Teaching Students with Intellectual Disability to Read using *Friends on the Block,* a Comprehensive Text-Centered Curriculum

Jill Allor Southern Methodist University

We disclose a financial interest in *Friends on the Block*.

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Acknowledgements



IES Funded Project Intensity: Our Team

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- Stephanie Al Otaiba, Co-Pl
- Paul Yovanoff, Co-PI

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- Jennifer Cheatham

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- Diane Gifford
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- Melinda McGrath
- Ashley Moorshead
- Miriam Ortiz
- Carlin Conner
- Kristi Baker



DADD Presentation OBJECTIVES

- Participants will implement basic evidence-based strategies for teaching foundational literacy skills for students with disabilities.
- Participants will identify common challenges and solutions for teaching foundational literacy skills to students with disabilities.

Ask Questions!

 Participants will become familiar with curriculum features that are consistent with evidence-based recommendations for teaching foundational literacy skills.



Organization of Presentation

- Brief summary of research on teaching reading to students with IDD, including a summary of our pilot study findings
- Brief overview of FOTB features why we created it
- Evidence-based strategies
 - Book Reading procedures
 - Skill-focused procedures (with FOTB sample activities)

Try it out

Questions and Contact Information



Literature Review: Research on Reading and Intellectual Disability

- Students with intellectual disability (ID) demonstrate lower levels of reading achievement than students with other disabilities (Caffrey & Fuchs, 2007; Wei, Blackorby, & Schiller, 2011).
- Limited research on effective teaching of reading to students with ID (Polloway, et al., 2010)
- Some research on isolated phonics skills; emphasis on sight word instruction (reviews by Browder, et al., 2006; Browder & Xin, 1998; Joseph & Seery, 2004)



Literature Review:

Recent research on comprehensive programs

- More recently research has shown students with ID respond favorably to comprehensive programs of reading instruction (e.g., Allor, et al., 2014; Allor, et al., 2013; Browder, Mims, Spooner, Ahlgrim-Delzell, & Lee 2008; Connor, Alberto, Compton, & O'Connor, 2014; Lemons, et al., 2015).
- Two of our studies that led directly to Intensity (FOTB) curriculum
 - Allor, J. H., Mathes, P., Roberts, K., Cheatham, J. P., & Al Otaiba, S. (2014). Is scientifically-based reading instruction effective for students with Below-Average IQs? Exceptional Children, 80, 289-308. [4-year study with Early Interventions in Reading by SRA/McGraw-Hill]
 - Allor, J. H., Gifford, D. B., Al Otaiba, S., Miller, S. J., & Cheatham, J. P. (2013).
 Teaching students with intellectual disability to integrate reading skills: Effects of Text and Text-Based Lessons [early version of *Friends on the Block*]



Research with Friends on the Block

- Allor, J. H., Gifford, D. B., Jones, F. G., Al Otaiba, S., Yovanoff, P., Ortiz, M. B., & Cheatham, J. P. (2018). The effects of a text-centered literacy curriculum for students with intellectual disability. *American Journal for Intellectual and Developmental Disabilities*, 123, 474-494. doi:10.1352/1944-7558-123.5.474 [first 8 students from development grant studies]
- Jones, F. J., Gifford, D. B., Yovanoff, P., Al Otaiba, S., Levy, D., & Allor, J. (In press). Alternate assessment formats for progress monitoring students with intellectual disabilities and below average intellectual quotients: An exploratory study. Focus on Autism and Other Developmental Disabilities. https://doi.org/10.1177/1088357618762749 [assessment study]
- Allor, J. H., Yovanoff, P., Al Otaiba, S., Ortiz, M. B., & Conner, C. (in review).
 Literacy intervention for students with intellectual and developmental disabilities. [analysis of all 18 students from development grant studies]

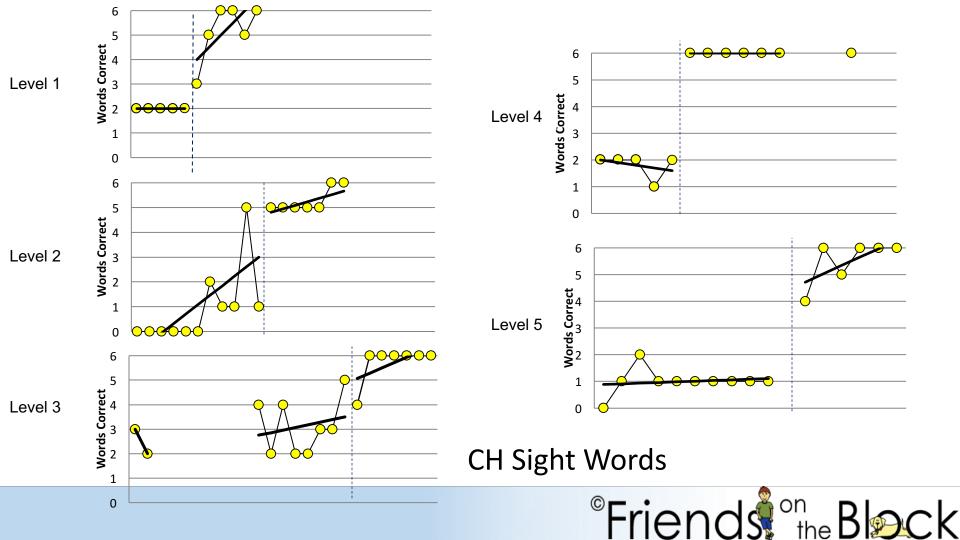


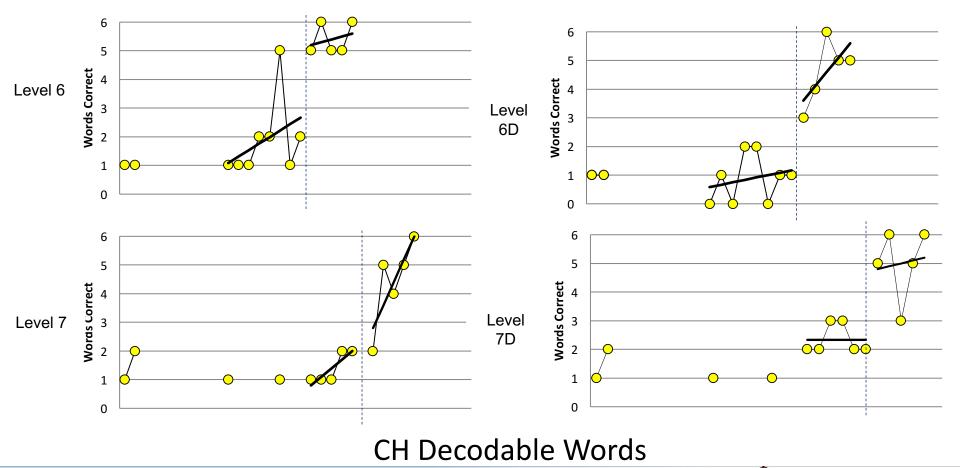
Summary of FOTB pilot studies

- Purpose: Statistically analyze and summarize the effects of the Friends on the Block literacy intervention on word recognition across 18 cases (students)
- Research Question: Within and across the 18 cases, what is the overall effect of the *Friends on the Block* literacy intervention across single case design studies on:
 - (a) sight word reading
 - (b) decodable word reading



Case (student)	Age	IQ ª	Starting Level	Ending Level	PPVT Age Eq	Disability	Total Dosage (hours)	Total Dosage (weeks)
AMM	9	42	6	9	2:06	Autism	26.48	27 weeks
AMT	11	70	1	4	5:11	ID/Speech Impairment	53.20	21 weeks
AJ	12	63	7	9	7:06	ID/Speech Impairment	49.75	21 weeks
CF	9	42	1	3	2:09	Down Syndrome	30.46	27 weeks
СН	10	43	1	7	5:04	ID/Speech Impairment	57.45	12 weeks/21 weeks
cs	7	55	1	3	3:04	Autism/Speech Impairment	20.50	21 weeks
EM	6	59	1	3	2:04	Smith-Lemli Opitz	31.96	27 weeks
JG	10	56	1	3	3:04	Down Syndrome	50.15	27 weeks
JH	11	52	1	6	6:01	ID/Speech Impairment	32.50	21 weeks
KC	10	47	6	7	3:06	Down Syndrome	57.08	27 weeks
KD	11	65	1	6	9:03	Speech Impairment	33.47	12 weeks/21 weeks
KR	9	41	3	5	2:07	ID/Speech Impairment	38.50	21 weeks
LB	9	70	1	3	5:03	Autism/ID/Speech Impairment	32.10	21 weeks
LD	12	65	8	14	5:04	ID/Speech Impairment	40.58	12 weeks/21 weeks
NW	10	88 ^b	7	11	7:05	Speech Impairment	32.10	12 weeks/21 weeks
SM	10	40	1	3	2:03	Smith-Lemli Opitz/Brain Tumor	30.66	27 weeks
SS	11	63	5	7	4:09	Down Syndrome	43.88	27 weeks
WB	13	40	1	3	4:07	Down Syndrome	54.55	27 weeks



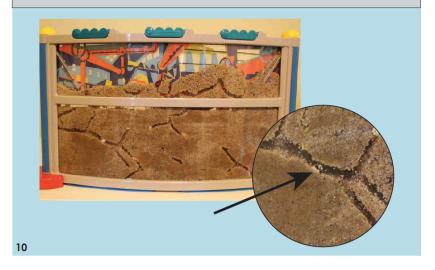


[©]Friends on Black

Sample Level 6 Text Ants are Fun! (non-fiction)

- Ants are very little, but ants can go very fast. Ants do not like to be in the sun. The ant is little, but he can be very fast.
- It is so little, but it can go fast. Look at it go. It is fun to see the ant run fast. The ant ran very fast.

When you bring an ant farm home, you need to fill it with sand. Then you can put the ants inside the farm. You can watch the ants dig in the sand. They will dig paths in the sand so they can move around in the ant farm.



My <u>ant farm</u> is here on the table. I have sand and

little black ants. The ants dug a big path in the sand. Look at that ant go up the path. He is not very big, but he can go up the path.

Conclusions

- Consistent moderate-to-strong positive effects for each case (i.e., student) and across all cases for both sight words and decodable words.
 - Mean effect sizes of 18 sight word cases ranged from 0.44 to 0.86, with an overall mean of 0.73.
 - Mean effect sizes of 8 decodable word cases ranged from 0.47 to 0.90, with an overall mean of 0.74.
- Demonstrated functional relationship between the intervention and increases in the numbers of sight words and decodable words read correctly.
- The average dose was 3.03 Instructional Lessons (SD = .45) and 1.83
 Reinforcement lessons (SD = 1.02) per week.
- All students progressed through at least two and up to six levels of the curriculum within a school year.



4 What Works Clearinghouse Practice Guide Recommendations Foundational skills to support reading for understanding in kindergarten through 3rd grade. http://whatworks.ed.gov.

- Teach students academic language skills, including the use of inferential and narrative language, and vocabulary knowledge.
- 2. Develop awareness of the segments of sounds in speech and how they link to letters.
- 3. Teach students to decode words, analyze word parts, and write and recognize words.
- 4. Ensure that each student reads **connected text** every day to support reading accuracy, fluency, and comprehension



Why did we decide to create a new curriculum? Just a few reasons...

- need for more books
 - especially ones that we be more meaningful to students with ID
 - needed more practice more books and more practice of high-frequency words within books
- challenge of transfer of skills developed lessons that match books more directly
- wanted levels so you could practice at one level for a while and rotate books, rather than repeating individual lessons or books



A very quick overview...

The **books** are the **heart** of the curriculum.

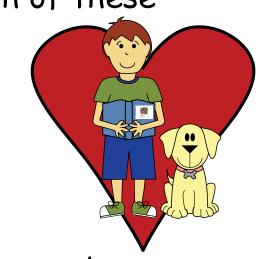
Scavenger Hunt: Find each of these in the student books.

What do you think is the purpose of each of these

features?

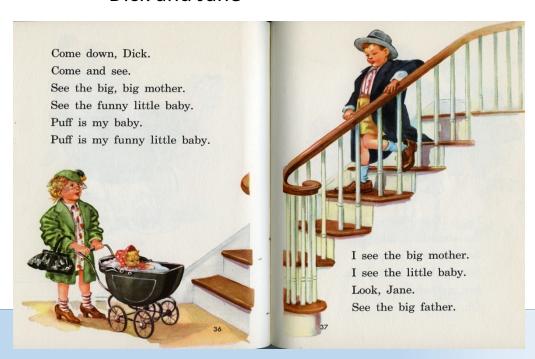
- 1. Helper Text
- 2. Read It Words
- 3. Sound It Out Words (Level 4 and higher)
- 4. Picture Words
- 5. Story Starter

How are they different from other early readers you have seen?



Friends on the Block Books: How are they different?

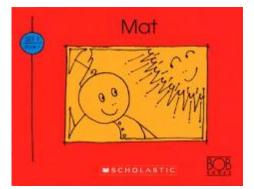
- Some books focus on high-frequency, or common, words
 - Dick and Jane

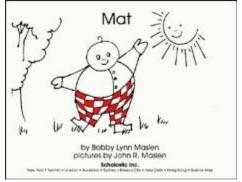


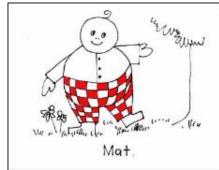
come down see funny little is

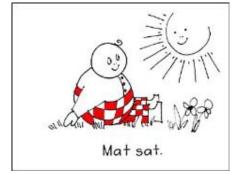


Some books focus on decodable words

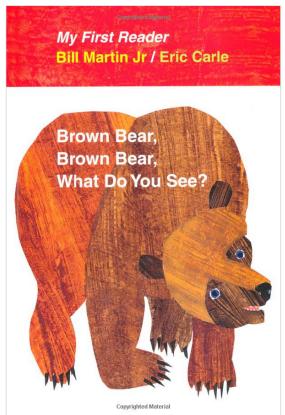


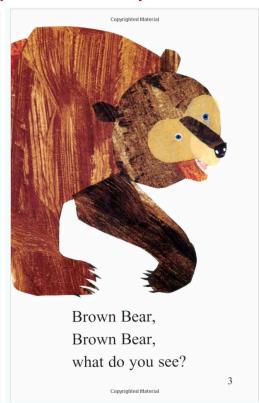






Some books focus on predictability and meaning





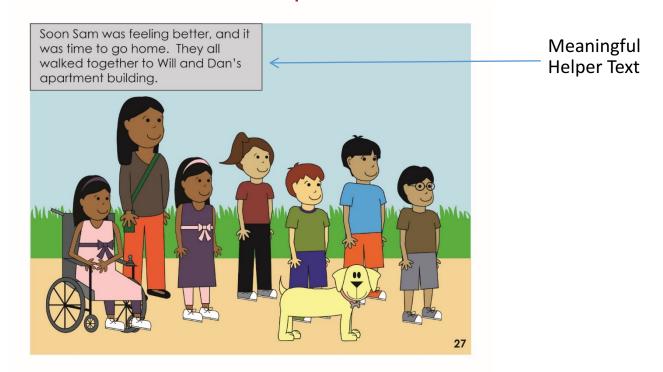




Research on Early Text: Multiple Criteria

- Critical Word Factor (measure of decodability and taught irregular words; Hiebert & Fisher, 2007)
- Look for readers with multiple criteria and scaffolds (Hiebert, 1999; Hiebert & Fisher, 2007; Cheatham & Allor, 2014)
 - Decodability
 - Word repetition
 - High-frequency words
 - Meaningfulness

How are Friends on Black books different? ...based on multiple criteria



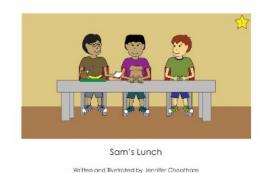
Books...

based on multiple criteria

Varied Sentence Structure Pam asked, "Dan, did you get a big cut? If it is a big cut, we Language similar to spoken language would help you take care of it." Decodability Dan said, "No, I did not get a big cut. Look at it. It is just a little scratch." High-Frequency Repetition (sight words)



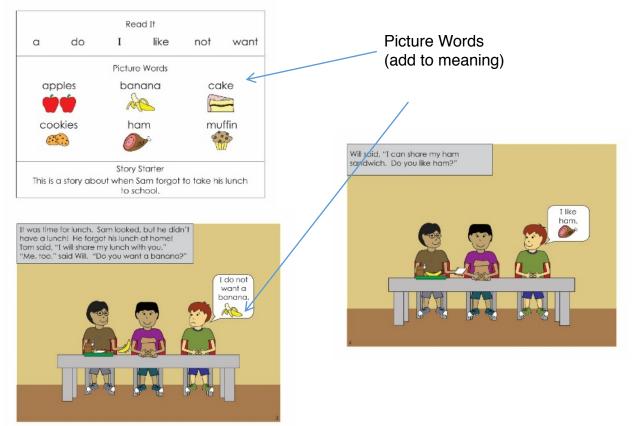
Sample Pages from Level 1 Book



Helper Text

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Teacher or tutor reads "helper text" and child reads text in conversation bubbles





Sample Pages from Level 4 Book



8 Page Books

Written by Jill Allor, Francesca Jones, and Ashley Sandoval

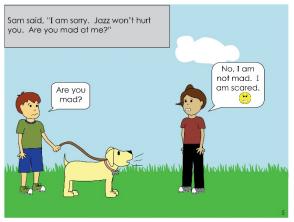
Illustrated by Jennifer Cheatham

Coortan 800 5 J.H. Alar Jenner F. Cheatham, and Jeobarde A Ordoo. All right reserved, No reproduction without prior writter is emission was strongforth of shared account.

Teacher/tutor/parent reads "helper text" in gray boxes and student reads text in white bubbles/boxes



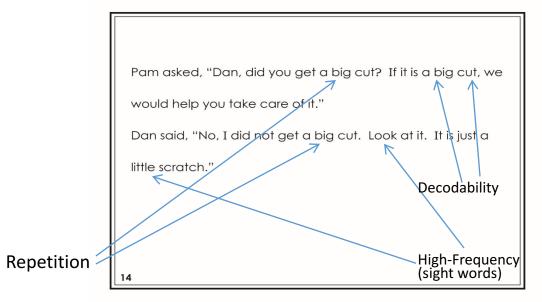
Includes Some Decodable Words





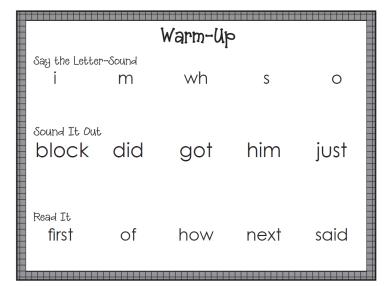


Sample Pages from Level 7B Book & Warm-Up



Varied Sentence Structure Language similar to spoken language

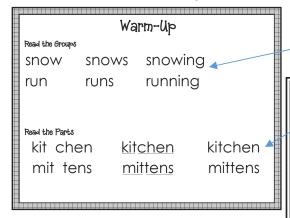
Explicit practice within Warm-Ups





Sample Pages from Level 9 Book & Presentation Book

Sound-spelling patterns & common word parts



Presentation Book

Book

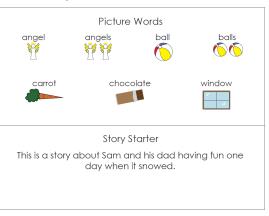
Lesson practice directly linked to books

Sam ran to tell his morn about the snow. She was still in bed. Sam said, "Look outside! It has been snowing! Everything has white snow on it! Will you please help me get ready to go outside? There are so many things I want to do."

Mom said, "Sam, I am not ready to get up yet. I think Dad went to the kitchen to make some eggs. You can ask Dad to help you."

"Dad is home?" asked Sam with a smile. Sam ran to the kitchen.

Picture support for key content words





Scope and Sequence Overview (FOTB)

Levels 1-3	Levels 4-5	Levels 6-8	Levels 9-12	
Listening Comprehension/Reading Comprehension/Vocabulary				
Sight Words				
letter sounds	letter sounds short vowel a	letter sounds all short vowels	advanced vowel patterns	
phonological awareness	link to print (alphabetic principle)	spelling/sounding out		
fluency with skills and passages				

Unique Feature: Target Sight Words and Decodable Words (see list)



WWC Recs #1 and #4: Book Reading Techniques

Foundational skills to support reading for understanding in kindergarten through 3rd grade. http://whatworks.ed.gov.

- 1. Teach students academic language skills, including the use of inferential and narrative language, and vocabulary knowledge.
- 2. Develop awareness of the segments of **sounds in speech** and **how they link to letters**.
- 3. Teach students to **decode words**, analyze word parts, and write and recognize words.
- 4. Ensure that each student reads **connected text** every day to support reading accuracy, fluency, and comprehension



At a Glance

Typical Lesson

- Warm Up (Direct Instruction style; very brief)
- Book Reading (read/discuss/review)
- Learning Game (target specific skills based on data/needs)

Book Reading

- Day 1: Predict and Read
- Days 2 and 3: Read and Discuss
- Day 4: Read and Review
- Day 5: Optional/Review



Sam's Lunch eacher's Guide



At a Glance Lessons

Day 1	Day 2	Day 3	Day 4	Day 5
Warm-up	Warm-up	Warm-up	Warm-up	
Predict and Read	Read and Discuss	Read and Discuss	Read and Review	Reinforcement
Think and Sort	Sam's Sounds	Super Sentences	Scavenger Hunt	

	Activities	Objectives
	Say the Word	Orally blend onset and rime into a spoken word
Warn-Up	Say the First Sound	Identify the first sound in spoken words
Nan	Say the Letter-Sound	Fluently say the sounds for taught letters/patterns
Ĺ	Read It	Fluently pronounce taught sight words
ng	Predict	Make predictions about a text; develop oral language
Reading	Read	Read text with increasing fluency
Book R	Discuss	Develop language and story comprehension
Bo	Review	Discuss and summarize a text using a graphic organizer
Г	Think and Sort	Develop language by sorting words based on meaning
Games	Sam's Sounds	Identify the first sound in spoken words
	Super Sentences	Read sentences fluently
Learning	Scavenger Hunt	Apply various skills in the context of a book
Lear	Amazing Words	Fluently pronounce taught sight words
	Blending Bingo	Orally blend onset and rime into a spoken word

Target Read It Words		
а	like	
do	not	
1	want	



General Correction Procedure

If students make an error, follow the *I*, *We*, *You* feedback procedure.

I: Listen. (The teacher models.)

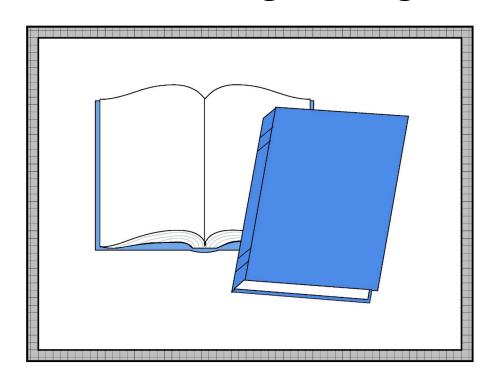
We: Say it with me. (Teacher and students practice together.)

You: Your turn. (The students practice independently.)

Repeat the row or or sentence.



Book Reading Strategies



Book Reading Options: Echo Reading

- For students with minimal skills or with a new level
- Typically used for students in early levels
- Highly scaffolded, so use only as long as needed

Reminder: Only the teacher (or tutor/helper) reads the Helper Text in the gray boxes.

- 1. Teacher reads a sentence, pointing to each word
- 2. Student "echoes" by reading the same sentence, pointing to each word

Error Correction:

I: Listen. (The teacher repeats the sentence, pointing to each word.)

We: Say it with me. (Teacher and students practice together.)

You: Your turn. (The students practice independently.)

Try it out

Repeat the row or or sentence.



Book Reading Options (cont.)

1:1 or Taking Turns

- Works well with very small groups; disadvantage is wait time
- Increases independence

Choral reading (unison)

• Highly scaffolded, so be careful not to overuse

Whisper reading

- Students read very quietly to themselves
- Teacher listens, rotating among students as needed
- Provides more practice; works well as students skills progress

Reminder: Only the teacher (or tutor/helper) reads the Helper Text in the gray boxes.



Book Reading Options: Error Correction

If student(s) miss a word (say wrong word or take longer than 2-4 seconds to say a word):

I: Listen. That word is _____.

We: Say it with me. (Teacher and student(s) say word.)
You: Your turn. What word? (Student(s) repeat the word.)

Reminder: Only the teacher (or tutor/helper) reads the Helper Text in the gray boxes.

Read the sentence again. (The student(s) reads from the beginning of the sentence.)

Notes:

- If students become frustrated, use echo reading for a while.
- May want to skip "we" step or shorten directions to:
 - That word is _____.
 - What word? (Student(s) repeats word.)
 - Read the sentence again. (Student(s) reads from beginning of the sentence)

Try it out



Book Reading Options: Paired Reading

Details

- Increases practice time and independence; strong research support
- Students need to be taught procedures
- Teacher role is the same (monitor closely; provide feedback)

Procedures

- Students take turns reading text with a partner
- When student is not reading, he/she is the "coach"
- Encourage students to use same correction procedure as teacher

That word is _____.

What word? (Student repeats word.)

Read the sentence again. (Student reads from the beginning of the sentence.)



More details...

Recommendation 4: Read connected text daily.

- 1. As students read orally, model strategies, scaffold, and provide feedback to support accurate and efficient word recognition.
- 2. Teach students to self-monitor their understanding of the text and to self-correct word-reading errors.
- 3. Provide opportunities for oral reading practice with feedback to develop fluent and accurate reading with expression.



WWC Panel Advice to Challenge

Obstacle 4.2. My beginning readers can only decode a few letter sounds, so they rely on illustrations to identify words rather than applying other word-identification strategies.

- Panel's Advice for responding to student errors
 - If word is decodable, model sounding out
 - If word is too difficult to decode (irregular or unfamiliar spelling patterns), provide the word and have student repeat the word and the sentence



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Think and Sort	Sam's Sounds	Super Sentences	Scavenger Hunt	

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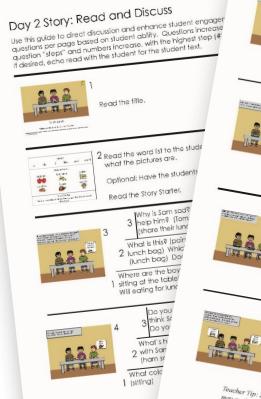
Target Read It Words				
а	like			
do	not			
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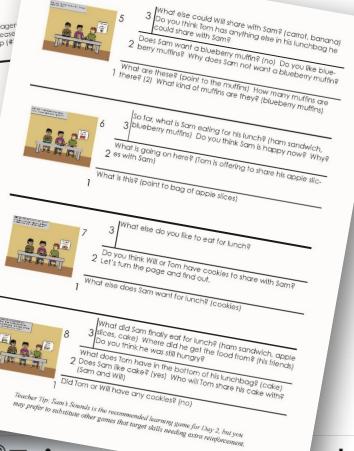


Days 2 & 3 Story

Teacher Prep:

- Choose a book reading option
- Select 1- 2 Dialogic
 Reading Questions to
 ask per page based on
 student ability.
- Addresses language development, including listening comprehension







Use dialogic reading techniques

Developing Children's Oral Language Skills Through Dialogic Reading

Guidelines for Implementation

Kylie S. Flynn

TEACHING Exceptional Children, Vol. 44, No. 2, pp. 8-16. Copyright 2011 CEC.



Make your own "helper" and "student" text

- Choose a favorite read-aloud book ("helper text")
- Write sentences for the student to read made up of words the student is working on
- You can add your own picture words, too
- Example
 - Words working on: a, do, I, like, not, want
 - Read-Aloud: Green Eggs and Ham
 - Write the following sentence on a large post-it:
 I do not like eggs.





WWC Recommendation #2:

Phonological Awareness/Letter Knowledge/Alphabetic Principle

Foundational skills to support reading for understanding in kindergarten through 3rd grade. http://whatworks.ed.gov.

- 1. Teach students academic language skills, including the use of inferential and narrative **language**, and vocabulary knowledge.
- 2. Develop awareness of the segments of sounds in speech and how they link to letters.
- 3. Teach students to **decode words**, analyze word parts, and write and recognize words.
- 4. Ensure that each student reads **connected text** every day to support reading accuracy, fluency, and comprehension



WWC Recommendation 2: PA, Letter Knowledge, Alphabetic Principle

- 1. Teach students to recognize and manipulate segments of sound in speech (phonological awareness)
- 2. Teach students letter-sound relations
- 3. Use word-building and other activities to link letter-sound relationships with phonemic awareness

Progression of Skills from Phonological Awareness to the Alphabetic Principle

	Blending	Segmenting
First Sound	Blend first sound and rime Teacher: /mmmm//at/ Student: mat	Isolate the first sound Teacher: mat Student: /mmmm/
Phoneme by Phoneme	Blend all phonemes Teacher: /mmmm//aaa//t/ Student: mat	Segment phonemes Teacher: mat Student: /mmmm//aaa//t/
Link to Letters	Decode CVC words (consonant-vowel- consonant) Student: sounds out and reads "mat"	Spell CVC words (consonant-vowel- consonant) Student: spells "mat"

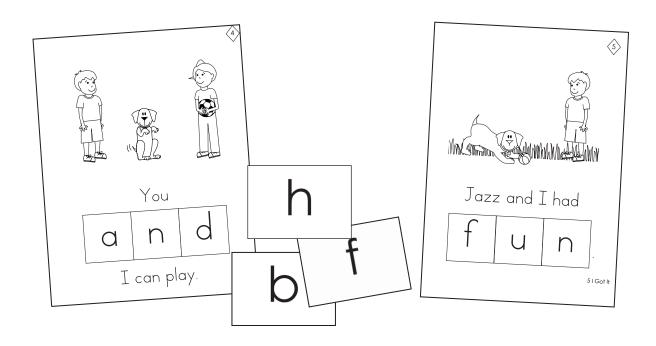


Blending Bingo: Demonstration





I Got It Game: Demonstration





More details...

Recommendation 3: Decode words, analyze word parts, and write and recognize words.

- 1. Teach students to blend letter sounds and soundspelling patterns from left to right (decode)
- 2. Instruct students in common sound-spelling patterns
- 3. Teach students to recognize common word parts



Recommendation 3: Decode words, analyze word parts, and write and recognize words.

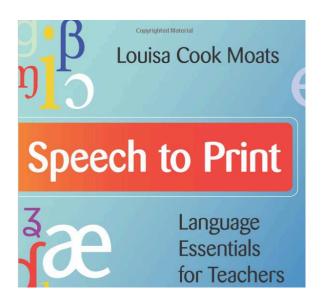
- 4. Have students read decodable words in isolation and in text.
- 5. Teach regular and irregular high-frequency words so that students can recognize them efficiently
- Introduce non-decodable words that are essential to the meaning of the text as whole words



Common Challenge

- difficulty blending (and segmenting)
- Tips:
 - stretch and connect
 - be sure you are pronouncing sounds correctly
 - include practice of words that begin with continuous sounds (e.g., fan, sat)

Resource: Background Teacher Knowledge

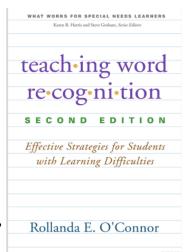


- Pronouncing sounds in isolation
- Recognizing spelling patterns
- Modeling blending and segmenting words into phonemes



Resources for Evidence Based Literacy Practices

- FriendsOnTheBlock.com
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 - if you go to "Contact Us" and let me know you were at DADD 2019, I'll give you access to some free electronic samples you can print and a few e-books
 - you'll need to set up a login on the website

