behaviors

- Accurately identify emotions in self and others
- Manage feelings of anger, frustration, and distress
- Enjoy academic learning and approach it enthusiastically
- Relate to peers and teachers in positive ways
- Work attentively, independently, and cooperatively in a structured classroom

(Raver, & Knitzer, 2002)

What behaviors compete with or “block” the acquisition or performance of socially skilled behaviors?

Competing “Problem” Behaviors

- Aggressive behaviors
- Impulsive behaviors
- Unable to pay attention to tasks or follow directions
- Unable to cooperate with others
- Oppositional, noncompliant, or defiant behavior
- Constantly seek attention from peers or teachers
- Ignore peers or teachers

(Raver, & Knitzer, 2002)
Self-Regulation

• The internal mechanism that enables mindful, intentional, and thoughtful behaviors.
• Self-regulation involves:
  – the ability to control one’s impulses and to **stop** doing something.
  – the capacity to **do** something (e.g., awaiting one’s turn).

(Bodrova & Leong, 2008)

Language Development

- Phonology
- Pragmatics
- Morphology
- Syntax and Grammar
- Semantics
- Pragmatics

Comprehension and Production

**Receptive (Comprehension)**
Children must understand words and sentences to perceive and process information.

**Expressive (Production)**
They must use words to show they can retrieve information from memory.
Success in school also depends on pre-academic skills and knowledge.

Pre-Literacy

- Vocabulary Size
- Complexity of Spoken Language
- Understanding of Language Concepts
- Familiarity with alphabet and books
- Recognizing and Naming Letters

Vocabulary and Conversations

Children learn word meanings through conversations with other people.

- They often hear adults repeat words and use new and interesting words.
- The more words they hear, the more word meanings they learn.

(National Reading Panel Report, 2000)
Identifying Young Children at Risk

Differences in Vocabulary Acquisition

Language and Literacy

Early development of reading depends critically on whether the receptive phonological component of the aural system and the expressive phonological component of the oral system are developing in an age-appropriate manner (Berninger, 2007).

Phonological Awareness

Children are ready to read when they can...

- Hear the way words sound
- Identify rhyme and alliteration
- Blend sounds
- Recognize onset and rime
- Identify sound units in words
Pre-Numeracy

- Rote Counting
- Number Recognition
- Knowledge of Basic Concepts (Sizes, Comparisons, Shapes)
- Count to 10 with one-to-one correspondence

Information Processing

- Information from the environment
- Sensory and Perceptual Processes
- Memory
- Thinking
- Language

Cognitive, Language, and Pre-Academic Skills

- Naming Letters
- Alphabet: abcdefghijklmnopqrstuvwxyz
Identifying Young Children at Risk

Cognitive, Language, and Pre-Academic Skills

1. ___________________
2. ___________________
3. ___________________
4. ___________________
5. ___________________
6. ___________________
7. ___________________
8. ___________________
9. ___________________
10. ___________________

What are Your Top 10 Predictors of Academic Difficulties?

10. ___________________
9. ___________________
8. ___________________
7. ___________________
6. ___________________
5. ___________________
4. ___________________
3. ___________________
2. ___________________
1. ___________________
**Top 10 Predictors of Academic Difficulties**

1. Difficulties following directions or routines.
2. Poor articulation.
3. Difficulty naming known objects quickly (RAN).
4. Poor phonological awareness skills (phonemic awareness).
5. Extremely restless and easily distracted.
7. Talked late compared to peers.
8. Difficulties interacting with peers.
9. Clumsy (gross and/or fine motor skills.)
10. Difficulties following routines.

*Based on recent research, math skills were shown to be predictive as well.

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**Assessing Risk for Developmental Delay**

Developmental Indicators for the Assessment of Learning—Fourth Edition

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**Performance-Based Assessment**

<table>
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<tr>
<th>Motor</th>
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<th>Language</th>
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<td>Body Parts</td>
<td>Personal Information</td>
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<td>Colors</td>
<td>Articulation</td>
</tr>
<tr>
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<td>Rapid Object Naming</td>
<td>Objects and Actions</td>
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<td>Thumbs and Fingers</td>
<td>Rote Counting</td>
<td>Letters and Sounds</td>
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<td>Shapes</td>
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Behavioral Observations and Intelligibility
Identifying Young Children at Risk

**Parent Questionnaire (PQ)**

Self-Help Development
Social-Emotional Development
[Overall Development]

**Teacher Questionnaire (TQ)**

Optional
Self-Help Development
Social-Emotional Development
[Overall Development]

**Sample Data**

- Is the child at risk for developmental delays and/or school failure?
- What interventions/supports does the child need?
Reason for Screening

- Susie’s parents are concerned that she talks less than her younger brother.
- The Kindergarten teacher referred Susie for developmental screening.
- The testing team administered the DIAL-4.
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Analyzing Language Skills

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</table>

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Top 10 Predictors of Academic Difficulties

10. Difficulties following directions or routines.
9. Clumsy (gross and/or fine motor skills.)
8. Difficulties interacting with peers.
7. Talked late compared to peers.
5. Extremely restless and easily distracted.
4. Poor articulation.
3. Difficulty naming known objects quickly (RAN).
2. Poor phonological awareness skills (phonemic awareness).
1. Poor letter-naming skills.*

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References


References


Questions

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