



Reading Comprehension for Older Students

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Why do we need reading comprehension instruction?

- Less than 20 percent of students comprehend what they read at or above proficient levels, with significant differences among demographic groups (Lapp, Grigg, & Tay-Lim, 2002).
- Forty-one states reported that only 18.7 percent of English language learners (ELLs) scored above state-established norms for reading comprehension (Kindler, 2002).
- The readability level of some text used in secondary classrooms may be too high for below-grade-level readers, and the “unfriendliness” of some text can result in comprehension challenges for many students (Mastropieri, Scruggs, & Graetz, 2003).

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What do we know about promoting reading comprehension?

- Many of the reading comprehension strategies with the highest effect sizes for students with LD teach students strategies that prompt them to monitor and reflect before, during, and after reading (e.g., Gajria, Jitendra, Sood, & Sacks, 2007; Gersten et al., 2001).
- Direct instruction, strategy instruction, or a combination of both, are associated with the highest effect sizes (e.g., Swanson, 2001).
- Yet many teachers do little to promote students’ reading comprehension.

Reading Comprehension and ELLs

- Many factors affect the reading comprehension of ELLs, such as:
 - language proficiency
 - vocabulary knowledge
 - ability to use comprehension strategies
 - differences in text structure
 - culture influences
 - interest
 - schema

ACTIVITY: ¿Por que es importante enseñar estrategias de comprensión?

Las Estrategias de Comprensión reflejan los procesos o tácticas mentales utilizados por lectores de gran habilidad cuando están activamente envueltos con el texto. La instrucción de las estrategias de comprensión está basada en la premisa de que aún los estudiantes que tienen dificultades entendiendo el texto se les puede enseñar con éxito a aplicar las estrategias usadas por los lectores de gran habilidad, y de que cuando los lectores que tienen dificultades aprenden a aplicar estas estrategias, su comprensión de la lectura mejorará. Las estrategias de comprensión benefician a todos los lectores, pero son esenciales para los estudiantes con problemas del aprendizaje.

Reading Comprehension Strategies

- Typically little attention is paid to teaching ELLs how to use comprehension strategies, even in the upper grades, because teachers tend to focus on word recognition, pronouncing words correctly, and answering literal comprehension questions.
- Teach BEFORE, DURING, and AFTER reading comprehension strategies.
- Provide opportunities for collaboration.

Influence of Schema

- Second language readers better comprehend and remember passages that either are compatible with their native cultures or are considered more familiar.
 - When texts are inconsistent with the reader's expectations, comprehension is negatively affected and recall may be distorted.
- Activating background knowledge improves comprehension.

The Importance of Background Knowledge (example)

- Group 1: Told that they were gathering information in order to rob a house.
- Group 2: Told that they were prospective home buyers.
- Both groups read the same passage describing a house.
- Results: Memory for information varied according to activated schema and prior knowledge.

(Pichert & Anderson, 1977; Goetz, et al., 1983)

Fill in the Blanks

The problems that confront p in raising ch from in to adult life are not easy to _____. Both f and m meet with many di in their concern for satisfactory pro from the e stage to later life. It is important that young ch have plenty of s and good f for healthy growth. B and g should not occupy the same b or sleep in the same r. They are often afraid of the d.

Raising Poultry

The problems that confront poultrymen in raising chickens from incubation to adult life are not easy to summarize. Both farmers and merchants meet with many difficulties in their concern for satisfactory promotion from the egg stage to later life. It is important that young chicks have plenty of sunshine and good feed for healthy growth. Banties and geese should not occupy the same barnyard or sleep in the same roost. They are often afraid of the dark.

Collaborative Strategic Reading



ACTIVITY: *Apoptosis in the pathogenesis and treatment of disease*

In multicellular organisms, homeostasis is maintained through a balance between cell proliferation and cell death. Although much is known about the control of cell proliferation, less is known about the control of cell death. Physiologic cell death occurs primarily through an evolutionarily conserved form of cell suicide termed apoptosis. The decision of a cell to undergo apoptosis can be influenced by a wide variety of regulatory stimuli. Recent evidence suggests that alterations in cell survival contribute to the pathogenesis of a number of human diseases, including cancer, autoimmune diseases, neurodegenerative disorders, and AIDS (acquired immunodeficiency syndrome). Treatments designed to specifically alter the apoptotic threshold may have the potential to change the natural progression of some of these diseases.

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Collaborative Strategic Reading

- Collaborative Strategic Reading (CSR) combines cooperative learning (e.g., Johnson & Johnson, 1989) and reading comprehension strategy instruction (e.g., Palincsar & Brown, 1984).
- CSR was designed to promote content learning, language acquisition, and reading comprehension in diverse classrooms that include English language learners and students with learning disabilities (Klingner, Vaughn, & Schumm, 1998).



- When the Miami-Dade County Public Schools Language Arts Director observed CSR for the first time, she said excitedly:

– *“You have worked out all the kinks. Reciprocal Teaching, as great as it is, just seemed too challenging to implement with an entire class. But you’ve figured out how to make it work. I love it. If the superintendent were to say that starting tomorrow every teacher in M-DCPS would have to implement CSR in order to keep their job in this district, I would jump up and down and shout ‘hallelujah!’”*

CSR: Goals

- To increase conceptual learning and the acquisition of content knowledge in ways that maximize students’ involvement.
- To enhance reading comprehension skills for all students and particularly those with learning disabilities or at-risk for reading difficulties.
- To provide access to the general education curriculum.



CSR: Overview

- Students of mixed achievement levels apply comprehension strategies while reading content area text in small cooperative groups.
- Initially, the teacher presents the strategies (preview, click and clunk, get the gist, and wrap up) to the whole class using modeling, role playing, and teacher think-alouds.
- After students have developed proficiency applying the strategies through teacher-facilitated activities, they are then divided into heterogeneous groups where each student performs a defined role as students collaboratively implement the strategies.



CSR

- Effective in culturally and linguistically diverse classrooms and in classrooms that include students with LD and other disabilities.
- Works in classrooms from 3rd grade through middle school, and can be used K-12 with adaptations.
- Leads to increased reading comprehension among high achievers as well as low achieving students and students with LD.
- Increases opportunities for meaningful communication about academic content in low-anxiety contexts.
- Potentially provides modified input for English language learners.
- Allows English language learners to draw on native language support from bilingual peers.
- Promotes on task student engagement in learning.

Research Support for CSR

- CSR has been researched in classrooms from 3rd grade through middle school, with positive results.

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Research Support for CSR (cont.)

- First study used modified reciprocal teaching (Palincsar & Brown, 1984) with middle school ELLs with learning disabilities (LD; Klingner & Vaughn, 1996):
 - After learning reading comprehension strategies, students either tutored younger ELLs with LD in the strategies or used the strategies while working in cooperative learning groups.
 - Students’ comprehension abilities improved significantly, according to the Gates-MacGinitie, a standardized comprehension test.

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Research Support for CSR (cont.)

- Fourth-grade students in three diverse classrooms implemented CSR with a unit from their social studies textbook.
 - Students performed at significantly higher levels on a standardized reading test than peers who did not use CSR (Klingner, Vaughn, & Schumm, 1998).

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Research Support for CSR (cont.)

- Reading comprehension, content learning, and vocabulary acquisition of bilingual (Spanish-speaking) ELLs in a fifth-grade classroom improved when students used CSR with their science textbook.
 - Students spent nearly all of their time engaged in academic-related strategic discussion and almost no time (less than 1 percent) engaged in procedural negotiation or off task.
 - Students assisted one another in understanding word meanings, getting the main idea, asking and answering questions, and relating what they were learning to previous knowledge (Klingner & Vaughn, 2000).

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Research Support for CSR (cont.)

- The achievement of students in five fourth-grade CSR classrooms was compared with students in five fourth-grade traditional classrooms. In all classrooms, most of the students were ELLs:
 - CSR students gained more than comparison students on the Gates-MacGinitie Reading Comprehension Test.
 - Low-achieving students in CSR classes showed the greatest gains.
 - Teachers with higher levels of CSR implementation (in quantity and quality) yielded greater gains in comprehension than CSR teachers with lower levels of implementation (Klingner et al., 2004).

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Research Support for CSR (cont.)

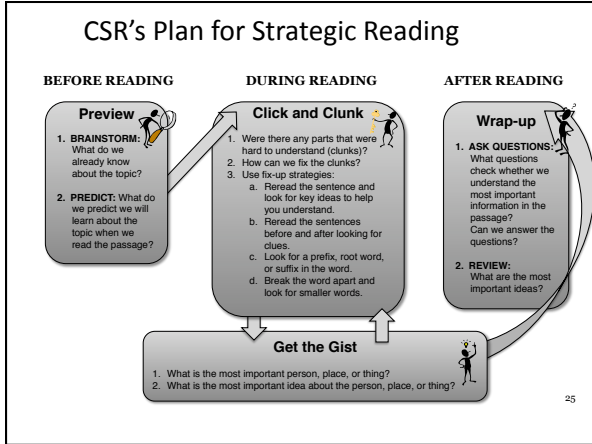
- Bryant, Vaughn, and others (1999) studied the role of three peer-mediated strategies (one of which was CSR) in improving academic outcomes for middle school students:
 - Average-achieving, low-achieving, and students with LD improved in accuracy of oral reading, word identification, fluency, and comprehension.
 - However, a subgroup of very poor readers made little or no gains in reading achievement.

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Research Support for CSR (cont.)

- In a follow-up study, a team of six seventh-grade teachers participated in a yearlong study that focused on the implementation of CSR with average-achieving students, low-achieving students, and students with LD in content area reading (Bryant, Ugel, Hougen, Hamff, & Vaughn, 1999):
 - Results indicated that CSR enhanced reading outcomes.

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CSR: Previewing

BEFORE READING

Preview

- BRAINSTORM:** What do we already know about the topic?
- PREDICT:** What do we predict we will learn about the topic when we read the passage?

- Students preview the entire passage prior to reading each section.
- The goals of previewing are:
 - To **build** and **activate** students' knowledge about the topic.
 - To learn as much about a passage as they can in a brief period of time.
 - To help students make predictions about what they will learn.
 - To motivate students' interest in the topic and to engage them in active reading from the onset.

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CSR: Click and Clunk

Students click and clunk while reading each section of the passage. The goals of click and clunk are:

- For students to monitor their reading comprehension.
- For students to identify when they have breakdowns in understanding ("clunks").
- To use "fix-up" strategies to figure out clunks.

DURING READING

Click and Clunk

- Were there any parts that were hard to understand (clunks)?
- How can we fix the clunks?
- Use fix-up strategies:
 - Reread the sentence and look for key ideas to help you understand.
 - Reread the sentences before and after looking for clues.
 - Look for a prefix, root word, or suffix in the word.
 - Break the word apart and look for smaller words.

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CSR: Click and Clunk (cont.)

Fix-up strategies:

- Reread the sentence without the word. Think about what would make sense.
- Reread the sentence with the clunk and the sentences before or after the clunk, looking for clues.
- Look for a prefix, root, or suffix in the word.
- Break the word apart and look for smaller words you know.

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Examples: Fixing Clunks




Sylvia: Pads.

Marcos: Pads es . . . clunk expert?

Carol: Read the sentences before or after the clunk looking for clues. OK. "Look at these bones that have pads of cartilage between them." It is saying that cartilage has something that is between them, something that protects them. OK, it is something that protects the bone.

Marcos: Pads es algo que protege los huesos (Pads is something that protects the bones).

Carol: OK, everybody understand now?



Albert: Who has a clunk?

Pablo: Calcium.

Albert: Try to read sentences in the back and in the front to try to get a clue. Think if you see any sentences in the back or in the front that can help you. Did you get anything?

Pablo: No.

Albert: OK, now I do, I get something. It is a tiny crystal-like mineral. Do you know what mineral is?

Pablo: Yeah.

Albert: What is it?

Pablo: It's like a kind of vitamin.

Albert: OK, calcium is a type of element that there is in the bones. And, the bones need that. Calcium helps the bones in order to make them strong. Do you now understand what calcium is?

Pablo: Yes.

Albert: What is it again, one more time?

Pablo: It is a type of element that helps the bones grow.

Albert: OK, good.

ACTIVITY: CLUNK PRACTICE

- Is there a middle ground between an obsession with aging and an intelligent commitment to a healthier lifestyle? How much time, money, energy, and angst should we devote to the fight against **senescence**?

- In Shakespearean drama, both tragic and comic, the storms and calamities that shake the **sublunary** globe are reflections of turmoil in the hearts of men.

- Among other preliminary activities, the prospective groom's party formally inquires as to the girl's clan-name; this is a ritualization of the taboo on **consanguineous** marriage.

DURING READING


CSR: Get the Gist

Get the Gist

1. What is the most important person, place, or thing?
2. What is the most important idea about the person, place, or thing?

Students learn to “get the gist” by identifying the most important idea in a section of text (usually a paragraph). The goals of “getting the gist” are:

- To teach students to restate in their own words the most important point as a way of making sure they have understood what they have read.
- To improve students’ memory of what they have learned.



ACTIVITY: GET THE GIST PRACTICE

Mount Lassen went off with a bang. The California volcano erupted in a series of explosions between 1914 and 1917. It threw out tons of hot ash, boulders, and melted rock called lava. The boiling lava melted the snow at the top of Mount Lassen. It made the earth beneath the snow turn into mud. The thick mud flowed down the mountainside like a river. It mowed down miles of trees in its path and filled meadows with up to 20 feet of mud.

Who or What

- Mount Lassen

Important Information

- The volcano erupted.
- It threw out hot ash, boulders and lava.
- The earth beneath the snow turned to mud.
- The mud flowed down the mountainside.
- The mud mowed down trees and filled the meadows with mud.

Write the gist in 10 words or less

- Mount Lassen erupted and caused damage.

The Structure of Chloroplasts

- The cellular organelle where photosynthesis takes place is called a chloroplast. Chloroplasts contain chemical compounds called chlorophylls that give these organelles a green color. When you observe a plant, all the green parts you see contain cells with chlorophyll and can carry out photosynthesis. In most plants, the leaves contain the most chloroplasts and are the major sites of photosynthesis.

Who or What

- Chloroplasts

Important Information

- The cellular organelle where photosynthesis takes place is called a chloroplast.
- Chloroplasts contain chlorophyll and carry out photosynthesis.
- Leaves contain the most chloroplasts and sites of photosynthesis.

Write the gist in 10 words or less

- Chloroplasts in cellular organelles contain chlorophyll that carry out photosynthesis.
- Chloroplasts contain the chlorophyll that carry out photosynthesis.
- Leaves have chloroplasts with chlorophyll molecules to perform photosynthesis.

CSR: Wrap-up

- Students “wrap up” by formulating questions about what they have learned and by reviewing key ideas.
- The goals are to improve students’ knowledge, understanding, and memory of what was read.

AFTER READING

Wrap-up

1. **ASK QUESTIONS:**
What questions check whether we understand the most important information in the passage?
Can we answer the questions?
2. **REVIEW:**
What are the most important ideas?



CSR: Wrap-up (cont.)

- Generating questions:
 - Students use question starters: who, what, when, where, why, and how (the “five Ws and an H”) to write questions at various levels:
 - Right there.
 - Think and search.
 - Author and you.
 - Other students try to answer the questions.
 - Students ask some questions about information stated explicitly in the passage and other questions that require students to make connections and inferences from what they have read.

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Questioning during Wrap Up

- Tasha: What might happen if your bones did not contain enough calcium?
- Anthony: They will break.
- Tasha: OK, they will probably break. But can we add a little bit?
- Natalie: Well, first of all, what is calcium? And then we can figure out what it says and how it helps the bones.
- Anthony: OK, calcium is something that keeps the bones healthy and stuff like that.
- Natalie: Tasha?
- Tasha: If you don't have enough calcium the bones will rot and you will be dead. And, then after you die you know your bones decay and you turn into dust. Your bones will like decompose in your body which will destroy and corrupt. If it does not have enough calcium, then the bones will get weak and break.
- Luis: OK, I would say the same thing because the bones without calcium are nothing.
- Natalie: All right, well, we finished this.

Activity: Questioning Strategy

- Read “Many Children Now Rely on Alternative Remedies”
- Write three questions:
 - 1. “right there”
 - 2. “think and search”
 - 3. “author and you”
- Ask and answer questions with a partner.

Many Children Now Rely on Alternative Remedies

By RONI CARYN RABIN, December 11, 2008, NY Times

One of every nine children under age 18 practices yoga, goes to a chiropractor, takes a supplement like fish oil or uses some other alternative treatment, according to a new government survey that for the first time included questions regarding children's use of complementary medicine. Natural, non-vitamin products are the most common alternative therapies used by children, with almost 4 percent taking a supplement like echinacea, fish oil, flaxseed oil, herb pills, prebiotics or probiotics, according to the survey, conducted by the National Center for Complementary and Alternative Medicine. “It's a substantial amount of use in children, given that children tend to be healthier than the adult population,” said Richard L. Nahin, acting director of the center's division of extramural research and co-author of the report. The survey's findings will help shape research initiatives, Mr. Nahin said, adding that many products, especially dietary supplements, have not been rigorously tested in clinical trials in adults or children even as their use has become more widespread. “In most cases, there is no clear recommendation one can make whether a child should use a product or not,” Mr. Nahin said. The single most influential factor driving children's adoption of alternative therapies appears to be whether their parents also use them. Children whose parents or relatives use alternative therapies are five times more likely to use them than children whose parents do not.

CSR: Cooperative Group Roles

- Once students are proficient in applying the comprehension strategies, they are ready to learn the CSR roles.
- Roles are important because cooperative learning works best when all group members have an assigned, meaningful task.
- Roles should rotate.
- Students can perform more than one role.
- Anyone can be a successful CSR.



CSR: Roles

- **Leader:** Leads the group in the implementation of CSR by saying what to read or which strategy to do next.
- **Clunk Expert:** Leads the group in trying to figure out difficult words or concepts.
- **Gist Expert:** Guides the group towards the development of a gist and determines that the gist contains the most important idea(s) but no unnecessary details.
- **Announcer:** Calls on different group members to read or share an idea. Makes sure everyone participates and only one person talks at a time.
- **Encourager:** Watches the group and gives feedback. Looks for behaviors to praise. Encourages all group members to participate and assist one another.
- **Timekeeper:** Keeps track of time.

CSR: Materials

- **CSR Learning Logs** enable students to keep track of learning and provide a springboard for follow-up activities. Logs furnish an additional way for all students to be active participants.
- **Clunk Cards** help students know what strategies to use when trying to figure out words they do not understand.
- **Click and Clunk Practice** sentences help students learn to figure out unknown words.
- **Cue Cards** explain the steps to be followed to fulfill each role when students work in groups. Cue cards help students stay focused and on task, and increase their confidence.



CSR Learning Log

Today's Topic _____ Date _____

Before Reading:
PREVIEW






After Reading:
WRAP UP



What I Already Know About the Topic	Questions About the Important Ideas in the Passage
What I Predict I Will Learn	What I Learned

During Reading:
CLUNKS

GISTS

Diario de CSR			
<i>El tema de hoy</i>		<i>La fecha</i>	
<i>El nombre</i>			
<p>Antes de Leer PREVISION</p> 	<p>Lo que ya sé acerca del tema de hoy:</p> <p>Lo que predigo que voy a aprender:</p>		
<p>Mientras de Leer PALABRAS CLAVES</p> 	1ª Sección del Pasaje	2ª Sección del Pasaje	3ª Sección del Pasaje
<p>Después de Leer EL TOQUE FINAL</p> 	<p>Preguntas sobre las ideas importantes:</p> <p>Lo que aprendí acerca del tema:</p>		

Clunk Cards	
<p>CLUNK CARD #1</p> <p>Reread the sentence with the clunk and look for key ideas to help you figure out the word. Think about what makes sense.</p>	<p>CLUNK CARD #2</p> <p>Reread the sentences before and after the clunk looking for clues.</p>
<p>CLUNK CARD #3</p> <p>Look for a prefix or suffix in the word that might help.</p>	<p>CLUNK CARD #4</p> <p>Break the word apart and look for smaller words that you know.</p>

CSR LEADER'S CUE CARDS		
<p>PREVIEW: S: We know that today's topic is _____. S: Let's brainstorm and write everything we already know about the topic in our learning logs. S: Who would like to share their best ideas? S: Now let's predict. Look at the title, pictures, and headings and think about what we might learn today. Write your ideas in your learning logs. S: Who would like to share their best ideas?</p>	<p>READ: S: Who would like to read the next section? CLICK AND CLUNK: S: Did everyone understand what we read? If you did not, write your clunks in your learning log. S: (if someone has a clunk): Clunk Expert, please help us out. GET THE GIST: S: Gist Expert, please help us out. S: Now we will go around the group and each say the gist in our own words. GO BACK AND DO ALL OF THE STEPS IN THIS COLUMN OVER FOR EACH SECTION</p>	<p>WRAP UP: S: Now let's think of some questions to check if we really understood what we read. Write your questions in your learning log. S: Who would like to share their best question? S: In our learning logs, let's write down as much as we can about what we learned. S: Let's go around the group and each share something we learned. COMPLIMENTS AND SUGGESTIONS: S: The Encourager has been watching carefully and will now tell us two things we did really well as a group today. S: Is there anything that would help us do even better next time?</p>

- ### CSR: Teacher's Role
- Provide explicit instruction in the CSR strategies and procedures to students.
 - Implement CSR 2-3 times a week.
 - Once students are working in groups, **circulate** and provide ongoing assistance.
 - Actively listen to students' conversations
 - Clarify difficult words
 - Model strategy usage
 - Provide encouragement
 - Conduct whole-class previews and/or whole-class wrap ups to introduce and/or review important concepts.
 - Conduct follow-up activities.

- Comments?
- Questions?

For more information...

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