# Literacy as a Leisure Activity: Free-Time Preferences of Older Children and Young Adolescents

Marilyn A. Nippold Jill K. Duthie Jennifer Larsen

University of Oregon, Eugene

iteracy plays an important role in the development of language during the school-age and adolescent years. Typically developing youth acquire new vocabulary at an impressive rate of 2,000 to

3,000 words per year (Nagy & Scott, 2000; White, Power, & White, 1989), resulting in a working knowledge of at least 40,000 different words by the senior year of high school (Nagy & Herman, 1987). One factor promoting this

ABSTRACT: Purpose: Literacy plays an important role in the development of language in school-age children and adolescents. For example, by reading a variety of books, magazines, and newspapers, students gain exposure to complex vocabulary, and reading becomes a prime opportunity for learning new words. Despite the importance of reading for lexical development, little is known about the pleasure reading habits of today's youth. The first goal of this investigation was to examine the preferences of older children and young adolescents with respect to reading as a leisure-time activity and its relationship to other free-time options that are likely to compete for their attention. The second goal was to examine the amount of time that young people spend reading for pleasure each day and the types of materials they most enjoy reading. The third goal was to determine if preferences for free-time activities and reading materials would evince age- and gender-related differences during the period of development from late childhood through early adolescence (ages 11-15 years). The findings could serve as a reference point for understanding what is reasonable to expect of students during this age range.

**Method:** The participants were 100 sixth graders (mean age = 11;7 [years;months]) and 100 ninth graders (mean age = 14;8) attending public schools in western Oregon. Each group contained an equal number of boys and girls, all of whom spoke English as their primary language and were considered to be typical achievers. All participants completed a survey concerning their preferred free-time activities and reading materials. They also reported the average amount of time they spent reading for pleasure each day.

**Results:** The most popular free-time activities were listening to music/going to concerts, watching television or videos, playing sports, and playing computer or video games. Least preferred activities were cooking, running or walking, writing, and arts and crafts. Reading was moderately popular. The most popular reading materials were magazines, novels, and comics; least popular were plays, technical books, and newspapers. Interest in pleasure reading declined during this age range (11–15 years), and boys were more likely than girls to report that they spent no time reading for pleasure.

Clinical Implications: Given the importance of reading to lexical development in school-age children and adolescents, reading should be promoted as a leisure activity during these years. School-based speech-language pathologists (SLPs), in their role as language consultants, can benefit from understanding the pleasure-reading patterns of today's youth. It is especially important for SLPs to monitor these patterns in students who have language disorders, as it is common for these young people to experience deficits in reading and in lexical development. Fortunately, much can be done in school settings to encourage strong literacy habits in all students if SLPs work collaboratively with teachers, principals, psychologists, librarians, parents, and students. Suggestions are offered for ways to encourage young people to spend more time reading for pleasure.

KEY WORDS: lexical development, literacy, pleasure reading, school-age children, adolescents

enormous growth in lexical development is the increased exposure to written language that occurs as children become proficient readers (Miller & Gildea, 1987). Compared to spoken language (e.g., conversations, television shows), written language (e.g., newspapers, novels) contains a greater variety of complex and low-frequency words, and becomes a prime opportunity for learning the meanings of words, particularly after the fifth grade (Cunningham & Stanovich, 1998; Stanovich & Cunningham, 1992). By this time, decoding and fluency skills have improved in most students to the point where reading has become a tool for gaining new knowledge, which includes the learning of words that occur in textbooks for older children and adolescents (Chall, 1983). Increased word knowledge leads to stronger reading comprehension, which, in turn, leads to further lexical expansion (Sternberg & Powell, 1983). Thus, there is an ongoing reciprocal relationship between language and literacy development in youth.

Learning the meanings of unfamiliar words is a gradual process (Beck & McKeown, 1991) that requires an understanding of subtle nuances and the ability to use those words in different contexts (Nagy & Scott, 2000). A single exposure to an unfamiliar word is unlikely to result in this degree of knowledge, and studies have shown that many new words are learned as a result of having repeated exposure to them while reading (Jenkins, Stein, & Wysocki, 1984; Nagy, Herman, & Anderson, 1985; Schwanenflugel, Stahl, & McFalls, 1997). The mechanisms by which this occurs have been studied in detail. Research has shown that upon exposure to an unfamiliar word, the learner begins to determine its meaning through the use of key metalinguistic strategies—morphological analysis (Anglin, 1993; Nagy, Diakidoy, & Anderson, 1993; White et al., 1989; Wysocki & Jenkins, 1987) and contextual abstraction (Miller & Gildea, 1987; Sternberg, 1987; Sternberg & Powell, 1983). Either or both of these strategies may be used depending on the analyzability of the target word and the quality of context clues surrounding it (Nippold, 2002). For example, consider a child who encounters the word mineralogy in a newspaper article about volcanoes. Knowledge of the lexical morpheme mineral and the derivational morpheme -ology can help the learner determine that the word refers to the science of chemicals found in the ground, a conjecture supported by sentences contained in the article, such as, "And when they [the scientists] thought to compare the mineralogy of their samples with known Missoula sediments, they were surprised to find that no one had ever examined the clay in detail.... Their idea was confirmed when they compared the minerals of the clay and material known to have been ejected by Mount Mazama" (Bolt, p. A9). These strategies offer a viable alternative to less efficient methods of word learning such as the use of a dictionary (Nippold, 1998).

Nagy and Herman (1987) estimated that children encounter 15,000 to 30,000 unfamiliar words a year from reading only 25 min per day, and argued that up to one half of student vocabulary growth may result from reading. Additionally, Miller and Gildea (1987) reported that students who are avid readers acquire larger vocabularies than those who read less frequently. Indeed, studies have

found a consistent link between the amount of time spent reading and word knowledge in both children and adults.

Cunningham and Stanovich (1991) conducted a study to determine if there was a relationship between print exposure, vocabulary, and other skills in fourth- through sixthgrade children (N = 134). Print exposure was measured by a title recognition task (TRT) consisting of a checklist of children's book titles and a series of foils. Additional measures were obtained for vocabulary, verbal fluency, nonverbal problem-solving ability, and general knowledge. Oral vocabulary was measured by a group-administered selection from the Peabody Picture Vocabulary Test-Revised (PPVT-R; Dunn & Dunn, 1981); reading vocabulary was measured by a checklist composed of real words and nonword foils; and verbal fluency was measured by a task in which the children wrote down as many words as they could from four different categories, each in 45 s. Using hierarchical regression analyses to control for age and nonverbal ability, the investigators found that print exposure as measured by the TRT uniquely predicted oral vocabulary, reading vocabulary, verbal fluency, and general knowledge.

Similarly, Stanovich and Cunningham (1992) conducted a study to determine if differences in print exposure were associated with word knowledge in young adults who were college students (*N* = 300). Participants were administered formal tests of reading vocabulary, oral vocabulary, verbal fluency, reading comprehension, and cognitive ability (nonverbal analogical reasoning). They also were asked to fill out questionnaires that assessed their exposure to print, including their familiarity with authors (Author Recognition Test) and magazines (Magazine Recognition Test). Controlling for reading comprehension and cognitive ability in the participants, hierarchical regression analyses revealed that the level of print exposure uniquely predicted each measure of word knowledge: reading vocabulary, oral vocabulary, and verbal fluency.

West, Stanovich, and Mitchell (1993) also demonstrated a strong relationship between print exposure and word knowledge. Adult participants (N = 217) were selected from an airport lounge on the basis of their observed reading behavior, and were classified as either "readers" or "nonreaders" according to how they spent their waiting time. Each participant was then administered a vocabulary checklist and a series of tasks to measure print exposure (i.e., recognition of authors, magazines, and newspapers) and nonprint exposure (i.e., recognition of television shows, films, and actors). Readers received higher scores on print exposure than nonreaders, but the groups did not differ on nonprint exposure. It was also determined that higher scores on print exposure were significantly related to vocabulary scores, whereas higher scores on nonprint exposure were not. Hierarchical regression analyses indicated that all three measures of print exposure recognition of authors, magazines, and newspapersaccounted for unique variance in vocabulary while controlling for participant age and amount of education.

This is not to argue that reading is the only source of word learning. Clearly, people can learn new words from other sources such as listening to lectures and news reports, talking with informed individuals, and watching educational television shows (Rice, 1983). Nevertheless, reading is a prime source of word exposure, particularly for complex and low-frequency words, and there is evidence from research that the amount of time spent reading is closely associated with word learning—a relationship that holds during childhood and adulthood (e.g., Cunningham & Stanovich, 1991; Stanovich & Cunningham, 1992; West et al., 1993). This suggests that reading should be promoted, not only as a school-based activity, but as a leisure-time activity as well.

Beyond exposure to new words, reading for pleasure offers additional benefits. Summarizing past research, Worthy, Moorman, and Turner (1999) reported that when children and adolescents engage in voluntary reading about topics that truly interest them, their effort, motivation, and attitudes about reading improve. They also reported that allowing students to read simpler materials such as comics and magazines can improve their basic reading skills (e.g., fluency), leading to increased confidence. This, they suggested, could encourage students to tackle more technical reading materials in school.

Although most speech-language pathologists (SLPs) probably would agree that reading is an important activity that should be promoted in young people, little is known about today's youth and their views concerning the value of reading for pleasure in relation to the multitude of options that exist for spending one's leisure time. Hence, the first goal of the present study was to investigate the preferences of older children and young adolescents with respect to reading as a leisure-time activity and its relationship to other free-time options that are likely to compete for their attention. The second goal was to examine the amount of time that young people spend reading for pleasure each day and the types of materials they most enjoy reading. The third goal was to determine if preferences for free-time activities and reading materials would evince age- and gender-related differences during the period of development from late childhood through early adolescence (ages 11-15 years). The findings could serve as a reference point for understanding what is reasonable to expect of students during this age range.

This developmental period was of interest because students are beyond the fifth grade, a time when reading has become a primary tool for learning the meanings of new words (Stanovich & Cunningham, 1992). This is also a time when socializing with peers takes on greater importance. In a cross-sectional study, Raffaelli and Duckett (1989) examined the socialization patterns of boys and girls (N = 401) during the ages of 10 to 15. They found that, as age increased, students spent greater amounts of time socializing with friends (e.g., talking on the phone and talking in person), a pattern that characterized girls more so than boys. They also found that as age increased, peer interactions made greater contributions to students' personal well-being. At the same time, however, parents remained an important source of information and advice, a finding confirmed by other investigators (e.g., Rawlins, 1992). Given these findings, it is important to examine the literacy habits of children and adolescents during this age range

when socialization might be expected to displace solitary activities such as reading, and when differences in the behavior patterns of boys and girls sometimes emerge.

In public schools today, SLPs frequently work with school-age children and adolescents having language disorders. In an effort to conduct intervention that is relevant and ecologically valid, SLPs increasingly serve as consultants to other school professionals who work with those same students (Whitmire, 2000), such as teachers, psychologists, and librarians. Many students with language disorders experience difficulties in learning to read (Bashir, Wiig, & Abrams, 1987; Catts, Fey, Zhang, & Tomblin, 2001; Catts & Kamhi, 1999; Nippold & Schwarz, 2002; Stothard, Snowling, Bishop, Chipchase, & Kaplan, 1998) and have long-standing deficits in lexical development (Kail, Hale, Leonard, & Nippold, 1984; Kail & Leonard, 1986; McGregor, Newman, Reilly, & Capone, 2002). Students with language disorders who do not enjoy reading are likely to receive less exposure to new vocabulary through text-a situation that can exacerbate their limitations in word knowledge. Given the contribution that reading makes to lexical development, SLPs need to understand the literacy habits of today's youth in order to provide appropriate recommendations in their role as language consultants in public school settings.

## **METHOD**

## **Participants**

The participants were 100 sixth-grade children (50 boys, 50 girls) with a mean age of 11;7 (years;months; range = 11;1-12;1) and 100 ninth-grade adolescents (50 boys, 50 girls) with a mean age of 14;8 (range = 14;1-15;7). All participants were enrolled in a public middle school (sixth graders) or high school (ninth graders) located in a lower middle-income neighborhood in western Oregon. According to teacher report, the students represented a range of ability levels and were considered to be typical achievers. None had a known history of language, learning, or cognitive deficits, and none was receiving special education services. More than 90% of the participants were of European American descent, and all reported that English was their primary language spoken at home.

Teachers at each school were asked to volunteer their classes. This request resulted in the recruitment of five sixth-grade English classes and five ninth-grade English classes. A passive consent procedure was employed. The parents of all students enrolled in those 10 classes were provided with a letter informing them of the nature of the study and indicating that it was an optional activity to be carried out during regular school hours. If any parents objected to their son or daughter participating in the study, they were able to communicate that by returning a form letter to the school. No students were pressured to participate, and all were assured that it was a voluntary activity. Students were told that their individual performance would remain confidential. In addition, they were able to indicate

their own willingness to participate by signing an assent form on the day of testing. Students who were not participating in the study were allowed to work quietly at their desks or go to the school library during the testing.

The Oregon Department of Education Web site (http:// www.ode.state.or.us) reported that 13.8% of the students in this school district live in poverty, as compared to 14.3% for the state as a whole. The Web site also reported the percentage of students who met or exceeded the state benchmarks in reading, based on their performance on the Oregon Statewide Assessment (OSA). In Oregon, this test is administered every year to all students in grades three, five, eight, and ten. The participants in this investigation would have taken the test during their fifth- or eighth-grade year. Although individual student scores were not available, it was reported that, for this district, 75% of the fifth graders met or exceeded the performance standards that year as compared to 79% for the state, and 54% of the eighth graders met or exceeded the standards as compared to 64% for the state. These results suggest that the participants in this investigation were fairly representative of students in Oregon. However, the results also suggest that some of the participants, particularly those in ninth grade, may not have met the performance standards in reading despite the fact that none had been identified as having special needs.

#### **Procedures**

All participants were tested in large-group fashion in their classrooms at school by one of the investigators. They were asked to complete a two-page survey, the "Student Questionnaire" (see Appendix), designed especially for the present study. To ensure that all participants were listening to the directions and performing the task, the examiner read each question aloud, paused, and allowed time for them to mark their own answers.

The survey required approximately 10 min to complete and consisted of three main questions. Question 1, which asked how students spent their free time, provided a list of activities that were thought to be of interest to middleschool and high-school students. As a result of investigator observations of young people and discussions with their parents, it was believed that these activities might be good candidates to compete for students' time and attention. In addition to activities that are primarily solitary (e.g., reading, writing), the list contained activities that could be carried out either alone or with others (e.g., shopping, media events, sports, games). The category of "other" was also provided to allow students to write in any favorite activities that were not included in the list. Question 2 asked the students to estimate how much time they typically spent each day reading for pleasure outside of the school day, followed by a set of options (e.g., none, 5-10 min, 10-20 min). Question 3 provided a list of common reading materials (e.g., poems, novels, newspapers) and asked the students to indicate which types they enjoyed reading for pleasure. The opportunity to indicate "none of the above" and "other" (write in) was provided to compensate for anything that had been omitted from the list. Upon completion of the testing, all students were rewarded with a ballpoint pen.

#### **RESULTS**

Table 1 reports the results of Question 1, free-time activities, showing the percentage of students who selected each item as something they liked to do. For all students combined (N=200), the most popular activities were listening to music/going to concerts (78%), watching television or videos (77%), playing sports (68%), and playing computer or video games (63%). Least popular activities were cooking (32%), running or walking (33%), writing (34%), and arts and crafts (38%). Reading (51%) was a moderately popular activity. For the category of "other," the most popular write-in activity was spending time with friends (e.g., sleepovers, playing with friends, visiting friends' homes, having friends come to visit), especially for girls. Fourteen sixth graders (4 boys, 10 girls) and 11 ninth graders (2 boys, 9 girls) wrote in this activity.

For each activity listed on the questionnaire, the data were analyzed using a 2 × 2 (grade × gender) analysis of variance (ANOVA) with Bonferroni corrections for multiple comparisons (adjusted alpha = .003). Effect sizes were computed using the eta coefficient (Meline & Schmitt, 1997) and were interpreted as follows: small = .10-.23; medium = .24-.36; large = .37-.71 (Cohen, 1969, p. 276). For grade, statistically significant main effects were obtained for swimming, F(1, 196) = 13.25, p = .0003,  $\eta = .25$ ; riding a bicycle or scooter, F(1, 196) = 20.86, p < .0001,  $\eta = .31$ ; using e-mail F(1, 196) = 9.90, p = .0019,  $\eta = .22$ ; and reading, F(1, 196) = 15.70, p = .0001,  $\eta = .27$ . Effect sizes were small for using e-mail and medium for swimming, riding a bicycle or scooter, and reading. Tukey's studentized range (honestly significant difference [HSD]) test (p = .05)indicated that ninth graders showed a stronger preference than sixth graders for e-mail, whereas sixth graders showed a stronger preference than ninth graders for swimming, riding a bicycle or scooter, and reading.

For gender, statistically significant main effects were obtained for playing computer or video games, F(1, 196) =23.14, p < .0001,  $\eta = .32$ ; playing sports, F(1, 196) =15.05, p = .0001,  $\eta = .27$ ; talking on the phone, F(1, 196)= 20.74, p < .0001,  $\eta = .31$ ; using e-mail, F(1, 196) =14.03, p = .0002,  $\eta = .26$ ; shopping, F(1, 196) = 83.36, p < .0001,  $\eta = .55$ ; writing, F(1, 196) = 73.30, p < .0001,  $\eta = .52$ ; and cooking, F(1, 196) = 9.52, p = .0023,  $\eta =$ .22. Effect sizes were small for cooking; medium for playing computer or video games, playing sports, talking on the phone, and using e-mail; and large for shopping and writing. Tukey's (HSD) test (p = .05) showed that boys preferred playing computer or video games and playing sports, whereas girls preferred talking on the phone, using e-mail, shopping, writing, and cooking. No interactions between grade and gender were statistically significant.

Table 2 reports the results of Question 2, the amount of time spent reading for pleasure. For each time block, the data were analyzed using a  $2 \times 2$  (grade  $\times$  gender) ANOVA

**Table 1.** Percentage of students who responded positively to each item listed under the question, "How do you like to spend your free time?" (standard deviations are reported).

	Grade 6				Grade 9			Grades 6 & 9		
	Boys	Girls	Combined	Boys	Girls	Combined	Boys	Girls	Combined	
A. watching TV or videos	88	74	81	74	70	72	81	72	77	
	(33)	(44)	(39)	(44)	(46)	(45)	(39)	(45)	(43)	
B. playing computer or video games	82	58	70	74	36	55	78	47	63	
	(39)	(50)	(46)	(44)	(48)	(50)	(42)	(50)	(49)	
C. playing sports	82	56	69	78	54	66	80	55	68	
1 7 8 1	(39)	(50)	(46)	(42)	(50)	(48)	(40)	(50)	(47)	
O. running or walking	32	26	29	30	42	36	31	34	33	
2 2	(47)	(44)	(46)	(46)	(50)	(48)	(46)	(48)	(47)	
E. swimming	54	64	59	38	30	34	46	47	47	
	(50)	(48)	(49)	(49)	(46)	(48)	(50)	(50)	(50)	
F. skating	46	42	44	54	22	38	50	32	41	
	(50)	(50)	(50)	(50)	(42)	(49)	(50)	(47)	(49)	
G. riding a bicycle or scooter	78	70	74	56	32	44	67	51	59	
	(42)	(46)	(44)	(50)	(47)	(50)	(47)	(50)	(49)	
H. playing cards or board games	64	40	52	36	32	34	50	36	43	
1 1 3 8 11 11 8 11	(48)	(49)	(50)	(48)	(47)	(48)	(50)	(48)	(50)	
. talking on the phone	38	64	51	50	84	67	44	74	59	
	(49)	(48)	(50)	(51)	(37)	(47)	(50)	(44)	(49)	
. using e-mail	28	42	35	38	74	56	33	58	46	
	(45)	(50)	(48)	(49)	(44)	(50)	(47)	(50)	(50)	
K. listening to music/going to concerts	68	80	74	74	90	82	71	85	78	
	(47)	(40)	(44)	(44)	(30)	(39)	(46)	(36)	(42)	
L. shopping/going to the mall	28	72	50	26	90	58	27	81	54	
	(45)	(45)	(50)	(44)	(30)	(50)	(45)	(39)	(50)	
M. reading	58	70	64	30	44	37	44	57	51	
	(50)	(46)	(48)	(46)	(50)	(49)	(50)	(50)	(50)	
N. writing	12	52	32	06	64	35	09	58	34	
	(33)	(50)	(47)	(24)	(48)	(48)	(29)	(50)	(47)	
). cooking	22	48	35	22	36	29	22	42	32	
	(42)	(50)	(48)	(42)	(48)	(46)	(42)	(50)	(47)	
. arts & crafts	34	54	44	28	36	32	31	45	38	
	(48)	(50)	(50)	(45)	(48)	(47)	(46)	(50)	(49)	
Q. other (write in)	46	40	43	44	44	44	45	42	44	
(	(50)	(49)	(50)	(50)	(50)	(50)	(50)	(50)	(50)	

(with Bonferroni corrections; adjusted alpha = .006). Effect sizes were computed using the eta coefficient (Cohen, 1969; Meline & Schmitt, 1997). For grade, no statistically significant main effects were obtained. For gender, the only statistically significant main effect was obtained for "none," F(1, 196) = 9.29, p = .0026,  $\eta = .21$ , where boys selected this option more frequently than did girls. The effect size was small. No interactions between grade and gender were statistically significant.

Table 3 reports the results of Question 3, preferred reading materials, showing the percentage of students who said they liked each type of material. For all students combined (N=200), the most popular reading materials were magazines (63%), novels (52%), and comics (41%); least popular were plays (12%), technical books (15%), and newspapers (16%). The category of "other" (27%) was moderately popular. For other, some students wrote in the names of specific books (e.g., *Harry Potter*) or themes (e.g., pets, adventure, science fiction, sports, biographies, mystery, horror) they enjoyed.

For each type of material, the data were analyzed using a 2 × 2 (grade × gender) ANOVA (with Bonferroni corrections; adjusted alpha = .005). Effect sizes were

computed using the eta coefficient (Cohen, 1969; Meline & Schmitt, 1997). For grade, a statistically significant main effect was obtained only for magazines, F(1, 196) = 9.95, p = .0019,  $\eta = .22$ . The effect size was small. Tukey's (HSD) test (p = .05) indicated that ninth graders showed a stronger preference than sixth graders for magazines.

For gender, a statistically significant main effect was obtained only for poems, F(1, 196) = 19.57, p < .0001,  $\eta = .30$ . The effect size was medium. Tukey's (HSD) test (p = .05) indicated that girls showed a stronger preference than boys for poems. No interactions between grade and gender were statistically significant.

#### **DISCUSSION**

Given the importance of reading to lexical development in school-age children and adolescents, this study was conducted to investigate the views of young people with respect to reading as a leisure activity in relation to other free-time options that are likely to compete for their attention. Fortunately, the results indicate that reading is at

**Table 2.** Percentage of students who selected each option in response to the request, "Please estimate how much time you spend each day, on average, reading for pleasure outside of the school day" (standard deviations are reported).

		Grade 6			Grade 9			Grades 6 & 9		
	Boys	Girls	Combined	Boys	Girls	Combined	Boys	Girls	Combined	
A. none	14	02	08	20	06	13	17	04	11	
	(35)	(14)	(27)	(40)	(24)	(34)	(38)	(20)	(31)	
B. 5–10 minutes	16	10	13	28	22	25	22	16	19	
	(37)	(30)	(34)	(45)	(42)	(44)	(42)	(37)	(39)	
C. 10–20 minutes	12	14	13	10	14	12	11	14	13	
	(33)	(35)	(34)	(30)	(35)	(33)	(31)	(35)	(33)	
D. 20–30 minutes	22	28	25	12	22	17	17	25	21	
	(42)	(45)	(44)	(33)	(42)	(38)	(38)	(44)	(41)	
E. 30–60 minutes	22	28	25	18	18	18	20	23	22	
	(42)	(45)	(44)	(39)	(39)	(39)	(40)	(42)	(41)	
F. 1–2 hours	12	18	15	06	12	09	09	15	12	
	(33)	(39)	(36)	(24)	(33)	(29)	(29)	(36)	(33)	
G. 2–3 hours	0	0	0	04	0	02	02	0	01	
	(0)	(0)	(0)	(20)	(0)	(14)	(14)	(0)	(10)	
H. more than 3 hours	02	0	01	02	06	04	02	03	03	
	(14)	(0)	(10)	(14)	(24)	(20)	(14)	(17)	(16)	

**Table 3.** Percentage of students who responded positively to each item listed under the question, "What kinds of materials do you like to read for pleasure?" (standard deviations are reported).

		Grade 6			Grade 9			Grades 6 & 9		
	Boys	Girls	Combined	Boys	Girls	Combined	Boys	Girls	Combined	
A. poems	14	24	19	08	48	28	11	36	24	
	(35)	(43)	(39)	(27)	(50)	(45)	(31)	(48)	(43)	
B. short stories	38	40	39	18	44	31	28	42	35	
	(49)	(49)	(49)	(39)	(50)	(46)	(45)	(50)	(48)	
C. plays	10	16	13	04	16	10	07	16	12	
	(30)	(37)	(34)	(20)	(37)	(30)	(26)	(37)	(32)	
D. novels	44	64	54	42	56	49	43	60	52	
	(50)	(48)	(50)	(50)	(50)	(50)	(50)	(49)	(50)	
E. comics	58	38	48	36	32	34	47	35	41	
	(50)	(49)	(50)	(48)	(47)	(48)	(50)	(48)	(49)	
F. technical books	28	12	20	10	08	09	19	10	15	
	(45)	(33)	(40)	(30)	(27)	(29)	(39)	(30)	(35)	
G. newspapers	18	06	12	22	16	19	20	11	16	
	(39)	(24)	(33)	(42)	(37)	(39)	(40)	(31)	(36)	
H. magazines	50	54	52	62	84	73	56	69	63	
	(51)	(50)	(50)	(49)	(37)	(45)	(50)	(46)	(49)	
I. none of the above	04	04	04	06	02	04	05	03	04	
	(20)	(20)	(20)	(24)	(14)	(20)	(22)	(17)	(20)	
J. other (write in)	36	30	33	14	26	20	25	28	27	
	(48)	(46)	(47)	(35)	(44)	(40)	(44)	(45)	(44)	

least a moderately popular free-time activity for students in the 11- to 15-year age range. Yet at the same time, the study indicates that many other activities are preferred over reading, such as listening to music/going to concerts, watching television or videos, playing sports, and playing computer or video games. The study also indicates that interest in reading as a free-time activity declines during these years, whereas interest in using e-mail increases, consistent with the trend for young people to spend more time socializing with peers as they transition into adolescence (Raffaelli & Duckett, 1989).

Differences between boys and girls also emerged. Boys preferred playing computer or video games and playing

sports; girls preferred talking on the phone, using e-mail, shopping, writing, and cooking. Boys were more likely than girls to report that they spent no time reading for pleasure. For all students combined, the most popular reading materials were magazines, novels, and comics; least popular were plays, technical books, and newspapers. Older students showed a stronger preference than younger ones for magazines, and girls showed a stronger preference than boys for poems.

Reports have indicated that the amount of time that is spent reading predicts word knowledge (e.g., Cunningham & Stanovich, 1991; Stanovich & Cunningham, 1992; West et al., 1993). This is thought to occur because written

language exposes learners to large numbers of unfamiliar words, leading them to infer the meanings of those words through metalinguistic strategies—morphological analysis and contextual abstraction (Nippold, 1998). Because word knowledge plays a critical role in academic success and in other intellectual pursuits (Sternberg & Powell, 1983), it is important that school-age children and adolescents spend time reading a variety of materials and that their interest in reading continues into adulthood. Pleasure reading can expose students to new words and allow them to cultivate a positive attitude toward reading as they refine their basic reading skills (e.g., fluency), building confidence in themselves as readers (Worthy et al., 1999).

This is not to say that other free-time activities are unimportant. For example, in the present study, many participants indicated that they enjoyed socializing with friends through phone calls, e-mail, and personal visits. Because socializing is an activity that offers emotional support and contributes to personal well-being through the lifespan (Raffaelli & Duckett, 1989; Rawlins, 1992), it should be encouraged. In addition, many participants reported that they enjoyed physical activities such as playing sports, swimming, and riding a bicycle or scooter—all of which can benefit one's health. Nonetheless, it is helpful to know where reading fits into the larger picture of free-time options for today's youth, some of whom spend little or no time reading for pleasure.

#### STUDY LIMITATIONS

One limitation of the present study is that it focused only on students who were attending public schools located in lower middle-income neighborhoods in western Oregon. It is possible that different results might have been obtained in schools representing additional socioeconomic levels located in diverse regions of the United States. Another caveat is that the present study focused exclusively on leisure-time reading and did not investigate the amount of time that students spent on other types of reading, such as that required for school assignments. It seems possible that some of the students who reported spending little time reading for pleasure (e.g., ninth graders) may have been spending more time reading for school assignments, particularly if they were college bound. These possibilities should be investigated in future research. In addition, the literacy habits of various subgroups should be examined. This could include, for example, students who have been identified as having language and/or reading disorders, and those who show different levels of reading proficiency (e.g., strong, average, weak).

#### **IMPLICATIONS**

In any case, if students are successfully engaging in large amounts of academic reading, there is no reason to be concerned about their exposure to new vocabulary words. However, for those who spend little time reading for

pleasure or for school assignments, steps should be taken to promote their interest in reading. School-based SLPs should take note of these patterns, particularly as they occur in children and adolescents with language disorders, as it is common for these young people to experience deficits in reading and in word learning (e.g., Catts & Kamhi, 1999; Kail et al., 1984; Kail & Leonard, 1986; McGregor et al., 2002; Nippold & Schwarz, 2002). In addition, SLPs should note the pleasure-reading habits of struggling readers, as these students also could benefit from increased opportunities to read. As indicated earlier, a certain portion of students in this district (and in many districts in Oregon) failed to meet the state standards in reading as tested by the OSA, data that were obtained from the Oregon Department of Education Web site. Information concerning the literacy habits of students who are struggling to meet state standards can be helpful as SLPs consult with other professionals who may be less familiar with the reciprocal relationship between language and literacy development.

Fortunately, much can be done in school settings to encourage strong literacy habits in all students as SLPs work collaboratively with teachers, principals, psychologists, librarians, parents, and the students themselves. For example, the activities described below could be spearheaded by the school-based SLP:

· Organize book clubs at school. High schools and middle schools may offer clubs similar to the successful "Oprah book clubs" that were broadcast on national television. For this activity, books were selected by the television talk show host Oprah Winfrey and read by the general public, followed by interactive discussions on television. Similarly, a ninth-grade book club might vote on a selection of student-recommended books to be read by the club and discussed during their weekly meetings, facilitated by student leaders. For a sixth-grade club, options might include the Harry Potter books, which are frequently enjoyed by older children and young adolescents. In addition to their intriguing story lines, these books contain a wealth of low-frequency words used in colorful and imaginative ways, as evidenced in the following passage from Harry Potter and the Goblet of Fire (Rowling, 2000):

Slowly, magnificently, the ship rose out of the water, gleaming in the moonlight. It had a strangely skeletal look about it, as though it were a resurrected wreck, and the dim, misty lights shimmering at its portholes looked like ghostly eyes. Finally, with a great sloshing noise, the ship emerged entirely, bobbing on the turbulent water, and began to glide toward the bank. (p. 245)

Book clubs with different themes (e.g., mystery, adventure, animals) and reading levels (e.g., strong, average, weak) could be organized, and reluctant readers could receive academic credit for participating. In organizing these clubs, students should be grouped so that weaker readers are not competing with stronger ones and being subjected to peer ridicule. As appropriate, weaker readers might be asked to lead book clubs for younger students in order to build their own confidence as readers. Alternatively, they might

be assigned to book clubs led by mature and supportive adults. For example, a successful book club in an Oregon high school, started by a school librarian, includes senior citizens (e.g., retired teachers) who volunteer their time, helping to engage the students in lively discussions about the books and sharing their unique generational perspectives (Williams, 2003). In working with weaker readers, volunteers will need to understand the students' difficulties and know how to manage them positively. Thus, the SLP may need to train and supervise these volunteers carefully.

- Provide incentives and reward students for reading books and other materials (e.g., magazines, newspapers, plays) at school and at home. For example, on completing a book, article, or play, a student could earn a ticket to deposit in a special box in the principal's office. At regular intervals, a ticket could be drawn and a desirable prize could be awarded to the lucky ticket holder.
- Provide blocks of class time each day (e.g., 25 min) for "sustained silent reading" (SSR), where all students are required to read a book, magazine, or newspaper of their choice. Given that many children, as they transition into adolescence, show less interest in reading as a leisure activity, it is beneficial to provide this type of structured opportunity for them to read during the school day. Immediately following each SSR block, students can be requested to spend the next 5 min discussing what they read with a classmate, thereby appealing to the adolescent need for socialization and peer interaction.
- Encourage students to visit the school library and to take books home. Ensure that the library contains an adequate supply of books for students of differing backgrounds, interests, and levels of reading proficiency. This should include multiple copies of books that have been adapted for weaker readers such as classic novels (e.g., The Red Badge of Courage, David Copperfield, Treasure Island) and short biographies of sports heroes and movie stars (PCI Educational Publishing, 2003). Given the findings of the present study, simplified books on sports (e.g., baseball, football, hockey) might be of interest to ninth-grade boys, many of whom indicated enjoyment of sports-related leisure activities but little interest in reading for pleasure. A selection of high-interest books on tape also should be available for students who require additional support when reading.
- Take note of students' preferred reading materials and encourage their use. Based on the results of the present study, SLPs can expect to find differences in reading preferences based on a student's age or gender. For example, as shown in Table 3, poems were of less interest to ninth-grade boys than to ninth-grade girls, but both boys and girls enjoyed magazines. Given that research has shown that popular magazines can provide exposure to low-frequency words (Cunningham & Stanovich, 1998), magazines should be acceptable for free-time reading.

- Conduct informal surveys of students in the district to determine the names of specific magazines, comics, and books that are currently popular with boys and girls at different grade levels, information that may change rather quickly. Stocking school libraries and classrooms with these particular materials can help to motivate reluctant readers and generate interest in pleasure reading.
- Explore with students their reasons for rejecting certain types of reading materials. For example, a ninth-grade boy's dislike for poems may stem from having been forced to read adult-selected works depicting themes that were irrelevant to him (e.g., Emily Dickinson's poems on love). Providing students with a wide range of options depicting themes that interest them, such as horror (e.g., "The Raven" by Edgar Allan Poe, 1884) or adventure (e.g., "Paul Revere's Ride" by Henry Wadsworth Longfellow, 1963), may encourage them to explore this genre.
- Encourage parents to support these efforts by making them aware of the importance of reading and requesting their assistance through parent-teacher organizations designed to secure materials and personnel for the school library. Additionally, parents can be asked to hold daily sessions at home where they read and discuss with their child or adolescent favorite books, magazines, comic strips, or sections of the newspaper (e.g., sports, movies, television, advice). Contrary to popular myth, as children become adolescents, they continue to enjoy spending time with their parents and other family members (Raffaelli & Duckett, 1989).

For additional information on ways to promote strong literacy habits in school-age children and adolescents, SLPs may wish to consult various Web sites. For example, the International Reading Association (IRA; http://www.reading.org) is an excellent resource for lists of books that are of high interest to adolescents, as judged by students in Grades 7 through 12 attending schools in the United States. This Web site also provides research-based information on how to assist struggling readers, which often includes children and adolescents with language disorders.

It is difficult to overestimate the importance of reading during childhood and adolescence. Yet the present study indicates that as children become adolescents, their interest in reading as a leisure activity may decline as other free-time options compete for their attention. A decline in reading is problematic for students who avoid all other kinds of reading and for those whose language and literacy skills are weak. Fortunately, suggestions such as those offered above can be implemented quite easily, and it is clear that much can be done within school settings to maintain and even expand students' enthusiasm for reading when their individual needs and preferences are considered. Given the intellectual rewards that can accrue from a lifetime of reading, a modest investment in adolescent literacy programs can bring monumental rewards to society.

# **ACKNOWLEDGMENTS**

We express sincere gratitude to the children and adolescents who participated in this research project and to the teachers and administrators who granted permission for the project to take place at their schools and who helped to schedule the testing sessions.

#### REFERENCES

- Anglin, J. M. (1993). Vocabulary development: A morphological analysis. Monographs of the Society for Research in Child Development, 58(10), Serial No. 238.
- Bashir, A. S., Wiig, E. H., & Abrams, J. C. (1987). Language disorders in childhood and adolescence: Implications for learning and socialization. *Pediatric Annals*, 16, 145–156.
- Beck, I., & McKeown, M. (1991). Conditions of vocabulary acquisition. In R. Barr, M. L. Kamil, & P. B. Mosenthal (Eds.), *Handbook of reading research* (Vol. 2, pp. 789–814). White Plains, NY: Longman.
- **Bolt, G.** (2004, March 26). Scientists link valley's clay soil to Mount Mazama ash spew. *The Register-Guard*, pp. A1, A9.
- Catts, H. W., Fey, M. E., Zhang, X., & Tomblin, J. B. (2001).
  Estimating the risk of future reading difficulties in kindergarten children: A research-based model and its clinical implementation.
  Language, Speech, and Hearing Services in Schools, 32, 38–50.
- Catts, H. W., & Kamhi, A. G. (1999). Language and reading disabilities. Boston: Allyn & Bacon.
- Chall, J. S. (1983). Stages of reading development. New York: McGraw-Hill.
- Cohen, J. (1969). Statistical power analysis for the behavioral sciences. New York: Academic Press.
- Cunningham, A. E., & Stanovich, K. E. (1991). Tracking the unique effects of print exposure in children: Associations with vocabulary, general knowledge, and spelling. *Journal of Educational Psychology*, 83, 264–274.
- Cunningham, A. E., & Stanovich, K. E. (1998, Spring/Summer). What reading does for the mind. *American Educator*, 8–15.
- Dunn, L. M., & Dunn, L. M. (1981). Peabody Picture Vocabulary Test-Revised. Circle Pines, MN: American Guidance Service.
- Jenkins, J. R., Stein, M. L., & Wysocki, K. (1984). Learning vocabulary through reading. American Educational Research Journal, 21, 767–787.
- Kail, R., Hale, C. A., Leonard, L. B., & Nippold, M. A. (1984). Lexical storage and retrieval in language-impaired children. Applied Psycholinguistics, 5, 37–49.
- Kail, R., & Leonard, L. (1986). Word-finding abilities in language-impaired children (ASHA Monograph 25). Rockville, MD: American Speech-Language-Hearing Association.
- Longfellow, H. W. (1963). Paul Revere's ride. New York: Crowell.
- McGregor, K. K., Newman, R. M., Reilly, R. M., & Capone, N. C. (2002). Semantic representation and naming in children with specific language impairment. *Journal of Speech, Language, and Hearing Research*, 45, 998–1014.
- Meline, T., & Schmitt, J. F. (1997). Case studies for evaluating statistical significance in group designs. *American Journal of Speech-Language Pathology*, 6(1), 33–41.

- Miller, G. A., & Gildea, P. M. (1987). How children learn words. *Scientific American*, 257(3), 94–99.
- Nagy, W., Diakidoy, I., & Anderson, R. (1993). The acquisition of morphology: Learning the contribution of suffixes to the meanings of derivatives. *Journal of Reading Behavior*, 25(2), 155–171.
- Nagy, W. E., & Herman, P. A. (1987). Breadth and depth of vocabulary knowledge: Implications for acquisition and instruction. In M. McKeown & M. E. Curtis (Eds.), *The nature* of vocabulary acquisition (pp. 19–36). Hillsdale, NJ: Erlbaum.
- Nagy, W. E., Herman, P. A., & Anderson, R. (1985). Learning words from context. *Reading Research Quarterly*, 20, 233–253.
- Nagy, W. E., & Scott, J. A. (2000). Vocabulary processes. In M. L. Kamil, P. B. Mosenthal, & R. Barr (Eds.), *Handbook of reading research* (Vol. 3, pp. 269–284). Mahwah, NJ: Erlbaum.
- Nippold, M. A. (1998). Later language development: The schoolage and adolescent years (2nd ed.). Austin, TX: Pro-Ed.
- **Nippold, M. A.** (2002). Lexical learning in school-age children, adolescents, and adults: A process where language and literacy converge. *Journal of Child Language*, 29, 474–478.
- Nippold, M. A., & Schwarz, I. E. (2002). Do children recover from specific language impairment? *Advances in Speech-Language Pathology*, 4(1), 41–49.
- PCI Educational Publishing. (2003). Special education & learning differences catalogue: Middle school, high school & adult. San Antonio, TX.
- Poe, E. A. (1884). The raven. New York: Harper & Brothers.
- Raffaelli, M., & Duckett, E. (1989). "We were just talking...": Conversations in early adolescence. *Journal of Youth and Adolescence*, 18, 567–582.
- Rawlins, W. K. (1992). Friendship matters: Communication, dialectics, and the life course. New York: DeGruyter.
- **Rice, M.** (1983). The role of television in language acquisition. *Developmental Review, 3,* 211–224.
- Rowling, J. K. (2000). Harry Potter and the goblet of fire. New York: Scholastic.
- Schwanenflugel, P., Stahl, S., & McFalls, E. (1997). Partial word knowledge and vocabulary growth during reading comprehension. *Journal of Literary Research*, 29, 531–553.
- Stanovich, K. E., & Cunningham, A. E. (1992). Studying the consequences of literacy within a literate society: The cognitive correlates of print exposure. *Memory & Cognition*, 20(1), 51–68.
- Sternberg, R. J. (1987). Most vocabulary is learned from context.
  In M. G. McKeown & M. E. Curtis (Eds.), *The nature of vocabulary acquisition* (pp. 89–105). Hillsdale, NJ: Erlbaum.
- Sternberg, R. J., & Powell, J. S. (1983). Comprehending verbal comprehension. *American Psychologist*, 38, 878–893.
- Stothard, S. E., Snowling, M. J., Bishop, D. V. M., Chipchase, B. B., & Kaplan, C. A. (1998). Language-impaired preschoolers: A follow-up into adolescence. *Journal of Speech, Language, and Hearing Research*, 41, 407–418.
- West, R. F., Stanovich, K. E., & Mitchell, H. R. (1993). Reading in the real world and its correlates. *Reading Research Quarterly*, 28, 35–50.
- White, T. G., Power, M. A., & White, S. (1989). Morphological analysis: Implications for teaching and understanding vocabulary growth. *Reading Research Quarterly*, 24, 283–304.
- Whitmire, K. (2000). Action: School services. Language, Speech, and Hearing Services in Schools, 31, 194–199.

- Williams, A. (2003, December 15). Young, old find common ground in the pages of some good books. *The Register-Guard*, pp. B1, B4.
- Worthy, J., Moorman, M., & Turner, M. (1999). What Johnny likes to read is hard to find in school. *Reading Research Quarterly*, 34(1), 12–27.
- Wysocki, K., & Jenkins, J. R. (1987). Deriving word meanings through morphological generalization. *Reading Research Quarterly*, 22, 66–81.

Received April 5, 2004 Accepted May 12, 2004 DOI: 10.1044/0161-1461(2005/009)

Contact author: Marilyn A. Nippold, PhD, Professor, Communication Disorders and Sciences, College of Education, University of Oregon, Eugene, OR 97403. E-mail: nippold@uoregon.edu

## APPENDIX. STUDENT QUESTIONNAIRE

Please tell us a little about yourself by answering the following questions. There are no "right or wrong" answers. We just want to know more about you and your interests.

- 1. How do you like to spend your free time? Circle all that apply:
  - A. watching TV or videos
  - B. playing computer or video games
  - C. playing sports (e.g., basketball, baseball, football, soccer, etc.)
  - D. running or walking
  - E. swimming
  - F. skating (skate board or roller blades)
  - G. riding a bicycle or scooter
  - H. playing cards or board games (e.g., Monopoly, chess, checkers, etc.)
  - I. talking on the phone with friends or relatives
  - J. using e-mail with friends or relatives
  - K. listening to music/going to concerts
  - L. shopping/going to the mall
  - M. reading (e.g., books, magazines, newspapers, etc.)
  - N. writing (e.g., diary, poetry, notes to friends, etc.)
  - O. cooking
  - P. arts & crafts
  - Q. other (write in)\_\_\_\_\_
- 2. Please estimate how much time you spend each day, on average, reading for pleasure outside of the school day. This includes reading that you **choose** to do. Circle the **one** best answer:
  - A. none
  - B. 5-10 minutes
  - C. 10-20 minutes
  - D. 20-30 minutes
  - E. 30-60 minutes
  - F. 1-2 hours
  - G. 2-3 hours
  - H. more than 3 hours
- 3. What kinds of materials do you like to read for pleasure? Circle all that apply:
  - A. poems
  - B. short stories
  - C. plays
  - D. novels
  - E. comics
  - F. technical books (e.g., auto repair, science, history, computers, etc.)
  - G. newspapers
  - H. magazines
  - I. none of the above
  - J. other (write in)\_\_\_\_\_

Copyright of Language, Speech, & Hearing Services in Schools is the property of American Speech-Language-Hearing Association and its content may not be copied or emailed to multiple sites or posted to a listserv without the copyright holder's express written permission. However, users may print, download, or email articles for individual use.