

Academic Literacy: Principles and Learning Opportunities for Adolescent Readers

Jill Lewis

HIGHLIGHTS

- Academic literacy involves skills, dispositions, language, and relationships adolescents rarely experience in their out-of-school Discourse communities.
- Evidence suggests that students' academic literacy is not as well developed as their other literacies.
- Ten principles can guide curriculum development for adolescents' academic literacy.
- There are learning opportunities that integrate these principles and that encourage collaborative, reflective classrooms that promote academic literacy.

It's the first day of the fall semester. Fifteen college freshmen reluctantly enter my classroom, none with the course text that was available at the bookstore, and few with notebooks or other materials suggesting a readiness to learn. Most students have something (an iPod?) plugged into their ears. It's a diverse group of students: Hispanic, Asian, African American, Middle Eastern, and Caucasian; they range in age from 18 to mid-30s, some having waited until their children entered school to begin college. This is my Reading for College course, a class that underprepared college freshmen at my university are required to take at the

beginning of their college career. Regardless of their differences, as discussion and introduction to the course begins, it is clear that all of the students resent having to take this course. No one ever told them they had reading difficulties; their recent college admissions test revealed the deficiencies. This is a noncredit course, and students are angry that they have to pay tuition for it while not receiving anything that will count toward graduation requirements. I don't blame them, but they are not alone.

These students represent only a small fraction of the more than 60% of the freshmen at my university who need at least one remedial course at the time of their entrance to college, a typical number according to a study by ACT (2004a.). In 2004, 1.2 million high school graduates took the ACT Assessment, but only 22% achieved scores that would deem them ready for college in all three basic academic areas—English, math, and science. A similar report released by ACT in March 2006 found that only 51% were prepared for college-level reading (ACT, 2006a). A snapshot of universities across the country provides support for ACT's findings. According to the Ohio Board of Regents, one quarter of the 39,395 first-year college students at the state's 13 public universities during the 2003–2004 school year took at least one remedial course (Fields, 2006). In fall 1997, 65% of all New York City Board of Education (BOE) graduates who entered bachelor's programs (BA or BS) and 86% of all BOE graduates who entered associate's programs (AA or AS) failed one or more of the City University of New York's Freshman Skills Assessment Tests in the basic reading, writing, and mathematics skills. Fifty percent of those entering the City University of New York placed into remedial reading and 61% placed into remedial writing (Cilo & Cooper, 2000). Nearly a third of Colorado graduates who enrolled in the state's public colleges in fall 2004 needed remedial classes in mathematics, writing, or reading, according to the Colorado Commission on Higher Education (Gose, 2006). Is adolescent literacy achievement in the United States really as bad as these data suggest?

Some have remarked that this is a false picture. They say that politicians, industrialists, and media pundits have manufactured a crisis about public education and that when we look at the data more carefully we will see that students are doing at least as well now as they have always done (Berliner & Biddle, 1995; Bracey, 2006). Some argue that our students actually have higher levels of achievement than previous generations but that we are not using the right tools for assessment to gauge students' "new literacy" proficiencies. Consequently, we deem

our students deficient. Kist (2003) visited a number of new literacy classrooms and describes the assessment system he found:

Students are assessed on their product achievement and their process achievement and complete a portfolio of their work in multimedia form, essentially creating a kind of electronic portfolio system. Such an electronic portfolio can include scanned photos of student work in multimedia; checklists of student behaviors as they collaborate; video footage of each student working collaboratively; examples of “think-alouds” as students describe their processes of creating a product in some medium; and letters in which students self-reflect on how they believe they have reached their goals. (pp. 11–12)

He concludes, “Traditional paper/pencil achievement tests, which are taken in isolation and use print-based formats, are not going to assess the achievements needed by students as they move deep into the 21st century” (p. 12).

An equally compelling argument is that our students are truly falling behind when compared internationally, that our schools are failing our children, and that if this trend continues the United States will not be able to successfully compete in the international marketplace. This argument is bolstered by some interpretations of national and international test results. When compared internationally on the reading Program for International Student Assessment (PISA) tests, the U.S. 15-year-olds scored slightly below the international average (National Center for Education Statistics, 2004). These tests ask students to apply reading skills to reading materials that they are likely to encounter as young adults, including magazines and government forms. Our own national tests yield similar results. The Harvard Civil Rights Project (Lee, 2006) found that the average reading score gain on NAEP from 2002 to 2005 (post-NCLB) was null for grade 4 and minus 3 points for grade 8. In 8th grade, 29% of students tested below basic achievement levels. African American and Latino 17-year-olds were reading as well as white 13-year-olds by the end of 11th grade. The picture could be even more dismal, considering that 35% of the students who fail to graduate drop out between 9th and 10th grade and thus are not included in the data for 17-year-olds. Concern about student achievement on these assessments and about our nation’s future has spawned such federal initiatives as the America Reads Act, No Child Left Behind, and Striving Readers.

Can either of these two views serve as the basis for our education policies and instructional decisions for adolescent literacy? Should we

agree that schools and adolescents are doing just fine, thank you, and ignore naysayers whose real intention might just be to put a negative spin on public education? Or should we refute those who suggest it is the new literacies that we should use as the yardstick for measuring student achievement, and join the chorus of public education critics who push for an overhaul of our public schools?

I suggest that neither position is completely satisfactory or accurate. Adolescents have multiple literacies; they use different ones in different communities, including peer groups, church, and family. Literacies are always situated within specific social practices within specific Discourses (Gee, 1996, 2000). Some of these literacies are better developed than others, and competence is relative to specific contexts, communities, and practices (Kern & Schultz, 2005). Today's adolescents communicate well with their peers and, in fact, develop innovative uses of language, such as rap. There is evidence, however, that middle grade and high school students are not as accomplished in academic literacy, the kind of literacy needed for achievement on traditional school tasks and standardized assessments (Lewis, 1996). Reconciling this kind of literacy with other forms that students use in other contexts is challenging. Kist (2003) reports that for many of the new literacies teachers struggle with their own definitions of achievement. As these teachers attempt to create classrooms that honor and feature multiliteracies, they also see a widening divide between their own definitions of achievement and the official state or provincial definitions of achievement, ones that tend to promote print literacy exclusively.

Defining Academic Literacy

Bourdieu (1977b) explains that cultural capital derives from one's "habitus," which he defines as "a system of lasting, transposable dispositions which, integrating past experiences, functions at every moment as a matrix of perceptions, appreciations, and actions" (pp. 82–83). It consists of those cultural signals, dispositions, attitudes, skills, references, formal knowledge, behaviors, goals, and competencies that are rewarded within particular contexts, such as school, to achieve particular outcomes, such as high achievement or high aspirations (Bourdieu, 1977a). The culture of schooling requires academic literacy. It includes particular student–student and teacher–student interactions; formal skills and knowledge, including academic vocabulary and linguistic patterns; expectations for attention and participation; and a reward structure for

academic success. Influences outside of school, especially an adolescent's peers and family, will affect a student's habitus and shape that person's approach to schooling.

When our students come face-to-face with more traditional forms of learning (e.g. school learning), they need to use specialized academic literacy skills to comprehend and communicate about texts that are often decontextualized and disconnected from many students' experiences. Marzano (2004) considers academic knowledge as having a more narrow scope than an individual's general knowledge. Depending on students' prior experiences, including subjects taken in school and the quality of teaching experienced in those subjects, students may or may not have the topic and domain knowledge (Alexander & Jetton, 2000) needed for success in a particular academic environment.

Academic literacy is needed not only for college. According to Achieve, Inc., and the American Diploma Project (2004) and ACT (2004b), the skills required for workforce training beyond high school are similar to those expected of a first-year college student. In addition, it has been estimated that 85% of all jobs are now classified as "skilled," meaning that they require some education beyond high school. There does not appear to be support for the proposition that those not going to college need to be qualified to enter college credit courses in order to enter the workforce. However, Barton (2006) makes a strong case for advancing the academic skills of a high proportion of those high school graduates if they are to compete successfully for the higher paying jobs available to those without a college degree and to advance in such jobs. Thus when we design curricula to promote academic literacy, we may be moving students out of their comfort zones, but moving them to a place that is necessary for personally rewarding futures. Not to do so is a disservice to our students.

How Did We Arrive at This Place?

Minimally it appears there is a disconnect between literacies students use outside of school and the academic literacy they must demonstrate in school. Varied explanations are offered for this situation, including inadequate teacher preparation (Darling-Hammond, 2000; National Center for Education Statistics, 1999); failure of the teaching profession to attract the best and brightest (Rossi & Grossman, 2001); limited prior knowledge, experience, and motivation of students (Boldt, 2006); and the changing demographics, specifically that approximately 40

million people in the United States speak a maternal language that is not English (King & Goodwin, 2002).

There is also the issue of role clarification. Whose job is it to teach adolescents to read? Content area teachers believe they should be teaching their content, not literacy (Kamil, 2003). This attitude is exacerbated by the recent mantra that all children will be reading by the end of 3rd grade and the definition of high-quality teachers as those who have majored in the subjects they teach.

A very compelling explanation of weak student performance on state or standardized assessments is that many teachers' expectations of adolescents are too low and do not sufficiently challenge adolescents, especially those who struggle with academic literacy. Since Rosenthal and Jacobson's now classic research (1968), *Pygmalion in the Classroom*, an extensive body of research has been developed that describes how teachers' expectations can influence student performance. The effect of such behavior is cumulative, and over time teachers' predictions of student achievement may in fact become true. My own students tell stories of how their high school teachers didn't give homework, use textbooks, or provide much direct instruction. According to the students, the teachers "didn't think we could or would do it, so we just didn't try."

All of these explanations are reasonable and suggest multifaceted causality. But none offers a concrete on-the-ground solution. For this we need to look into classrooms, identify the literacy skills students need for academic success, and then integrate learning opportunities in our daily teaching to ensure that students learn and are able to apply them in learning events that are meaningful and worthwhile for adolescents' futures.

Guiding Principles for Developing Academic Literacy

Middle grades and high school students need ample opportunity to develop the reading and study skills needed for academic success. To this end, I recommend 10 principles that serve as a framework for designing instructional opportunities aimed at improving adolescents' academic literacy (Lewis, 1996, 2007). These principles apply regardless of whether we teach a content field, perhaps social studies, physics, business, mathematics, or literature, or have students in what is sometimes referred to as a basic-skills class in middle grades or high school. These principles assume that content teachers understand the role literacy

plays in comprehension of the content and students' construction of meaning and that integrated literacy instruction should be part of what occurs in the content class.

Principle 1. Students need high-interest and challenging reading material, with models, practice material, and longer selections drawn from sources that are commonly found in academic text. Each text we use should add to the knowledge base students will bring to other academic situations. Further, challenging materials will promote high expectations and give students a reality-based context in which to practice their increasing comprehension of sophisticated text. The positive impact of academically challenging high school programs is significant among African-American and Hispanic students (Adelman, 1999).

This principle is supported by research from ACT (2006b), which found that the ability to read complex texts is the clearest differentiator between students who are more likely to be ready for college-level reading and those who are less likely to be ready. Although most states don't define the types of reading materials to which high school students in each specific grade should be exposed or define complex texts, ACT (2006b) recommends a useful set of criteria, referred to as RSVP, for these materials.

- Relationships—Interactions among ideas or characters in the text are subtle, involved, or deeply embedded.
- Richness—The text possesses a sizable amount of highly sophisticated information conveyed through data or literary devices.
- Structure—The text is organized in ways that are elaborate and sometimes unconventional.
- Style—The author's tone and use of language are often intricate.
- Vocabulary—The author's choice of words is demanding and highly dependent on context.
- Purpose—The author's intent in writing the text is implicit and sometimes ambiguous.

We do not help students gain proficiency with academic texts if we avoid using them because we think students won't or can't read them. We need to scaffold with explicit instruction that guides students through comprehension of the text and construction of meaning. This principle applies equally well to all media.

Principle 2. Students need learning opportunities that develop critical thinking. It is our ability to engage in critical thinking that determines the extent to which we make assumptions, contemplate, question, and anticipate the implications of the decisions we make. Adolescents will need to problem solve and think critically whether in the workforce or at college. It is essential that they have opportunities to justify personal viewpoints, evaluate and modify their responses after discussion and review, and critique the responses of others. The results of ACT's National Curriculum Survey, completed by thousands of high school teachers across the country in 2003, suggest that high school teachers are more likely to teach higher-order critical reading skills to classes of students they perceive to be college bound than to classes of students they assume are not going to college (ACT, 2004b). This decision about who needs what ignores the reality that effective decision making and the ability to understand diverse points of view and meet literacy challenges are essential in all aspects of life.

Principle 3. Students need to experience process-oriented instructional approaches that encourage development of self-monitoring and metacognitive habits. Adolescents' comprehension will deepen when they have opportunities for self-monitoring in order to plan, implement, and evaluate their literacy, and to reflect on the thinking processes they use for constructing meaning. They will develop the habit of thinking about how they are processing and responding to ideas while they are reading, viewing, or listening to texts. Such opportunities will promote continuous self-assessment and flexible approaches to comprehending texts whereby students can adapt their strategies to accommodate the demands of the tasks and their purposes. In their synthesis of the literature on metacognition, Collins, Dickson, Simmons, and Kame'enui (1996) found four areas of convergence in the research: (1) Metacognitive knowledge facilitates reading comprehension. (2) Self-regulation facilitates reading comprehension. (3) Motivation may mediate students' use and benefit from metacognitive knowledge and self-regulation strategies. (4) Metacognitive instruction facilitates reading comprehension.

Principle 4. Students need learning opportunities that promote use of prior knowledge to facilitate prediction and comprehension. By preparing students for the texts they will encounter, students are helped to recall and organize what they already know about the topic and to an-

ticipate the content and focus of the material. Readers who possess rich prior knowledge about the topic of a reading almost always understand the reading better than classmates with low prior knowledge (Anderson & Pearson, 1984). But “when readers process text containing new factual information, they do not automatically relate that information to their prior knowledge, even if they have a wealth of knowledge that could be related. In many cases, more is needed for prior knowledge to be beneficial in reading comprehension” (Pressley, 2001, World knowledge section, ¶3). Our teaching must begin where the students are but demonstrate how to move beyond their existing knowledge to formulate new understandings.

Principle 5. Students need to have learning opportunities for integrating reading and writing. The processes of reading and writing are mutually supportive and interactive. Good readers tend to be good writers, and good writers tend to do well in reading (Strickland, 1991; Teale & Sulzby, 1986). Langer and Flihan (2000) provide this explanation:

Due to their different beginnings, research traditionally approached writing and reading as distinct areas of exploration. The 1980s marked a change in focus. Research began to examine the relationships between writing and reading as cognitive and social processes.... Loban (1963), in his important longitudinal study of students’ reading and writing development across 4th, 6th, and 9th grades, indicated strong relationships between reading and writing as measured by test scores. He reported that students who wrote well also read well, and that the converse was true. Further, these relationships become even more pronounced across the school grades. (A Brief History of Writing and Reading Research section, ¶5; Writing and Reading Relationships section, ¶2)

Our instruction needs to help students learn to use writing as a complement to their reading and other text experiences so they are able to clarify meaning for themselves.

Principle 6. Students need learning opportunities that provide for partnership and collaboration. Peer relations are critically important during adolescence. We can use their need for connection to instructional advantage by engaging students in collaborative projects. Even single text assignments with follow-up activities can provide several stopping points at which students can compare their responses with those of a peer or a group, modify answers, and consider alternative solutions. Such practice offers students the chance to think about their

comprehension processes and to understand their personal responses to the text, as well as to understand different perspectives. Johnson and Johnson (1986) found persuasive evidence that cooperative teams achieve at higher levels of thought and retain information longer than students who work quietly as individuals. Students are capable of performing at higher intellectual levels when asked to work in collaborative situations than when asked to work individually (Vygotsky, 1978). Equally, cooperative work can provide the means for developing leadership, building relationships, and enhancing communication skills.

Principle 7. Students need opportunities to learn that support a variety of learning-style preferences. Research has yet to provide a satisfactory scientific basis for teaching to specific learning styles. Nevertheless, we do know that individuals have preferences insofar as how they learn, and our questions and activities throughout our instruction should be varied to appeal to a range of these. We should include many visual models to accompany explanations of concepts, and we should offer multiple opportunities for discussing concepts and developing interpretations with peers to provide another avenue for learning. As students use the language of the text, they gain confidence in the use of new discourse patterns, concepts, sentence structures, and vocabulary that are common in academic settings.

Principle 8. Students need learning opportunities that allow them to assume responsibility for their own learning. To promote adolescents' control of their developing academic literacy, we need to encourage them to create their own summaries and graphic organizers that represent key ideas from academic texts. This process encourages students to take ownership of the ideas and to think about their wider application. Placing the locus of control within students enables them to realize that their own efforts make a difference in learning. Giving students this responsibility implies trust and confidence in them. Adolescents respond well to such respect and it generally promotes their enthusiasm for learning.

Principle 9. Students need learning opportunities that measure success using a variety of authentic assessments. Authentic assessments give teachers and students a more complete picture of student progress than do traditional assessments such as multiple-choice, short answer, essay, and standardized tests. Wiggins (1990) reminds us that "Traditional assessment, by contract, relies on indirect or proxy 'items'—

efficient, simplistic substitutes from which we think valid inferences can be made about the student's performance at those valued challenges" (¶1), and in contrast to the drill-type questions asked on traditional tests, "Authentic tasks involve 'ill-structured' challenges and roles that help students rehearse for the complex ambiguities of the 'game' of adult and professional life" (¶3, bulleted item 6). Authentic assessments inform teaching as well as learning. Thus the types of assessments Kist (2003) witnessed in the new-literacy classrooms and described previously would provide the kind of feedback that is needed for students and teachers. These assessments allow students multiple forms of representation of knowledge: film, music, and art. This would demonstrate teachers' respect for and celebration of individual diversity and learning.

Principle 10. Students need opportunities to use technology as a learning tool, not as an end in itself. Electronic technology and the Internet are transforming the way we organize and seek knowledge, replacing linear models with hypertext links that disregard disciplinary boundaries. When used properly, technology can support learning by providing opportunities for teachers to expand teaching approaches and it can engage students in new ways of learning. It is tempting to spice up instruction with video, PowerPoint presentations, and Web interactions, but how we use technology and encourage students to use it can determine whether this means for learning is productive and worthwhile. It must be relevant and interactive to the course work and help students learn how to be discriminating in their use of technology, especially the Internet.

Learning Opportunities to Address the Principles

With these principles in mind, we can begin to develop learning opportunities that integrate several principles simultaneously and that will increase students' academic literacy. All of the descriptions in other chapters of this book that describe ways to engage adolescents in literacy incorporate some of these principles. One difference in this chapter is that the learning opportunities I offer are designed specifically to address academic literacy, using a variety of texts. Further, many are tools for explicit instruction that would serve as adjuncts to popular techniques for developing adolescent literacy that may already be familiar, such as QAR, SQ3R, K-W-L, reciprocal teaching, guided reading, questioning

the author, graphic organizers, and think-alouds. The purpose for each learning opportunity is provided, along with the recommended procedure and the principles addressed.

1. Learning Opportunity: Survey of Academic Self-Esteem

Purpose: By completing this survey (see Figure 9.1), students can analyze their literacy strengths in academic settings and identify areas where they feel they might improve. Students can set goals for themselves and revisit this survey throughout the year to self-assess improvements and set new goals (Lewis, 1993).

Procedure: Administer this survey and ask students to be completely honest about themselves. Inform them that they will not be graded on this; it is a tool for self-development. Students might want to share what they have learned about themselves by doing this survey and discuss individual items more in depth. The class should take the lead on this.

Principles addressed: 8, 9

2. Learning Opportunity: Look Who's Talking

Purpose: To teach students to view texts from multiple perspectives and to comprehend what they contribute to an author's focus and conclusions. When students are given an opportunity to consider the multiple perspectives that could be taken on a particular event, they become more sensitive to the view that their ideas are not necessarily the only ones possible.

Procedure: Ask students to consider the following situation: A neighbor purchases a shiny, new, red BMW convertible. Ask students what might be an initial reaction of each of the following individuals to this purchase: a psychologist, a historian, an economist, an author, a teenager, an artist, an environmentalist, and a mathematician. Students easily recognize that each might think quite differently about this event. The artist, for instance, might notice the car's sleek lines, the shade of red, and the interior design. An economist might wonder how much the car cost and whether it was a good investment. The psychologist might be curious about the individual's motivation for this purchase, and so on. Ask students to then identify other situations in which there might be mul-

multiple perspectives. These might include reactions to objects, world events, and scientific discoveries. Once the idea of multiple perspectives is established, students can locate readings, videos, news stories, and other texts and identify possible perspectives for each.

Principles addressed: 2, 3, 7, 8, 10

Figure 9.1. Survey of Academic Self-Esteem

Directions: The survey that follows asks a series of questions that you should answer based on your experiences and your knowledge of yourself. Think for a few minutes about each question before you rate yourself. Be as truthful as possible. The information you obtain is to be used for your own benefit. It is not a test! You will not be graded on your answers.

Survey of Academic Self-Esteem

(Adapted from “The Effects of a Precollege Reading Course on the Academic Self-Esteem of Urban College Students,” by J. Lewis, Fall 1993, *Inquiries in Literacy Learning and Instruction* [College Reading Association Yearbook, pp. 47–55].)

Directions: For each item, circle the number that you feel best describes you as you are now. (1 = not true of me at all; 4 = very true of me)

1. I can successfully prepare to take exams.	1	2	3	4
2. I can figure out what will be asked on tests.	1	2	3	4
3. I have successful strategies for taking notes on lectures and reading assignments.	1	2	3	4
4. I know how to preview my textbooks.	1	2	3	4
5. I know how to come prepared for class.	1	2	3	4
6. I know how to mark and underline reading material for review purposes.	1	2	3	4
7. I know how to make predictions when I read.	1	2	3	4
8. I am able to answer questions in a classroom.	1	2	3	4
9. I am able to read a textbook with understanding.	1	2	3	4
10. I know when to slow down my reading rate for better comprehension.	1	2	3	4
11. I know how to use context to get the meaning of unknown words in academic material.	1	2	3	4
12. I have good strategies for thinking critically about things I have read.	1	2	3	4
13. I am able to figure out the main ideas of academic reading materials (for example, literature, business, social studies, science).	1	2	3	4

(continued)

Figure 9.1. Survey of Academic Self-Esteem (continued)

14. I am able to set purposes for my reading.	1	2	3	4
15. I can read and interpret maps, graphs, and charts.	1	2	3	4
16. I know how to create summaries and visual aids to help me remember what I have read.	1	2	3	4
17. I know how to distinguish between important and unimportant details when I read.	1	2	3	4
18. I am able to participate successfully in a classroom.	1	2	3	4
19. I am able to ask a teacher for help when I have a question.	1	2	3	4
20. I believe I will be admitted to the college of my choice.	1	2	3	4
21. I believe I have a lot of knowledge to share with others.	1	2	3	4
22. I believe I will graduate from college.	1	2	3	4
23. I believe I will have a successful future.	1	2	3	4

Survey Analysis

Let's analyze the results of your survey. The following chart shows the category into which different items fall. Place your ratings on the chart. Then respond to the questions that follow the chart.

Category	Question Nos.							
Study Skills	1	2	3	4	6	14	16	
Your Ratings	—	—	—	—	—	—	—	—
Reading Skills	7	9	10	11	12	13	15	17
Your Ratings	—	—	—	—	—	—	—	—
Participating in Classrooms	5	8	18	19	21			
Your Ratings	—	—	—	—	—			
Expecting a Successful Future	20	22	23					
Your Ratings	—	—	—					

Assessing Your Academic Self-Esteem

1. Based on the information you've obtained from this survey, what are your area(s) of greatest confidence? _____
2. In a few sentences, describe the academic self-esteem goals you would like to achieve this year. _____

3. Learning Opportunity: In My Own Words

Purpose: To prepare students for summarizing lengthy pieces of text; to help students understand the meaning of ownership of an idea and to accomplish this with texts that have complex language (Lewis, 2007).

Procedure: Choose written text that contains complex ideas and language. Select two or three key sentences from the text that students will need to rewrite in their own words after they have read the text. They may do this with a partner or a small group. The class should compare responses to (1) confirm comprehension of complex ideas, (2) recognize multiple ways the same idea can be expressed, and (3) develop new academic vocabulary. If students have changed the meaning of the text, discuss where the confusion may have occurred and have students revise their original rewritten sentence. Students can partner to create sentences or to compare their writing prior to class review. After working with single sentences that contain complex ideas, students should be able to transition to creating summaries of texts of increasing complexity and length.

Principles addressed: 1, 2, 5, 6

4. Learning Opportunity: Visually Speaking

Purpose: To develop students' abilities to interpret visual messages accurately and to create and respond to such messages.

Procedure: This is more of a series of lessons, rather than a single learning opportunity. Analyze the visuals students will encounter in their textbooks or other materials you plan to use. These might include bar charts, pie charts (or circle graphs), flowcharts, timelines, tables, line graphs, diagrams, photographs, maps, and artwork (Lewis, 2007). Identify the key features of the visual that you want to share with students. Based on the visual's features, ask students some of these questions that will direct them to closer inspection of the visual and facilitate comprehension: (1) Provide a quote from another source and ask, Does the visual support this quote? Why or why not? (2) Add to the visual another detail from this text. (3) What is your personal response to this visual? (4) Find two visuals on the same topic and ask, What differences do you see in the ways information on the same topic is portrayed

on the two visuals shown here? (5) With another two visuals on the same topic ask, How do the purposes of these two visuals on the same topic differ? (6) How does this visual help you to better understand your world? (7) How does this visual help you to comprehend the text? (8) Leave off some information from a visual of a table and ask, for example, What percentages do you predict will complete the last two columns? (9) What inferences can you draw from this visual? (10) What conclusions can you draw from this visual? (11) Paraphrase or summarize this visual. (12) How are the different parts of this visual related to each other? (13) Use this visual to create questions for a quiz. (14) Draw a sketch, graph, chart, or table for the information here. (15) Select two visuals from the same text where similar information is displayed differently and ask, What two things does Visual A tell you more easily than Visual B? What does Visual B tell you more easily?

Principles addressed: 2, 4, 6, 7, 8

5. Learning Opportunity: Websites for Me

Purpose: To teach students how to critically analyze websites for purpose, authenticity, authoritativeness/accuracy, author's assumptions and biases, recency, links to other sources, grammar and spelling, and visual content.

Procedure: Provide students with a set of websites they would find if they did a search on a particular topic. Ask a series of questions that involve students in identifying the purposes, biases, and authenticity of the sites (Lewis, 2007). Once students have worked with the sites you have provided, ask them to do a similar activity with sites they select on a topic of their choice (see Figure 9.2).

Principles addressed: 2, 4, 6, 7, 9

6. Learning Opportunity: Who Says So?

Purpose: To develop students' critical thinking about text, encourage an appreciation for levels of expertise, and discourage students from accepting only evidence that confirms their current beliefs or from ignoring evidence that does not agree with their current ideas.

Figure 9.2. Websites for Me

A. Below are examples of sites you might find if you did a search on the topic WOMEN IN THE MILITARY. Consider the point of view that each site might reflect as well as the authoritativeness of the information that each might provide. Then answer the questions below the list.

- a. American Women in Uniform, Veterans Too!
Military women—a history of military women from the Revolutionary War to present day. Information about combat issues, current women veterans issues, and extensive information about military women, past and present...ramblings of a self-appointed distaff critic who will continue to remind you that women are veterans too...and support for our young men and women in the military.
<http://coelacanth.aug.com/captbarb>
- b. Women in Vietnam
Interviews, articles, first-person accounts, and announcements of events of interest and research requests.
<http://www.illyria.com/vnwomen.html>
- c. Women in the United States Military
Women make up about 20 percent of today's military. Information and resources concerning women in the U.S. military, both in the past and the present.... Higher Positions for Women in the Military. Women are rising to increasingly higher levels in the Defense ...show that officer and enlisted women on active duty increased from 13....
http://usmilitary.about.com/od/womeninthemilitary/index_r.htm
- d. Center for Women Veterans
Women Veterans Comprehensive Health Centers.... Women in the Military.... VA Benefits and Services.... Gains made by women in the military continue through the 1970s and that trend remains....
<http://www1.va.gov/womenvet>
- e. Hot Topics—visionforum.org
If certain federal lawmakers have their way, your 18-year-old daughters will be registered for selective service and drafted for combat by the next war.... Christians have long since abandoned the issue of women in the military. Sadly, far too many pastors and...by permitting and perpetuating the practice of women in the military.
http://www.visionforumministries.org/issues/women_in_the_military
- f. GenderGap: Women & the Military
This is one woman's study of women around the world who have gone into combat during the last 6,000 years—now available online. Site includes a section on American Women and the....
<http://www.gendergap.com/military.htm>
- g. Linda Chavez: Sexual tension in the military. Townhall.com.
\$200,239 as of 2:15 PM Monday. More on National Security. Today's Opinion. Monday. Sexual tension in the military. Linda Chavez (archive) May 5, 2004.... Admit it, the increased presence of women in the military

(continued)

Figure 9.2. Websites for Me (continued)

serving in integrated units has made military.... While some advocates of women in the military have argued that women's...

http://www.townhall.com/columnists/LindaChavez/2004/05/05/sexual_tension_in_the_military

h. Military Resources: Women in the Military

Access to information on American history and government, archival administration, information management, and government documents to NARA staff, archives and records management professionals, and the general public.... Military Resources: Women in the Military. African-American Women in Military History. From the Air University Library...World War II. Women in Military Service for America Memorial

<http://www.archives.gov/research/alic/reference/military/women.html>

i. Untitled Document

Their Own Self. FRED Columns. Women in the Military. More Letters from the Field. About our policy of putting women into military jobs for which they are not suited: It isn't working. It isn't coming close...telling the politicians what they want to hear: that women in the military are working out....

<http://www.fredoneverything.net/MoreWomenLetters.shtml>

Your Ideas About These Websites

Carefully read each question below, and then circle all of the websites that you think apply. Be sure you are prepared to justify your answers.

1. Which of the websites listed above might include very positive remarks about women serving in the military?
a. b. c. d. e. f. g. h. i.
2. Which of the websites listed above will probably contain more opinion than fact?
a. b. c. d. e. f. g. h. i.
3. Which of the websites listed above will probably contain a good deal of statistical information?
a. b. c. d. e. f. g. h. i.
4. Which of the websites listed above will probably give primarily historical information about women in the military as well as information about this issue in the present?
a. b. c. d. e. f. g. h. i.
5. Which of the websites listed above are most likely to be representative of the U.S. government's view about women in the military?
a. b. c. d. e. f. g. h. i.
6. Which of the websites listed above will most likely limit its content to one war?
a. b. c. d. e. f. g. h. i.

B. Visit two of the websites listed above and, for each, comment on the following:

Links to other sources
Grammar and spelling
Visual content

Procedure: Provide students with characteristics of expert, informed, and unsupported opinions (see Lewis, 2007): (1) Expert opinion: Often firsthand research, for example, a music historian on the influence of the Beatles, or a paleontologist on animal extinction. (2) Informed opinion: References to data sources, historical references, use of visual aids. (3) Unsupported opinion: Sweeping generalizations, stereotypes, unsupported claims. Provide examples for each. Then give students statements and ask them to explain what would be needed to make the statement an expert, informed, or unsupported opinion. For example, you could provide the statement, “Teenagers who do chores at home will get better grades in school than those who don’t do chores.” Students might suggest for expert opinion, “I interviewed and examined the report cards of 50 students at my school and found that those who had to do chores at home got better grades.” For informed opinion they could create a sentence such as “A report in *Time* magazine reported that students had better grades in high school when they had responsibilities at home for such things as taking out the garbage.” An unsupported opinion might be, “I don’t think teenagers will do better in school if they have to do chores at home.” When students work with texts, encourage continued application of these distinctions.

Principles addressed: 1, 2, 3, 4, 5

7. Learning Opportunity: Drill Down

Purpose: This is a management tool used to help an individual or group analyze a problem by breaking it down into its component parts (Manktelow, n.d.). It can be usefully adapted for developing students’ academic literacy.

Procedure: Students might consider such problems as music piracy, illegal immigration, relationships in a novel or play, or global warming. Students write a statement of the problem on the left-hand side of a large sheet of paper. The problem might have appeared in written text, in a film, or in a talk students heard. Then, a little to the right of the statement, students write down the points that make up the next level of detail on the problem. These may be factors contributing to the problem, information relating to it, or questions it raises. Students can next create a semantic web to illustrate the component parts. This process of breaking the problem down into its component parts is called drilling down. As

students work with the problem, they can conduct research on the nature of the problem, its causes, effects, solutions tried (and why they may not have succeeded), and their own solutions.

Principles addressed: 1, 2, 4, 5, 6, 7, 8, 10

Conclusion

Our personal goals for teaching adolescents are varied, but the idea of teaching implies that those whom we teach will learn. For adolescents to develop mature understanding and to think critically and compassionately about their lives and those of others, we must commit to moving them beyond their present knowledge, skills, dispositions, and interactions to new ideas, attitudes, and experiences. A focus on academic literacy can provide this momentum and simultaneously build for each student a positive sense of self and possibility. As teachers, we should do no less.

Questions for Reflection

1. Reflect on your own experiences as a middle grades or high school student. Which teachers did you most admire? Why? What did these teachers expect of you? Which principles of instruction described in this chapter did you experience as a student?
2. Which of the learning opportunity lessons described do you think would be most difficult to implement in your classroom? Why? What might you do to make teaching this learning opportunity possible?

Activities

1. Interview two teachers, one who teaches a middle grades content subject and one who teaches a content subject in high school, to learn their attitudes about incorporating literacy-based instruction into their content teaching.
2. Observe a middle grades or high school content teacher. What do you notice about the expectations the teacher has for students? Which principles of instruction described in this chapter did you observe during the lesson?
3. Search the Internet for another learning opportunity for adolescent literacy development that you believe incorporates some of the

instructional principles described in this chapter. Explain the ways in which you feel the learning opportunity accomplishes this. Also discuss how you might need to modify this learning opportunity to use it with your students.

Jill Lewis is Professor of Literacy Education at New Jersey City University, Jersey City, New Jersey, USA. She has served on the Board of Directors of the International Reading Association (2004–2007), on the Board of Directors for the American Reading Forum (2003–2005), and on IRA's and New Jersey Reading Association's Governmental Relations Committees. She has also served on several literacy task forces for New Jersey and received NJRA's Distinguished Service Award. She has also worked in Macedonia, Kazakhstan, and Albania for the Reading and Writing for Critical Thinking Project, and currently serves as a volunteer consultant for the Secondary Education Reform Activity program in Macedonia. Her areas of expertise include adolescent literacy, content literacy, literacy policy and advocacy, reading across the curriculum, classroom research, and leadership development. She can be contacted at jlewis@njcu.edu.

REFERENCES

- Achieve & American Diploma Project. (2004). *Ready or not: Creating a high school diploma that counts*. Washington, DC: Authors.
- ACT. (2004a). *Crisis at the core: Preparing all students for college and work*. Iowa City, IA: Author. Retrieved May 31, 2006, from <http://www.act.org/path/policy/reports/crisis.html>
- ACT. (2004b). *Ready for college and ready for work: Same or different?* Iowa City, IA: Author. Retrieved June 5, 2006, from <http://www.act.org/path/policy/pdf/ReadinessBrief.pdf>
- ACT. (2006a, March 1). *High school reading not challenging enough, says ACT* [Press release]. Retrieved May 31, 2006, from <http://www.act.org/news/releases/2006/03-01-06.html>
- ACT. (2006b). *Reading between the lines: What the ACT reveals about college readiness in reading*. Iowa City, IA: Author. Retrieved May 31, 2006, from http://www.act.org/path/policy/pdf/reading_report.pdf
- Adelman, C. (1999). *Answers in the tool box: Academic intensity, attendance patterns, and bachelor's degree attainment*. Washington, DC: Office of Education Research and Improvement, U.S. Department of Education.
- Alexander, P., & Jetton, T. (2000). Learning from text: A multidimensional and developmental perspective. In M. Kamil, P. Mosenthal, P.D. Pearson, & R. Barr (Eds.), *Handbook of reading research* (Vol. 3, pp. 285–310). Mahwah, NJ: Erlbaum.
- Anderson, R.C., & Pearson, P.D. (1984). A schema-theoretic view of basic processes in reading comprehension. In P.D. Pearson (Ed.), *Handbook of reading research* (pp. 255–291). New York: Longman.

- Barton, P.E. (2006). *High school reform and work: Facing labor market realities*. Princeton, NJ: Educational Testing Service.
- Berliner, D.C., & Biddle, B.J. (1995). *The manufactured crisis: Myths, fraud, and the attack on America's public schools*. Reading, MA: Addison-Wesley.
- Boldt, M. (2006, June 19). Pawlenty: Schools in "silent crisis." *St. Paul Pioneer Press*. Retrieved March 12, 2007, from http://www.accessmylibrary.com/comsite5/bin/pdinventory.pl?pdlanding=1&referid=2930&purchase_type=ITM&item_id=0286-15653510
- Bourdieu, P. (1977a). Cultural reproduction and social reproduction. In J. Karabel & A.H. Halsey (Eds.), *Power and ideology in education* (pp. 487–511). New York: Oxford University Press.
- Bourdieu, P. (1977b). *Outline of a theory of practice* (R. Nice, Trans.). Cambridge, England: Cambridge University Press.
- Bracey, G.W. (2006). *Reading educational research: How to avoid getting statistically snookered*. Portsmouth, NH: Heinemann.
- Cilo, M.R., & Cooper, B.S. (2000). *Bridging the gap between school and college: An analysis of K–16 education in New York City*. New York: Mayor's Advisory Task Force on the City, University of New York.
- Collins, V.L., Dickson, S.V., Simmons, D.C., & Kame'enui, E.J. (1996). *Metacognition and its relation to reading comprehension: A synthesis of the research* (Tech. Rep. No. 23). Eugene, OR: National Center to Improve the Tools of Educators. Retrieved June 30, 2006, from <http://idea.uoregon.edu/~ncite/documents/techrep/tech23.html>
- Darling-Hammond, L. (2000, January 1). Teacher quality and student achievement: A review of state policy evidence. *Education Policy Analysis Archives*, 8(1). Retrieved February 14, 2007, from <http://epaa.asu.edu/epaa/v8n1>
- Fields, R. (2006, June 18). Plan to groom grads for college gets "incomplete." *Plain Dealer Bureau*. Retrieved March 12, 2007, from <http://www.kidsohio.org/NewsMediaArticlePF.asp?ID=64>
- Gee, J.P. (1996). *Social linguistics and literacies: Ideology in discourses*. New York: Routledge.
- Gee, J.P. (2000). Discourse and sociocultural studies in reading. *Reading Online*, 4(3). Retrieved April 10, 2007, from http://www.readingonline.org/articles/art_index.asp?HREF=handbook/gee/index.html
- Gose, B. (2006, March 10). Colorado debates how to send more at-risk students to college. *The Chronicle of Higher Education*. Retrieved October 16, 2006, from <http://chronicle.com/free/v52/i27/27b01601.htm>
- Johnson, R.T., & Johnson, D.W. (1986). Action research: Cooperative learning in the science classroom. *Science and Children*, 24, 31–32.
- Kamil, M.L. (2003). *Adolescents and literacy: Reading for the 21st century*. Washington, DC: Alliance for Excellent Education.
- Kern, R., & Schultz, J.M. (2005). Beyond orality: Investigating literacy and the literary in second and foreign language instruction. *The Modern Language Journal*, 89, 381–392.
- King, S.H., & Goodwin, A.L. (2002). *Culturally responsive parental involvement: Concrete understandings and basic strategies*. Washington, DC: American

- Association of Colleges for Teacher Education. Retrieved May 31, 2006, from <http://www.aacte.org/Publications/kinggoodwin.pdf>
- Kist, W. (2003, September). Student achievement in new literacies for the 21st century. *Middle School Journal*, 35(1), 6–13. Retrieved June 24, 2006, from <http://www.nmsa.org/Publications/MiddleSchoolJournal/September2003/Article1/tabid/141/Default.aspx>
- Langer, J., & Flihan, S. (2000). Writing and reading relationships: Constructive tasks. In R. Indrisano & J.R. Squire (Eds.), *Perspectives on writing: Research, theory, and practice* (pp. 112–139). Newark, DE: International Reading Association. Retrieved June 8, 2006, from <http://cela.albany.edu/publication/article/writeread.htm>
- Lee, J. (2006). *Tracking achievement gaps and assessing the impact of NCLB on the gaps: An in-depth look into national and state reading and math outcome trends*. Cambridge, MA: The Civil Rights Project at Harvard University. Retrieved February 14, 2007, from http://www.civilrightsproject.harvard.edu/research/esea/nclb_naep_lee.pdf
- Lewis, J. (1993, Fall). The effects of a precollege reading course on the academic self-esteem of urban college students. In *Inquiries in literacy learning and instruction, the fifteenth yearbook of the College Reading Association* (pp. 47–55). Logan, UT: College Reading Association.
- Lewis, J. (1996). *Academic literacy: Readings and strategies*. Boston: Houghton Mifflin.
- Lewis, J. (2007). *Academic literacy: Readings and strategies* (Rev. 4th ed.). Boston: Houghton Mifflin.
- Manktelow, J. (n.d.). *Drill down: Breaking problems down into manageable parts*. Retrieved June 22, 2006, from http://www.mindtools.com/pages/article/newTMC_02.htm
- Marzano, R.J. (2004). *Building background knowledge for academic achievement: Research on what works in schools*. Alexandria, VA: Association for Supervision and Curriculum Development.
- National Center for Education Statistics. (1999). *Teacher quality: A report on the preparation and qualifications of public school teachers*. Retrieved April 15, 2006, from <http://nces.ed.gov/surveys/frss/publications/1999080/7.asp>
- National Center for Education Statistics. (2004). *Digest of education statistics*. Washington, DC: Author. Retrieved May 12, 2006, from <http://nces.ed.gov/programs/digest/d04>
- Pressley, M. (2001, September). Comprehension instruction: What makes sense now, what might make sense soon. *Reading Online*, 5. Retrieved May 29, 2006, from http://www.readingonline.org/articles/art_index.asp?HREF=handbook/pressley/index.html
- Rosenthal, R., & Jacobson, L. (1968). *Pygmalion in the classroom: Teacher expectation and pupils' intellectual development*. New York: Holt Rinehart & Winston.
- Rossi, R., & Grossman, K.N. (2001, September 24). Substandard teachers under the microscope. *Chicago Sun-Times*. Retrieved March 12, 2007, from http://findarticles.com/p/articles/mi_qn4155/is_20010924/ai_n13915531
- Strickland, D.S. (1991). Emerging literacy: How young children learn to read. In B. Persky & L.H. Golubchick (Eds.), *Early childhood education* (2nd ed., pp. 337–344). Lanham, MD: University Press of America.

- Teale, W.H., & Sulzby, E. (1986). *Emergent literacy: Writing and reading*. Norwood, NJ: Ablex.
- Vygotsky, L.S. (1978). *Mind in society: The development of higher psychological processes* (M. Cole, V. John-Steiner, S. Scribner, & E. Souberman, Eds. & Trans.). Cambridge, MA: Harvard University Press. (Original work published 1934)
- Wiggins, G. (1990). The case for authentic assessment. *Practical Assessment, Research & Evaluation*, 2(2). Retrieved January 26, 2007, from <http://PAREonline.net/getvn.asp?v=2&n=2>