

**The Science of Reading Fluency:
Understand * Assess * Teach**

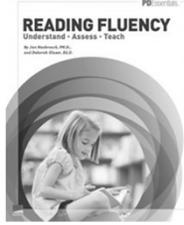
Jan Hasbrouck, Ph.D.
@janhasbrouck

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Reading Fluency

Understand * Assess * Teach

Jan Hasbrouck, Ph.D.
Deborah Glaser, Ed.D.



- Ch. 1 Defining Reading Fluency
- Ch. 2 Assessing Reading Fluency
- Ch. 3 Teaching Reading Fluency
- Ch. 4 Integrating Fluency Skills

**Benchmark Education
PD Essentials**
www.benchmarkeducation.com

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ILA Literacy Leadership
Brief 2018

**Reading Fluently
Does Not Mean
Reading Fast**

Jan Hasbrouck
Deb Glaser

<https://www.literacyworldwide.org/get-resources/position-statements>

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ALL reading skills
have **ONE** purpose:
To facilitate and support
COMPREHENSION
(and motivation)

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We Have a National Reading Crisis

Ed Week March 7, 2019

Jared Myracle Chief Academic Officer Jackson-Madison County Public Schools, TN
Brian Kingsley Chief Academic Officer Charlotte-Mecklenburg Public Schools, NC
Robin McClellan Supervisor of Elementary C&I Sullivan County Public Schools, TN

“We should declare a
No Shame Zone
for this work—to make it safe for all educators to say, *‘I have unfinished learning around literacy.’*”

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“We all have lots left to learn about reading fluency!”

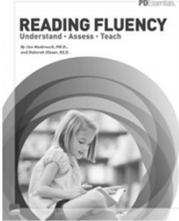
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Putting it in Perspective

p. 6-7



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p. 7

“Compelling evidence from a convergence of current reading research clearly indicates that **90% to 95% of all students can achieve literacy skills at or approaching grade level.**”

“...the (vast) majority of students can learn to read!”
intervention instruction, provided by well-informed and well-supported teachers. This instruction must be systematic, explicit, and intensive, and designed to appropriately integrate elements of oral language development, phonemic awareness, phonics and decoding, fluency, vocabulary

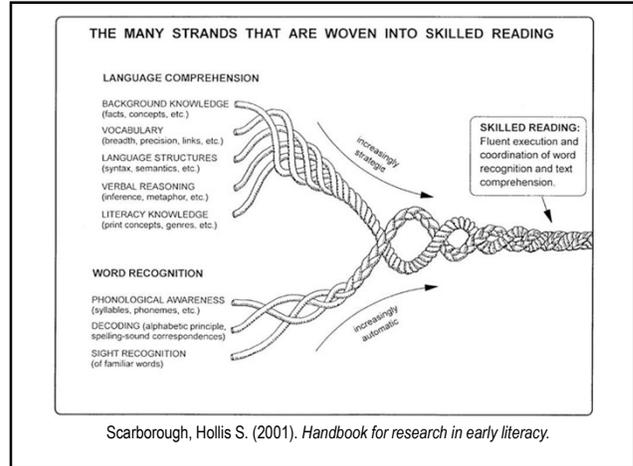
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“Reading is a highly complex task that involves many interconnected and codependent linguistic processes that draw upon a variety of separate skills.”

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Chapter 1:
Defining Reading Fluency
p. 9-17

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p. 9

“Many questions surround the definition of fluency as a concept...”

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p. 9

“We define fluency as:

- reasonably **accurate** reading,
- at an appropriate **rate**,
- with suitable **expression**,
- that leads to accurate and deep **comprehension** and **motivation**.”

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p. 11

“Using [a] blend of **science** and **practice**, we conclude...that the **performance standards** for [the] three components of fluency **should vary** depending upon the demands of the task.”

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p. 9

“We define fluency as:

- reasonably **accurate** reading,
- at an appropriate **rate**,
- with suitable **expression**,
- that leads to accurate and deep **comprehension** and **motivation**.”

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p. 11

Reasonably accurate?

F _____!

F _____! and

F _____! **ACCURACY** is the

F _____ of

F _____!

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Reasonably accurate?

Aim for at least _____%

Emerging readers? _____%

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Reasonably accurate?

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Appropriate rate?

Fluent reading should sound
like speech.

Stahl & Kuhn (2002)

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p. 22

ORF Norms for Grades 1-6

Percentiles for oral reading fluency (ORF)
norms on unpracticed, grade level text.

Hasbrouck & Tindal (2017)

An update to compiled ORF norms (Technical Report No. 1702)
Eugene, OR. Behavioral Research and Teaching, University of Oregon

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Appropriate rate?
____th%ile on oral reading fluency (ORF)
norms on unpracticed, grade level text.

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Appropriate rate (ORF)?

1 LIMITED EVIDENCE from research or theory or practice that suggest a benefit to reading significantly ABOVE the 50thile. Can be detrimental.

2 SIGNIFICANT EVIDENCE that it is crucial to help students read with fluency solidly at or very near the 50thile to support comprehension and motivation.

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Appropriate rate?

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Suitable expression?

Pitch, tone, volume, emphasis, rhythm

Typically mirrors spoken language and conveys meaning.

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Suitable expression?

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The **ROLE** of reading fluency

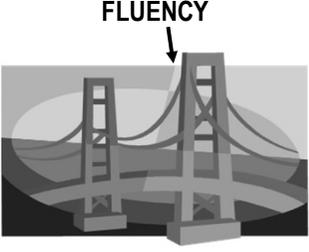
- A “bridge” between beginning and established reading
- A “doorway” to comprehension and motivated reading

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Bridge to Comprehension

Fluency forms the bridge between word identification & constructing meaning

FLUENCY



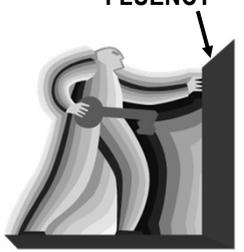
Pikulski & Chard (2005)

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Doorway to Comprehension

Fluency serves as a doorway between word identification & constructing meaning

FLUENCY



Hasbrouck & Glaser (2019)

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The Role of Fluency in Reading?

ACCURACY: Comprehension is limited by inaccurate reading (below 95%).

RATE: Comprehension is limited by inefficient, slow, laborious reading or reading too fast.

Lack of fluency = lack of motivation = fewer words read = smaller vocabulary = limited comprehension (*self-perpetuating*)

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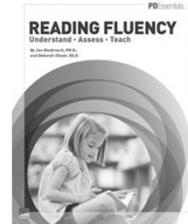
Reading Fluency

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Chapter 2:

Assessing Reading Fluency

p. 19-33



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3-part philosophy of assessments in schools:

1. We are probably doing *too much assessing!*
2. As professionals, we *must* conduct assessments to inform our work!
3. We must collect useful information as *quickly* and *efficiently* as possible!

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ORF Common Confusions

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ORF
Common
Confusion
1

Oral reading fluency (ORF)
measures fluency.

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Oral reading fluency
assessments were
MISNAMED!

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ORF essentially measures RATE
Automaticity? Hosp & Suchey (2014)



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To assess or diagnose the
complex **SKILL** of
reading fluency you must
listen to a student read
aloud, and...for more than
just 60 seconds!

Assess all three
COMPONENTS plus the
MECHANICS of fluency
as necessary...

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ORF
Common
Confusion
2

A higher ORF score is better

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Appropriate rate?

Fluent reading should sound like speech.

Stahl & Kuhn (2002)

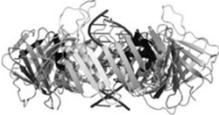
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ORF
Common
Confusion
3

We should REALLY be assessing comprehension

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Comprehension is very complex!

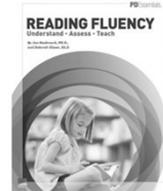
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Chapter 2:

Assessing Reading Fluency

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Curriculum-Based Measurement (CBM)

"...(ORF) has sufficient reliability and validity to make key decisions about students' reading performance."

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30+ years of research...

ORF measures have a moderate-to-strong correlation with reading comprehension

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CBM-R ORF Scores Correlate with Reading Comprehension

Fuchs, Fuchs, Hosp, & Jenkins, SSR, 2001

Measure	Validity Coefficients
Oral Recall / Retell	
Cloze	
Question Answering	
Oral Reading Fluency	

accuracy + rate measures predict **comprehension**

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ORF
Common
Confusion
4

Students with low ORF scores
need a fluency intervention

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ORF
assessments
function as a
thermometer

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ORF assessment as a thermometer:

- Both have proven reliability and validity;
- Can be used quickly;
- Provide “score” compared to a benchmark;
- NOT diagnostic; “One piece of the puzzle”

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p. 21

3 Big Ideas about fluency assessments:

1. Assessments of accuracy + rate (ORF) can help determine which students *might* need extra support;
2. ORF assessments can help diagnose a student’s individual skill level in reading fluency;
3. ORF assessments can help us determine if a student is making sufficient progress.

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All assessments should be conducted to answer a question...

...as *quickly* and *efficiently* as possible!

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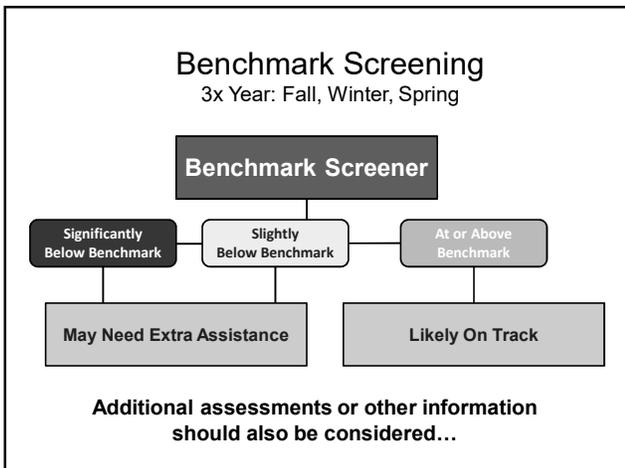
3 Big Ideas about fluency assessments:

#1. Assessments of accuracy + rate (ORF) can help determine which students *might* need extra support

WHO might need help?

Benchmark/Screening

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ORF as a **BENCHMARK/SCREENING** assessment:

- Number of words (or letter names or sounds) read correctly per minute

DIBELS 8 th Ed.	U of Oregon K-8
Acadience	Dynamic Measurement Group K-6
AIMSweb	Pearson K-8
easyCBM	Riverside K-8
FAST	FastBridge K-8

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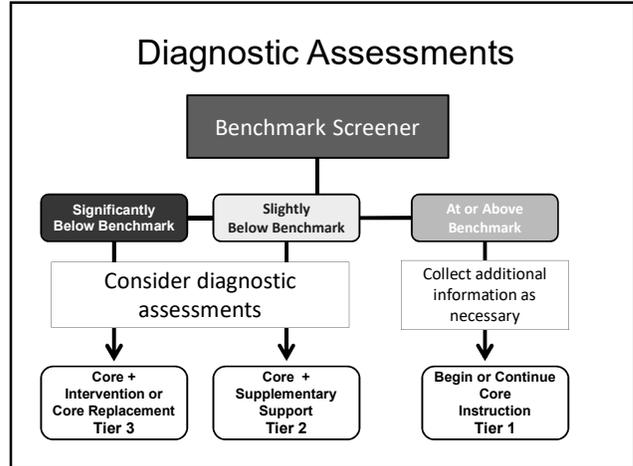
3 Big Ideas about fluency assessments:

#2. ORF assessments can help diagnose a student's individual skill level in reading fluency;

WHAT help do they need?

Diagnostic Assessments

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COMPONENTS of fluency:
Accuracy, rate, expression

MECHANICS of fluency:
WORD decoding skills, TEXT decoding skills, COMPREHENSION skills

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WEAK comprehension
pervasive patterns of difficulty in interacting with & constructing meaning from text

- Assess listening comprehension to determine strengths/weakness in vocabulary or language-related issues

WEAK fluency
more than 10 words below 50th %ile on H&T norms on grade level ORF

- Assess phonemic awareness & teach if necessary
- Assess phonics/decoding & teach if necessary
- Teach** fluency explicitly
- Teach** comprehension strategies
- Teach** vocabulary

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STRONG
comprehension

WEAK fluency
more than 10 words below
50th %ile on H&T norms
on grade level ORF

- Assess phonics/decoding & teach if necessary
- Assess sight word knowledge & teach if necessary
- **Teach** fluency explicitly
- **Challenge** with high-level comprehension and vocabulary

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WEAK comprehension
pervasive patterns of difficulty in interacting
with & constructing meaning from text

STRONG
fluency
at or above 50th %ile
on H&T norms
on grade level ORF

- Assess for language concerns
- **Teach** comprehension strategies
- **Teach** vocabulary

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STRONG
comprehension

STRONG
fluency
at or above 50th %ile
on H&T norms on grade
level ORF

- **Challenge** with high-level comprehension and vocabulary and spelling and writing!

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3 Big Ideas about fluency assessments:

#3. ORF assessments can help us determine if a student is making sufficient progress.

Is the work WORKING?

Progress Monitoring Assessments

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The science of progress monitoring:

- MORE research needed
- Schools must use MULTIPLE SOURCES of information to support decisions about progress
- All CBM scores are ESTIMATES
- CONFIDENCE INTERVALS must be used

Ardoin & Christ (2009)

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Many ways to determine progress:

- Daily performance in small group instruction; written work; in-program assessments

Tier 2 & Tier 3: consider CBM-R ORF assessments

- Monthly? Every 2 weeks?
- Graph progress: Wait for 5 consecutive scores

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Resources for CBM

The ABCs of CBM (2016)
Hosp, Hosp, & Howell

Center on Response to Intervention
rti4success.org

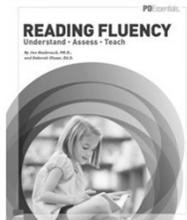


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Chapter 3:
Teaching Reading Fluency
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Chapter 4:
Integrating Reading Fluency Skills
p. 45-50



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Fluency instruction?

"The growth of reading fluency, in all its multifaceted glory, is an outcome of many different kinds of instruction...

...coupled with large amounts of carefully orchestrated reading practice."

Hudson, Lane, & Pullen (2005)

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Fluency instruction?

TRIPLE A!

- ACCURACY!
- AUTOMATICITY!
- ACCESS meaning!

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"It is critical that we establish...instruction that assist(s) learners in becoming **truly fluent** readers rather than just **fast** ones."

Kuhn, Schwanenflugel, & Meisinger (2010)

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Reading Fluency

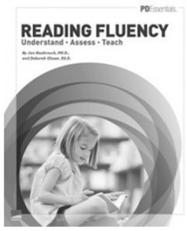
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Chapter 3:

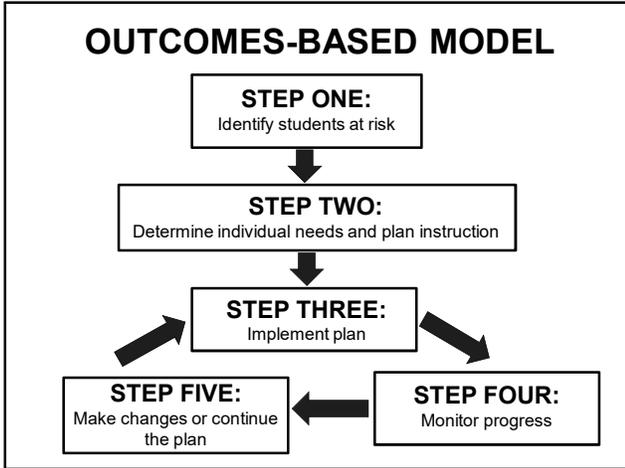
Teaching Reading Fluency

Outcomes-Based Model

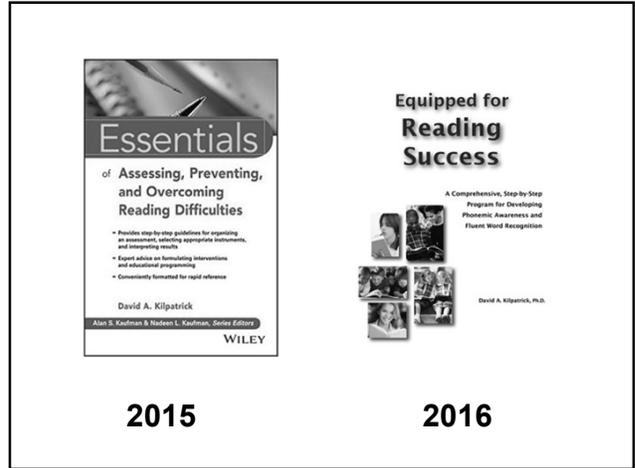
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Three Developmental Levels for Beginning Readers

Kilpatrick (2015)

- Level 1** Letter names and letter sounds
- Level 2** Phonic decoding
- Level 3** Orthographic mapping

“anchoring” the letter sequences in words to forming permanent mental orthographic representations (MORs) aka...sight words!

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high frequency words
 vs
irregular words
 vs
sight words

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a	and	away	big	blue
can	come	down	find	for
funny	go	help	here	I
in	is	it	jump	little
look	make	me	my	not
one	play	red	run	said
see	the	three	to	two
up	we	where	yellow	you

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all	am	are	at
ate	be	black	brown
but	came	did	do
eat	four	get	good
have	he	into	like
must	new	no	now
on	our	out	please
pretty	ran	ride	saw
say	she	so	soon
that	there	they	this
too	under	want	was
well	went	what	white
who	will	with	yes

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DIFFERENTIATED FLUENCY INSTRUCTION

ALL STUDENTS Tiers 1, 2, 3
In-class practice opportunities.

SUPPLEMENTAL & INTERVENTION
Tiers 2 & 3

Explicit, systematic, intensive, active instruction with supervised, sustained guided practice.



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Research on Fluency Instruction

- **Oral, guided** reading practice **with feedback** improves fluency for “typical” students.
- Provide feedback to correct **EVERY** error.

Small group instruction!
Across the grades!



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Passage Reading Practices to Improve Fluency

TRADITIONAL PRACTICE

Round robin reading
from science, social studies,
literature, chapter books

Students take turns
reading parts of a text aloud



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Disadvantages of Round Robin Reading

Drop everything and read: But *how*?
Jan Hasbrouck (Summer, 2006)

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Noah

18 year old HS senior

Dyslexic

One page from his daily
journal in English class...

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Today I was so embarrassed in English class again. When you said you were going to pass out the paper back out I know it was going to be bad. I can't figure out but the best kid in the class always get my paper! She make fun of my spelling and calls my name out in front of the whole class. Then she keeps pointing out my miss spelled words and all the kid around her laugh and look at me. This is not first time I have been in busset in class. I hate pep con reading and I just get there and freak out and can't listen to the story and then a kid calls on me and I have to say pass or just then Red in my faces. I hate English and hate thinking about it. These meals don't help me and I hate doing them. I'm not go to be a teacher or any job there no point in it. Spelling and Read are my disabilities and I get No help to get any better in it. The school don't help me and that why I hate school and all the kid who laugh at me. School just Herts me.

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ALTERNATIVES to Round Robin

- ✓ Choral Reading
- ✓ Cloze Reading
- ✓ Augmented Silent Reading
- ✓ Structured Partner Reading

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Augmented Silent Reading

Keep students **ACCOUNTABLE** during silent reading. Avoid **FAKE SILENT READING!**

PROCEDURE

- Pose a question before students read then ask for responses afterward
- Re-read (chorally?) to verify correct answer
- Wander and listen to individual students
- RCRC: Read Cover Recall Check



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Structured Partner Reading

PROCEDURE

- ASSIGN student partners
- Designate amount to read to partner
- When an error is heard, teach students to use the "Ask, then Tell" procedure:

ASK "Can you figure out this word?"

TELL "The word is ____." "Read the sentence again."

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Establishing Partners

- Avoid pairing highest and lowest skilled readers
- Consider taking lowest readers into a small group for practice with the teacher



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Establishing Partners

1. Ebonie	→	11. Michael
2. Jazmine	→	12. Andrea
3. Bobby	→	13. Ezra
4. Celisse	→	14. Juan
5. Marsha	→	15. Amy
6. Krishon	→	16. Hyun Ha
7. Sammy	→	17. Mari
8. Isaac	→	18. Harry
9. Orlando	→	19. Sarah Jane
10. Miquel	→	20. Ashley

21. Quan
 22. Kyesha
 23. Francisco
 24. Angelica

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6 Minute Fluency Practice

1. Select/prepare materials.
2. Select partners and **PRACTICE** the procedures
3. Ready, set, GO!

Minute 1: Partners get materials and get ready.

Minute 2: Partner #1 reads aloud; Partner #2 listens and track errors.

Minute 3: Debrief and Partner #2 gets ready to read.

Minute 4: Partner #2 reads aloud/Partner #1 listens and track errors.

Minute 5: Debrief and wrap up.

Minute 6: Partners clean up and get ready for next classroom activity.

Thanks to Gail Adams: *6 Minute Solution*

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Study Groups

INTRODUCE the concept of study groups:
 "This is a **GOOD** choice, used by **SMART** and **SUCCESSFUL** students-- in college!"

TEACH the lesson, introduce assignment, etc. to whole class

OPTION: Study group with teacher? Teams? Alone?

SOME students **ASSIGNED** "option"

- **Overly Confident?** Study group
- **Lack of Confidence?** Work alone or with a team or partner.

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FLUENCY INTERVENTION

THREE PART MODEL

- ✓ **ACCURACY**
- ✓ **RATE**
- ✓ **GRAPHING FOR MOTIVATION**

READ NATURALLY www.readnaturally.com

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FLUENCY INTERVENTION

PLACEMENT FIRST!

1. Place students in appropriate level:
CHALLENGING!
Placement Packet online
www.readnaturally.com



2. Assign wcpm goal:
Placement baseline **+ 30** for Gr. 1.5 to Gr. 4
Placement baseline **+ 40** for Gr. 5+

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FLUENCY INTERVENTION

(1) **FOLLOW A MODEL**

Reading along with a model of **ACCURATE** reading from an audio tape/CD or computer
OR a skillful reader



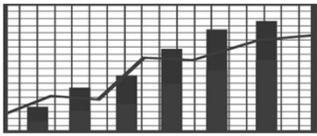
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(2) **REPEATED READING**

Students **REREAD** passage orally to themselves or a partner until goal achieved (4-10 times)

(3) **MONITORING PROGRESS**

Students **GRAPH** their performance:
“Cold” reading first- **BLUE**; then again after practice- **RED**



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THANKS YOU for attending!

TOGETHER, we can prevent the unnecessary pain of reading failure.



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