Three Tiered Model

- Assessment by response to intervention
- Tier 1
  - Provide classroom support
- Tier 2
  - Provide more intensive support
- Tier 3
  - Consider special education
- Monitor and evaluate at all stages

Operational Definition of LD

- LEVEL 1: Is there a deficit in any specific academic area?
- LEVEL 1A: Is the deficit due to any exclusionary criteria?
- LEVEL 11: Is performance on tests of cognitive processes within normal ranges?
- LEVEL III: Is the aptitude-achievement pattern consistent with definition of LD?
- LEVEL IV: Does the identified deficit substantially impact the student’s life functioning?

DIAGNOSIS OF READING DISABILITY

- Follow Best Practices
- Question of eligibility
  - Problems with discrepancy model
- Single versus double deficit
  - Phonological processing
  - Naming speed
  - Double deficit
- Where has the reading process gone astray?
DEFINITION OF DYSLEXIA: IDA AND NICHD

Dyslexia is one of several distinct learning disabilities. It is a specific language-based disorder of constitutional origin characterized by difficulties with single word decoding, usually reflecting insufficient phonological processing abilities. These difficulties in single word decoding are often unexpected in relation to age and other cognitive academic abilities…

The term means a disorder in one or more of the basic psychological processes involved in understanding or in using language, spoken or written, that may manifest itself in an imperfect ability to listen, think, speak, read, write, spell, or to do mathematical calculations, including conditions such as perceptual disabilities, brain injury, minimal brain dysfunction, dyslexia, and developmental aphasia.

NEW VIEW OF DISCREPANCY

Nonsense word reading
  < Real word reading
    < Text comprehension
      < Listening comprehension
DOUBLE DEFICIT

- Most impaired readers
- Distinguished from other poor readers by naming speed deficits

DYSLEXIA AND READING DISABILITY

- Confusion in terms
- Reading disability at what level of reading?
- Other types of reading disabilities

OTHER COGNITIVE ISSUES

- Primary language disability
- Mental retardation
- Verbal ability/overall language development
- Ability to shift/regulate attention
OTHER PROPOSED CAUSES

- Visual deficits
- Brain morphology
- Genetic etiology
- Memory deficits
- Temporal processing
- Instructional deficits

WHERE HAS THE READING PROCESS GONE ASTRAY

- Most important question
- Use model of reading development
- Use research based understanding of component reading skills
- What skills are lacking?
- Must answer this question in order to design interventions

STEP-BY-STEP ASSESSMENT

- Rule out health issues
  - Vision
  - Hearing
  - Other
- Health/developmental and familial factors
  - Early history
  - Family history of reading difficulties
FUNCTIONAL SKILLS AND INSTRUCTIONAL BACKGROUND

- Examination of records
- Teacher/parent consultations
- Global measures
- Instructional environment
  - School history
  - Current curriculum

NON-COGNITIVE FACTORS

- Motivation/personality
- Social-emotional issues
- Environmental factors

COMPONENT READING SKILLS: Sub-word level

- Is child developing phonological awareness?
- Does child have any naming speed deficits?
- Phonological processing
- Rapid naming
PHONOLGOCIAL PROCESSING (Classroom Information)

- Embedded in curriculum
- BPST, APST
- Invented Spelling

PHONOLOGICAL PROCESSING

- Yopp Phonemic Awareness tasks
- TOPA
- CTOPP
- Lindamood Auditory Conceptualization
- PAL
- PAT
- DIBELS
- Other tests as part of larger batteries
  - Also verbal memory composites

COMMON PHONOLOGICAL PROCESSING TESTS

- Blending
- Segmenting
- Memory
- Onset rhyme
NAMING SPEED

- CTOPP
- NEPSY
- PAL
- DIBELS
- Other Tests that are part of larger batteries (e.g. WJIII)

COMMON NAMING SPEED TESTS

- Pictures
- Colors
- Digits
- Letters
- Phonological fluency
- Semantic fluency

COMPONENT READING SKILLS: Word level

- Has child acquired alphabetic principle/sound-symbol correspondence?
- Is child developing “sight words”?
- Components
  - Accuracy
  - Rate
  - Reading
  - Spelling
### WORD LEVEL ASSESSMENTS

**Classroom sources**

- Embedded in curriculum
- Spelling tests
- Invented spelling
- Writing

### WORD LEVEL ASSESSMENTS

- Word attack (decoding) tests
- WJIII Spelling of sounds
- Spelling subtests
- TOWRE
- PAL

### COMPONENT READING SKILLS: Text Level

- Is child developing automaticity/fluency?
- Components
  - Accuracy
  - Rate
  - Fluency
  - Comprehension
TEXT LEVEL ASSESSMENTS

Classroom sources

- Embedded in curriculum
- Levels (lexile)
- District fluency tests
- Informal reading inventory
- Running records

TEXT LEVEL ASSESSMENTS

- TOWRE
- Gray Oral Reading Test-4 (GORT-4)
- Reading achievement tests
- Oral reading fluency measures

COMPONENT SKILLS CONTINUED

- Production processes
  - Handwriting
  - Keyboarding
- Oral language comprehension
  - Recall
  - Syntax
  - Expression
GUIDELINES FOR DIAGNOSTIC ASSESSMENT

- IQ-achievement discrepancy not useful
- Assess both phonological processes and naming speed
- Multi-faceted evaluation of reading skills

SOURCES OF INFORMATION ON READING TESTS

- http://idea.uoregon.edu/assessment/index.html
- http://www.nichd.nih.gov/reading.htm

DIFFERENTIAL DIAGNOSIS OF READING PROBLEMS

- Early predictive differences
  - Phonological processing
  - Naming speed
- Intervention differences
  - Sound-symbol correspondence
  - Fluency and automaticity
  - Language and comprehension
INTERVENTION

- Provide interventions that target area of need
- Provide methods for monitoring growth
- Provide accommodations as needed
- Help to formulate long-term plan

PREDICTING RESPONSIVENESS TO INTERVENTION

- IQ
- Phonological measures
- Naming speed
- Double deficits
- Targeted intervention