



Indicator: All teachers encourage students to check their own comprehension. (4430)

Explanation: The evidence review confirms that reciprocal or comprehension teaching enables students to more readily remember what they have learned by thinking about how they might, if they were the instructor, “turn-around” teach the same content and skills that have been taught to them. When students learn to self-check for comprehension, they can begin to self-manage and organize both novel and previously acquired information and skills. Teachers may employ the “I Do, We Do, You Do” model for instruction where the desired lesson outcome is teacher-demonstrated, followed by teacher-guided practice opportunities for learners, then ending with learners having multiple chances for independent practice.

Questions: How will the Leadership Team know that teachers employ strategies that build students’ skills in self-monitoring their own comprehension? What evidence exists to confirm that teachers, when appropriate, use the “I Do, We Do, You Do” model of instruction? How will the Leadership Team know that teachers provide opportunities to students to “practice” teaching the content and skills that have been taught to them? What will the Leadership Team look for to determine that teachers encourage students to self-monitor their learning so as to bolster scholarly independence?

Developed by the late Ann Brown and others, “Reciprocal Teaching” is a third approach that can incorporate re-teaching when it appears necessary (Cawelti, 2004; Subotnik & Walberg, 2006). In the 1980s, cognitive psychologists sought teaching methods to encourage “meta-cognition” or “learning to learn.” In this approach, learners monitor and manage their evolving knowledge, skills, and understanding with self-management viewed as more important than simple acquisition. Teachers transferred some of the responsibility for explicit teaching functions of planning, allocating time, and review. It turned out that such self-teaching and self-monitoring of progress fostered learner independence, particularly of more advanced content.

How does reciprocal teaching work? It is not dissimilar to the old saying: “To learn something well, teach it,” which encourages learners to coherently organize material in preparation for teaching to make it clear and memorable to themselves and others. One practical way to accomplish this is to ask students to each master separate but interrelated parts of a challenging reading selection and organize it for presentation. They take turns, often in groups of two, in imparting the pertinent features of their part of the text. In reciprocal teaching, students learn planning, structuring, and self-management by assuming the planning and executive control ordinarily exercised by teachers (Walberg, 2007).

In his book *Visible Learning: A Synthesis of Over 800 Meta-Analyses Related to Achievement*, Hattie (2009) ranks the strategies for increasing achievement by their effect size, and the ninth listed (out of 138) is Reciprocal Teaching, which he says “was devised as an instructional process to teach students cognitive strategies that might lead to improved learning outcomes (initially in reading comprehension). The emphasis is on teachers enabling their

students to learn and use cognitive strategies such as summarizing, questioning, clarifying, and predicting, and these are ‘supported through dialogue between teacher and students as they attempt to gain meaning from text’ (Rosenshine & Meister, 1994). Each student takes a turn at being the ‘teacher’ and often the teacher and students take turns leading a dialogue concerning sections of a text. Students check their own understanding of the material by generating questions and summarizing. Expert scaffolding is essential for cognitive development as students move from spectator to performer after repeated modelling by adults. The aim, therefore, is to help students actively bring meaning to the written word, and assist them to monitor their own learning and thinking” (p. 203).

Marzano, Pickering, and Pollock (2001) elaborate on the four cognitive strategies mentioned above:

1. Summarizing: After students have silently or orally read a short section of a passage, a single student acts as a teacher (i.e., the student leader) summarizing what has been read. Other students, with guidance from the teacher, may add to the summary. If the students have difficulties summarizing, the teacher might give some clues, such as important items or obvious topic sentences, that aid in the construction of good summaries.
2. Questioning: The student leader asks some questions—designed to help students identify important information in the passage -- to which the class responds.
3. Clarifying: The student teacher tries to clarify confusing points in the passage, if there are any, and this might involve rereading parts of the passage.
4. Predicting: The student leader asks for predictions about what will happen in the next segment of the text. The student teacher can write them down on the blackboard or overhead, or all the students can write them in their notebooks (p. 43).

Similarly, “comprehension teaching” encourages students to measure their progress toward explicit goals. It can be described as a three-stage process of (1) modeling, where the teacher demonstrates the desired behavior; (2) guided practice, where the students perform with help from the teachers; and (3) application, where the student works independently of the teacher. Learners are encouraged to increase their self-awareness of their own progress and reallocate time for their weak points

when necessary. Comprehension teaching encourages students to measure their progress toward explicit goals (Walberg, 2007).

Redding (2006) encourages teachers to include in their direct teaching these follow-up steps:

- Teacher asks students to put new learning into their own words
- Teacher asks students to apply what they have just learned in solving a problem
- Teacher may ask class to recite memorized facts or passages
- Teacher utilizes the 6 Characteristics of Good Questions (Grossier, 1964) when conducting recitations. Questions are: Clear, Purposeful, Brief, Natural, Sequenced, Thought Provoking
- Teacher equitably distributes questions among students
- Teacher gives quick feedback about student responses

The teacher again is the decision maker, choosing appropriate questioning strategies, discussion, or inquiry to ascertain what the students have learned. The teacher is a master at questioning, balancing the factual recall questions with the higher order thinking questions to evaluate the extent and quality of the student learning during this session. The Show segment should end with a definite closure statement (a “ribbon” to tie up the package) to assist students in organizing the learning in their brains once again.

The teacher chooses appropriate questioning strategies, drilling, recitation, and summative discussion, or inquiry to ascertain what the students have learned and to help them rehearse it. The teacher balances the factual recall questions with the higher order thinking questions to evaluate the extent and quality of the student learning during this session. The teacher asks students to put new learning into their own words, to apply what they have learned to solve a problem, and/or to recite memorized facts or passages. The teacher equitably distributes questions among students. The teacher gives quick feedback to student responses. This phase should end with a definite closure statement to assist students in organizing the learning once again. (p. 101 & 94))

References and Resources

- Cawelti, G. (Ed.). (2004). *Handbook of research on improving student achievement*. Arlington, VA: Educational Research Service.
- Grossier, P. (1964). *How to use the fine art of questioning*. New York, NY: Teachers' Practical Press.
- Hattie, J. (2009). *Visible learning: A synthesis of over 800 meta-analyses relating to achievement*. New York, NY: Routledge.
- Marzano, R. J., Pickering, D. J., & Pollock, J. E. (2001). *Classroom instruction that works: Research-based strategies for increasing student achievement*. Alexandria, VA: The Association for Supervision and Curriculum Development (ASCD).
- Rosenshine, B., & Meister, C. (1994). Reciprocal teaching: A review of the research. *Review of Educational Research*, 64(4), 479–530.
- Subotnik, R. F., & Walberg, H. J. (2006). *The scientific basis of educational productivity*. Greenwich, CT: Information Age Publishing.
- Walberg, H. (2007). *Handbook on restructuring and substantial school improvement*. Charlotte, NC: Information Age Publishers.