

# **Specialized Instruction to Promote Learning and Study Skills**

Module 17

Thomas Monaghan, MS Ed

Old Dominion University



*Series Editors*

Irene Walker-Bolton  
Virginia Department of  
Education  
Richmond, VA

Robert A. Gable  
Old Dominion University  
Norfolk, VA

Stephen W. Tonelson  
Old Dominion University  
Norfolk, VA

Pat Woolard  
Old Dominion University  
Norfolk, VA

Copyright (c) 2012

This document can be reproduced and distributed for educational purposes.

No commercial use of this document is permitted.

Contact the Division of Special Education and Student Services prior to adapting or modifying this document for noncommercial purposes.

Virginia Department of Education Division of Special Education and Student Services

Web site: [www.doe.virginia.gov/special\\_ed](http://www.doe.virginia.gov/special_ed)

The Virginia Department of Education does not discriminate on the basis of race, sex, color, national origin, religion, age, political affiliation, veteran status, or against otherwise qualified persons with disabilities in its programs and activities.

*Mrs. Newton has noticed a steady decline in the academic performance of one of her students. Alex is a quiet student who keeps to himself, but is a hard worker. However, over the past couple of months he has grown more withdrawn, has been less motivated, and his grades are beginning to suffer. Through her observations of Alex's in-class behavior, she noticed some peculiar things. His note-taking was sporadic. At first, he would write down several sentences without breaks then stop entirely. His research papers consisted of strings of disjointed and unrelated sentences copied verbatim from a single source. On tests, he would stare at the sheet until prompted what to do. Even after repeating the directions several times he had to be regularly prompted to complete the test and oftentimes his answers made no sense. Troubled by this, Mrs. Newton asked Alex how he prepared for lectures, assignments, and tests and he just shrugged.*

---

### **Description of Learning and Study Skills**

Learning and study skills deficits are common traits among students with emotional disabilities. Unfortunately, these skills are necessary for academic success. These struggling students often have inadequate thinking and memory skills that lead to difficulties with 1) listening to lectures, 2) taking tests, 3) doing research, 4) retaining what was taught, and 5) taking notes. These skills must first be mastered before academic progress can be achieved. Studies consistently show that students who are taught methods to aid with their memory and thinking perform better academically. Special educators must understand the value and necessity to teach effective learning strategies and study skills for students with emotional disorders and to explicitly and systematically integrate skills instruction as part of content instruction (Yell, Meadows, Drasgow, & Shriner, 2009).

Teaching thinking skills is a critical component of acquiring learning and study skills. Thinking skills involves (a) modeling thinking skills, (b) teaching fact-finding skills, and (c) teaching divergent thinking. Teachers should model thinking skills by using 'think-aloud' strategies and teaching students to contemplate information and solve problems by introducing mnemonics such as HDYKT ("How do you know that?") when introducing new information (Algozzine, Ysseldyke, & Elliot, 1997). Ample opportunity for students to practice and careful monitoring by the teacher are also necessary for mastery of thinking skills, as well as effective learning and study strategies (Yell et al., 2009).

Once effective memory and thinking skills have been acquired, students can be taught learning strategies and study skills that will aid their academic progress. Applying meta-analytic

statistic procedures, H. L. Swanson identified nine research-based instructional practices that promote learning for students with mild disabilities. These methods include:

- Augmentation of instruction (homework, projects, etc.)
- Control of task difficulty
- Directed questions and response
- Drill, repetition, and practice
- Information segmentation
- Interactive groups
- Sequencing
- Strategy groups
- Use of technology (Swanson & Hoskyn, 1998).

Students with learning difficulties also benefit from explicit instruction. Explicit instruction borrows generously from the principles of the Direct Instruction program which incorporates the following critical principles:

- Sequenced skill objectives
- Sequenced lesson objectives
- Review of prior knowledge
- Reteaching content and skills
- Rigorous practice
- Frequent practice
- Teach to mastery
- Corrective feedback

Borrowing basic principles from Direct Instruction and explicit instruction, Learning Strategies Instruction allows teachers to teach meaningful skills that emphasize performance of the overall task instead of the individual steps. Instead of teaching each individual skill step to mastery before proceeding to the next, students learn each step simultaneously as one complete process. Through Learning Strategies Instruction, students not only learn specific skills to complete tasks, but also how these skills fit together into one comprehensive process (Boyle & Scanlon, 2010). According to Swanson, Learning Strategies Instruction is more effective than Direct Instruction or explicit instruction. However, both practices in combination are more effective than either method individually (Swanson & Hoskyn, 1998). The key to success for all these approaches is progress monitoring. Frequent and accurate monitoring of instructional strategies and behavioral interventions allows for more accurate evaluations of teaching practices and student performance. The results of progress monitoring can be applied toward strategy modification, augmentation, adaptation or elimination, as necessary (Boyle & Scanlon, 2010).

Mnemonics are a powerful memory enhancement tool for all students, not just those with emotional or learning disabilities. There are a number of mnemonic methods and strategies to aid memory including acronyms, acrostics, keywords, peg words, methods or place, rhymes, and songs. Mnemonics are similar examples or words from common or daily experience that can be used to describe or represent the concept to be remembered. Acronyms and acrostics are chunking strategies to remember concepts or sentences by using acronyms or acrostics, such as SQ3R and DREAMS. Keywords are words associated with topics and concepts that create a

mental picture of the concept and ties new information to prior knowledge. The peg word method pairs rhyming words to help students memorize numerical or ordered information. The method of place strategy involves associating a series of places to new concepts and information. Rhymes and songs help students remember concepts and information as catchy and easily remembered songs or rhymes (Yell et al., 2009).

*Test taking strategies.* Mnemonics are very effective test-study and test-taking strategies, especially the FIRST method. Students who employ a mnemonic test-taking strategy can expect a 10-30% improvement on their test scores. FIRST involves:

1. **F**orm a word by writing down the first letter of each word that needs to be recalled so that they form an easily remembered “real” word mnemonic.
2. **I**nsert lower case letters where necessary to create a word if the first letters from each word to be recalled do not form a “real” word mnemonic.
3. **R**earrange the letters if necessary to form a “real” word mnemonic.
4. **S**hape a memorable sentence using words starting with the first letter of each word to be recalled if creating a “real” word mnemonic proves too problematic.
5. **T**ry a combination of the first four steps to create a memorable word, phrase, or sentence if none of the individual steps is effective.

Another helpful mnemonic for test-taking is PIRATES:

1. Prepare for success by using **P**ASS: Put your name on the test, Allot an estimated amount of time to each section of the test, Say your test-taking affirmations, and Start the test within two minutes of receiving it.
2. **I**nspect the test directions by using **R**UN: Read each instruction carefully, Underline what the test tells you to do and where it indicates you to respond, Notice any special requirements to complete the test.
3. **R**ead each question carefully, remember what you studied then reduce the number of possible right answers by eliminating obvious wrong answers.
4. **A**nsWER the question and move on to the next question or abandon the question and return to it later.
5. **T**urn back to the abandoned questions after completing the final question and answer them using the **A**CE method.
6. **E**stimate or guess the correct answers by using the **A**CE method: Avoid absolute words (no, never, all, always, etc.), Choose the longest and/or most detailed answer, and Eliminate similar answers.
7. **S**urvey the test before handing it in to make certain all questions have been answered and change any answers only if you are absolutely certain they you have selected an incorrect answer. (Hughes, 1996).

Another helpful test-taking mnemonic for taking a multiple choice test is DREAMS:

- **D**irections must be read carefully for keywords before proceeding.
- **R**ead all answers before choosing the best one.
- **E**asy answers should be answered first, answer the difficult ones later.
- **A**bsolutes (no, never, none, only, all, always) are usually false.

- Mark each question after it has been answered.
- Similar and obviously false answers can be eliminated (Yell et al., 2009).

*Note taking strategies.* Strategic note-taking is a strategy that employs prompts and cues to aid students with poor note-taking skills to take effective and accurate notes. Teachers identify the topic prior to the lecture and establish a link between the lecture concepts and the students' prior knowledge. Creating a personal link to the subject matter helps to make the lecture content more meaningful to the students, thereby building interest in the lecture. Students are given special note-taking paper that helps organize the note-taking process. After writing down the topic, students note what they may already know about the topic. Students then note three to seven main points about the topic being discussed, with accompanying details as they are presented, followed by a brief summary before progressing to the next portion of the lecture. For review, at the end of the lesson the students list five major points with brief descriptions of each. Strategic note-taking lends itself to the development of information encoding skills which aids comprehension and selectivity of the lecture content (Boyle & Weishaar, 2001).

*Research skills.* Just as note-taking and test-taking skills are critical to the academic success of students with emotional disabilities, so are effective research skills. Research skills involve learning how to use the dictionary, encyclopedias, almanacs, periodicals, and other reference sources, either in print or online. Students with emotional disabilities can be easily overwhelmed and discouraged if they are unfamiliar with the research options available to them. Teachers can begin by introducing the basics of the school library or media center. Arrange for the librarian to give the students a tour, show the students the various types and formats of resource materials, demonstrate how to use each resource, and allow them some time to familiarize themselves with these research materials. Most of all, teachers must model how to conduct effective research and show that research can be an enjoyable activity (Yell et al., 2009).

Teachers should teach students research and fact-finding skills by using story maps, webs, and other visual organizers to better understand what is read. Question wheels can be a fun method to brainstorm topics by placing questions on a wheel and having students or teams of students spin the wheel and answer the question that turns up. To teach divergent thinking, teach K-W-L (“What do I **Know**?” – “What do I **Want to know**?” – “What did I **Learn**?”) to better understand the topic and what to learn from the topic or use Think-Pair-Share to solve problems and answer questions (students Think silently about possible solutions or responses, students meet in Pairs or groups to talk about possible outcomes, then each pair or group Shares their answers; Algozzine et al., 1997).

A useful research tool teachers can introduce is the mnemonic SQ3R:

- Survey the book, including the preface and table of contents, to gauge the content and estimate the time to read it.
- Question what the topic of the book is and what you are expected to learn from it.
- Read actively by checking predictions, looking up new vocabulary, and skimming nonessential parts of the book.
- Recite and retell the main topics and concepts in the book.
- Review the purpose and details of what was learned by rereading the book and answering chapter questions (Robinson, 1946).

## Discussion of Research that Supports Learning and Study Skills

The best way to understand learning difficulties is to first understand the stages of learning. As students progress through the stages of learning from entry level to application, they become active participants in the learning process. Students begin at the entry stage where knowledge and performance of specific topics and concepts is barely discernible or non-existent. As they are introduced to these topics and concepts they progress to the acquisition stage where knowledge is retained and topic-related tasks performed at a high-level accuracy (80-90%). At the proficiency stage, students can perform with a high rate of accuracy and fluency. The maintenance stage is the point when students' performance rate and accuracy can be maintained with little or no intervention from the teacher. Generalization occurs when students can apply the acquired knowledge or target behavior across multiple contexts, situations, and settings. Finally, the application stage is achieved when acquired knowledge and behaviors can be extended beyond learned contexts and situations (Rivera & Smith, 1997).

Students who employ effective note-taking skills are better prepared for quizzes and tests. These students can expect up to a 35% improvement on quiz scores over not taking notes; teachers who write down important information as they go—on a blackboard, whiteboard, smartboard, or other means—can expect about 85% of their students to transcribe what is written (Boyle, 2010). Additionally, students who did not take notes but reviewed a peer's notes prior to quizzes and tests performed as well as those who did take notes (Yell et al., 2009). Guided note-taking in particular enables students—with or without disabilities—to earn higher scores on tests and quizzes than their peers who do not (Boyle & Scanlon, 2010). Similarly, students who have been taught study and test-taking strategies tend to perform 10-15% better than their peers who have not. Studies have also shown that using the PIRATES mnemonic while taking tests has improved their performance on average by 10% or an entire letter grade. Students who employed the FIRST strategy to remember lists of words and other information on tests have shown improvement up to 30% on average (Hughes, 1996).

## When to Introduce Learning Strategies and Study Skills

Before study skills and learning strategies can be taught, students with emotional disabilities must first learn to listen. Secondary school teachers spend half of available class time lecturing, which requires students to be able to listen and transcribe what the teacher says into useable notes. Students with emotional disabilities can be taught listening skills in a variety of ways: 1) playing games like Simon Says, 2) giving oral tests with funny answers, 3) playing songs or audio books and have students retell the story or explain the main idea, 4) having students participate in a sound stories activity by playing four to six distinct sounds then have the students write a story recalling the played sounds, and/or 5) telling a story or presenting a lecture with an obvious factual error, or "choke," and have students identify the fallacy. Teachers can also prepare students for lectures by asking guiding questions, reviewing important terms and vocabulary, providing guided notes, introducing K-W-L organizers, making personal connections between the students' experiences and the lesson topics, encouraging active and hands-on participation, using an agenda, use visual aids, allowing ample time for questions, and re-teaching portions of the lesson as necessary (Yell et al., 2009).

Among other instructional models to cultivate a healthy learning environment, Cognitive Strategy Instruction (CSI) can be an effective learning method for students with emotional disabilities. At its foundation, CSI is based upon operant learning with principles borrowed from social learning theory and cognitive behavior modification. CSI involves analysis of not only the task, but also the thinking process to perform the task. CSI employs various strategies and principles to aid learning: cognitive modeling (teacher uses think-alouds), guided instruction (teacher offers verbal step-by-step instructions), self-instruction (students verbally guide themselves through the task), self-evaluation (students judge their own progress and proficiency), and self-regulation (students self-monitor their performance; Vaughn & Bos, 2009).

There are five stages or disciplines to CSI: strategy steps, modeling, self-regulation, verbalization and reflective thinking. Every task develops through a series of steps. Be it solving math problems, writing a short story, or conducting research, these activities follow a proper order and it is the responsibility of the teacher to teach the process of these activities using clear and concise instructions. Afterward, teachers must model the process while also verbalizing the thinking process required to accomplish the task so that students can familiarize themselves with the process. As students acquire proficiency with the process they can use self-talk to self-regulate their performance. In this respect, students become their own teachers as they self-evaluate their progress and make adjustments and corrections as necessary (Vaughn & Bos, 2009).

Verbalization is an important aspect of self-regulation. By utilizing self-talk, students repeat the teacher's instruction to help ensure successful completion of learned tasks. Teachers can encourage self-talk by modeling think-alouds and self-statements, introducing less challenging or familiar tasks, or allowing students to use cue cards as memory aids. When students take the time to reflect on what they are thinking, they are engaging in reflective thinking. Many students often fail to think before taking action. They often fail to plan, organize, and consider consequences. Thinking through a problem, contemplating possible outcomes, and deciding best options are critical components of learning. The goal of CSI is reflective thinking. When students are aware of the steps in a process they become active participants in learning. Tasks such as homework, projects, and tests become journeys instead of destinations (Vaughn & Bos, 2009).

Guidelines to consider while implementing CSI include:

1. Carefully analyze the target academic deficiency or behavior.
2. Identify any strategies the student is currently using.
3. Use similar strategy steps as those used by good problem solvers.
4. Collaborate with the student to devise appropriate strategy steps.
5. Teach prerequisite skills.
6. Use modeling, self-instruction, and self-regulation to teach strategy steps.
7. Provide frequent and explicit feedback.
8. Teach generalization of the strategy.
9. Provide supports to help the student maintain the strategy (Vaughn & Bos, 2009).

Another means of cultivating a supportive learning environment is the Strategy Instruction Model (SIM). SIM is an instructional system devised to help struggling students learn how to overcome their learning difficulties. The Learning Strategy Curriculum portion of the model consists of three strands: the acquisition strand, storage strand, and demonstration and expression of comprehension strand. The acquisition strand consists of strategies designed to help struggling



students learn and process information from written sources. The storage strand involves learning strategies that help students to record, organize, and retrieve learned information. The demonstration and expression of comprehension strand involves strategies to help students take notes, complete assignments, prepare for tests, and encourage expressive writing (Deshler, Ellis, & Lenz, 1996).

There are seven significant principles to the Strategy Instruction Model that aid students with the acquisition and generalization of learning strategies:

1. Teach pre-requisite skills before proceeding with formal instruction.
2. Rigorously and regularly teach and revisit learning strategies.
3. Emphasize personal effort to promote success and generalization.
4. Teach to fluency and mastery of each strategy.
5. Integrate strategy instruction throughout the curriculum.
6. Emphasize cognitive and metacognitive processes, such as paraphrasing, visual imagery, decision-making, and self-monitoring.
7. Emphasize generalization by modeling and practice in multiple contexts (Deshler et al., 1996).

The SIM includes an eight-step instructional sequence designed to promote the acquisition and generalization of learning strategies:

1. Gauge the present abilities of the student and the student's willingness to learn the new strategy. This is accomplished by administering an appropriate pretest, the results of which are evaluated and shared with the student. Discussion with the student regarding the test results and implementation of the strategy will lead to the student's willingness to commit to the strategy.
2. If the student chooses to commit to the strategy, describe the strategy to the student as a series of clearly defined steps, each of which is cued by mnemonic devices and establish concise and easily understandable goals. Student self-regulation or "ownership" of the strategy is emphasized to ensure success and generalization of the strategy.
3. Model the strategy to develop the cognitive thinking skills of the student by using "think aloud" methods while demonstrating the strategy. Essentially, teachers verbalize what the student should be thinking while they perform the strategy. Student participation while modeling is essential to gauge understanding and acquisition of the strategy and providing necessary feedback for proper implementation of the strategy.
4. Provide opportunities for student verbal elaboration and rehearsal of the strategy. During verbal elaboration, ask the student to describe the process of the strategy, the purpose of the strategy, and how the strategy will be of help in order for the student to comprehend the "big picture" in regard to the use and purpose of the strategy. The rehearsal process allows the student the opportunity to perform each step of the strategy to mastery before proceeding to the next step. The goal is for students to focus the application of the strategy, not the individual steps. Fluency of each step is critical for application of the strategy.
5. To build confidence and acquisition of the strategy, have the student first practice with less challenging materials. Using less challenging materials emphasizes practicing strategy techniques while minimizing potential frustrations. As the student achieves

proficiency of the strategy, increase the difficulty of the materials while providing ample praise and corrective feedback as warranted.

6. Once the student has demonstrated mastery of the strategy using incrementally more difficult materials, the student is ready to apply the strategy at grade-level. Use a variety of grade-appropriate materials and activities in multiple instructional and personal contexts so the student understands and appreciates the necessity of the strategy. Encourage student self-evaluation and self-correction while continuing to provide praise and feedback. Students must demonstrate mastery before proceeding to the step seven.
7. Administer a posttest to the student to gauge retention and proficiency of the strategy and the student's willingness to apply the strategy in multiple contexts. Review the results of the test with the student and provide feedback. If satisfactory proficiency of the strategy has not been achieved, provide for reteaching and additional practice. When mastery has been achieved, make a commitment with the student to generalize the strategy across setting, situations, and times then regularly monitor the student's progress.
8. Generalization of the strategy involves the student applying the strategy across multiple contexts. Generalization occurs over four stages. The first stage involves introducing and explaining the concept of generalization so the student understands the importance of using the strategy to achieve personal (not just academic) goals. During the activation stage, the teacher presents activities and assignments that require generalization of the strategy. The adaptation stage encourages the student to think about the cognitive processes and steps used while performing the strategy. Finally, the maintenance stage involves self-evaluation and occasional teacher monitoring to ensure long-term use of the strategy (Deshler et al., 1996).

In the age of standards-based learning, it is critical for students to acquire learning strategies in the content areas. The Content Enhancement Series is a set of routines (or set of practices) employed by teachers to aid struggling students with content-area learning. It is a program that relies on the principle that students learn more when they are actively engaged in instruction. These routines help teachers "enhance" instruction by identifying crucial instructional components, employing meaningful and engaging organization and presentation methods, addressing both group and individual student needs, maintaining the integrity of instructional content and materials, actively engaging the students in the learning process, and fostering and maintaining healthy learning practices. Teachers use instructional devices such as advance or graphic organizers to plan, present, and assist with content instruction. Content enhancement involves organized instruction presented in concrete forms tied to previously acquired knowledge, demonstrating how to distinguish between important and unimportant information, the explicit examination of relationships between pieces of information, and both teacher and student working together to apply methods and strategies to learn content-area information (Miller, 2009). Only by creating a supportive and encouraging learning environment can learning strategies and study skills take root and flourish.

## **Guidelines for Implementation of Learning and Study Skills**

Since secondary school teachers spend half their class time lecturing, their students need to learn effective note-taking skills in order to keep up with their studies (Yell et al., 2009). Note-taking is a cognitively-demanding activity. It involves a complex operation of paying attention to what is being said, keeping what is said in working memory long enough to decide what lecture points are important enough to write down, and writing them down quickly while simultaneously keeping up with the lecture. Studies have shown that students proficient with writing also possess a higher-level processing of lecture information in working memory. Executive functioning plays a significant role in a student's ability to switch attention back and forth between listening to the lecture and recording notes. Students need to possess the cognitive ability to process lecture content effectively and efficiently. Teachers can assist students with their note-taking by providing information in an organized manner which eases the note-taking process. Teachers can also provide students clear cues to signify important points of the lecture. Another successful method is writing essential points on a blackboard, whiteboard, smartboard, or overhead (Boyle, 2010).

## **Cautions Regarding Use of Learning and Study Skills**

Without proper instruction and modeling of learning strategies and study skills, students will continue to perform poorly. For instance, students with learning and emotional disabilities who were not taught proper highlighting skills lack ability to effectively highlight critical terms and phrases within text. Seventy to 90% of students were deemed unsuccessful at highlighting ability; 65% were incapable of highlighting the main idea or critical details of a particular text; 80% could not highlight essential phrases; and 75% could not highlight text in a manner conducive to effective learning and study. Selectivity is especially troublesome for students with disabilities. Strategic thinking deficits prompt many students with disabilities to highlight entire paragraphs due to their inability to determine the main idea, critical details, and important information. For those who showed selectivity, highlighted sections were of little value to learning or study. Many students with disabilities lack the ability to interact with the text and retrieve the critical information necessary to summarize and highlight the meaning and importance of the text (Englert et al., 2009).

Likewise, students with disabilities have significant difficulties with note-taking. Two problematic patterns emerge. One pattern is "passive copying" or copying entire passages verbatim. The lack of strategic thinking prevents effective selectivity while transcribing information so the student feels compelled to copy everything. The notes taken are in near identical format and content to the original presentation. Since no clear or succinct method of organization exists, the notes are not useful for study purposes. Another pattern is haphazard and disjointed note-taking. The student writes notes in essay-like format but bundles together conceptually similar yet unrelated details that do not belong together. Students with disabilities have trouble grouping related information and separating details into intelligible categories. These patterns illustrate that students with disabilities lack the awareness to recognize structural clues and to derive meaning from text, fundamental skills of note-taking necessary to produce precise and well-organized notes suitable for learning and study (Englert et al., 2009). Additionally, students who do take notes but fail to review them prior to quizzes and tests perform just as poorly as those who do not take notes at all (Yell et al., 2009).

---

## References

- Algozzine, B., Ysseldyke, J., & Elliot, J. (1997). *Strategies and tactics for effective instruction*. Longmont, CO: Sopris West.
- Boyle, J. R., & Weishaar, M. (2001). The effects of a strategic note-taking technique on the comprehension and long term recall of lecture information for high school students with LD. *Learning Disabilities Research & Practice, 16*(3), 125-133.
- Boyle, J. R. (2010). Note-taking skills of middle school students with and without learning disabilities. *Journal of Learning Disabilities, 43*(6), 530-540.
- Boyle, J., & Scanlon, D. (2010). *Methods and strategies for teaching students with mild disabilities*. Belmont, CA: Wadsworth.
- Deshler, D. D., Ellis, E. S., & Lenz, B. K. (1996). *Teaching adolescents with learning disabilities*. Denver, CO: Love.
- Englert, C. S., Mariage, T. V., Okolo, C. M., Shankland, R. K., Moxley, K. D., Courtad, C. A., Jocks-Meier, B. S., O'Brien, J. C., Martin, N. M., & Chen, H. Y. (2009). The learning-to-learn strategies of adolescent students with disabilities: Highlighting, note taking, planning, and writing expository texts. *Assessment for Effective Intervention, 34*(3), 147-161.
- Hughes, C. A. (1996). Memory and test-taking strategies. In D. D. Deshler, E. S. Ellis, & B. K. Lenz (Eds.), *Teaching adolescents with learning disabilities* (2nd ed.). Denver, CO: Love.
- Miller, S. P. (2009). *Validated practices for teaching students with diverse needs and abilities*. Upper Saddle River, NJ: Pearson.
- Rivera, D. P., & Smith, D. D. (1997). *Teaching students with learning and behavior problems*. Boston, MA: Allyn & Bacon.
- Robinson, E. P. (1946). *Effective study*. New York, N. Y.: Harper.
- Swanson, H. L., & Hoskyn, M. (1998). Experimental intervention research on students with learning disabilities: A meta-analysis of treatment outcomes. *Review of Educational Research, 68*, 277-321.
- Vaughn, S., & Bos, C. S. (2009). *Strategies for teaching students with learning and behavior problems*. Upper Saddle River, NJ: Pearson.
- Yell, M. L., Meadows, N. B., Drasgow, E., & Shriner, J. G. (2009). *Evidence-based practices for educating students with emotional and behavioral disorders*. Upper Saddle River, N. J.: Pearson.