# PIRLS Reading Purposes and Processes of Reading Comprehension

PIRLS examines the processes of comprehension and the purposes for reading, however, they do not function in isolation from each other or from the contexts in which students live and learn. The first two aspects of reading literacy addressed by PIRLS, processes of comprehension and purposes for reading, form the basis of the written test of reading comprehension. The last aspect, behavior and attitudes, will be addressed by the student questionnaire (see Chapter 3).

#### **Processes of Comprehension**

Readers construct meaning in different ways. They focus on and retrieve specific ideas, make inferences, interpret and integrate information and ideas, and examine and evaluate text features. Transcending these processes are the metacognitive processes and strategies that allow readers to examine their understanding and adjust their approach (Jacobs, 1997; Paris, Wasik, & Turner, 1996; VanDijk & Kintsch, 1983). In addition, the knowledge and experiences that readers bring to reading equip them with an understanding of language, texts, and the world through which they filter their comprehension of the material (Alexander & Jetton, 2000; Beach & Hynds, 1996; Clay, 1991; Hall, 1998).

Four types of comprehension processes are used in the PIRLS assessment to develop the comprehension questions for the passages presented to students. Across the assessment, a combination of questions, each dealing with one of the processes, enables students to demonstrate a range of abilities and skills in constructing meaning from written texts. Along with each process and its components, examples of questions that may be used to assess that process are discussed. The types of comprehension processes are described below.

In thinking about assessment questions, there is, of course, a substantial interaction between the length and complexity of the text and the sophistication of the comprehension processes required. It may initially seem that locating and extracting explicitly stated information would be less difficult than, for example, making interpretation across an entire text and integrating those with external ideas and experiences. All texts are not equal, however, varying enormously in numerous features such as length, syntactic complexity, abstractness of ideas, and organizational structure.

#### Focus on and Retrieve Explicitly Stated Information

Readers vary the attention they give to explicitly stated information in the text. Some ideas in the text may elicit particular focus and others may not. For example, readers may focus on ideas that confirm or contradict predictions they have made about the text's meaning or that relate to their general purpose for reading. In addition, readers often need to retrieve information explicitly stated in the text, in order to answer a question they bring to the reading task, or to check their developing understanding of some aspect of the text's meaning.

In focusing on and retrieving explicitly stated information, readers use various ways to locate and understand content that is relevant to the question posed. Retrieving appropriate text information requires that the reader not only understand what is stated explicitly in the text, but also how that information is related to the information sought.

Successful retrieval requires a fairly immediate or automatic understanding of the text. This process needs little or no inferring or interpreting. There are no "gaps" in meaning to be filled – the meaning is evident and stated in the text. The reader must, however, recognize the relevance of the information or idea in relation to the information sought.

Focus on the text typically remains at the sentence or phrase level in this type of text processing. The process may require the reader to focus on and retrieve several pieces of information; but in each case the information is usually contained within a sentence or phrase.

Reading tasks that may exemplify this type of text processing include the following:

- identifying information that is relevant to the specific goal of reading
- Iooking for specific ideas
- searching for definitions of words or phrases
- identifying the setting of a story (e.g., time, place)
- finding the topic sentence or main idea (when explicitly stated)

#### Make Straightforward Inferences

As readers construct meaning from text, they make inferences about ideas or information not explicitly stated. Making inferences allows the reader to move beyond the surface of texts and to fill in the "gaps" in meaning that often occur in texts. Some of these inferences are straightforward in that they are based mostly on information that is contained in the text: the reader may merely need to connect two or more ideas or pieces of information. Although the ideas may be explicitly stated, the connection between them is not, and thus must be inferred. Straightforward inferences are very much text-based. Although not explicitly stated in the text, the meaning remains relatively clear.

Skilled readers often make these kinds of inferences automatically. They may immediately connect two or more pieces of information, recognizing the relationship even though it is not stated in the text. In many cases, the author has constructed the text to lead readers to the obvious or straightforward inference. For example, the actions of a character across the story may clearly point to a particular character trait, and most readers would come to the same conclusion about that character's personality or viewpoint.

With this type of processing, the reader typically focuses on more than just sentence- or phrase-level meaning. The focus may be on local meaning, residing in part of the text, or on more global meaning, representing the whole text. In addition, some straightforward inferences may call upon readers to connect local and global meanings.

Reading tasks that may exemplify this type of text processing include the following:

- inferring that one event caused another event
- concluding what is the main point made by a series of arguments
- determining the referent of a pronoun
- identifying generalizations made in the text
- describing the relationship between two characters

#### Interpret and Integrate Ideas and Information

As with the more straightforward inferences, the reader engaging in this process may focus on local or global meanings, or may relate details to overall themes and ideas. In any case, the reader is processing text beyond the phrase or sentence level.

As readers interpret and integrate ideas and information in the text, they often need to draw on their understanding of the world. They are making connections that are not only implicit, but that may be open to some interpretation based on their own perspective. When they interpret and integrate text information and ideas, readers may need to draw on their background knowledge and experiences more than they do for straightforward inferences. Because of this, meaning that is constructed through interpreting and integrating ideas and information is likely to vary among readers, depending upon the experiences and knowledge they bring to the reading task.

By engaging in this interpretive process, readers are attempting to construct a more specific or more complete understanding of the text by integrating personal knowledge and experience with meaning that resides in the text. For example, the reader may draw on experience to infer a character's underlying motive or to construct a mental image of the information conveyed.

Reading tasks that may exemplify this type of text processing include the following:

- discerning the overall message or theme of a text
- considering an alternative to actions of characters
- comparing and contrasting text information
- inferring a story's mood or tone
- interpreting a real-world application of text information

## Examine and Evaluate Content, Language, and Textual Elements

As readers examine and evaluate the content, language, and elements of the text, the focus shifts from constructing meaning to critically considering the text itself. In terms of content, readers draw on their interpretations and weigh their understanding of the text against their understanding of the world – rejecting, accepting, or remaining neutral to the text's representation. For example, the reader may counter or confirm claims made in the text or make comparisons with ideas and information found in other sources.

In reflecting on text elements, such as structure and language, readers examine how meaning is presented. In doing so, they draw upon their knowledge of text genre and structure, as well as their understanding of language conventions. They may also reflect on the author's devices for conveying meaning and judge their adequacy, and question the author's purpose, perspective, or skill.

The reader engaged in this process is standing apart from the text and examining or evaluating it. The text content, or meaning, may be examined from a very personal perspective or with a critical and objective view. Here the reader relies on knowledge about the world or on past reading.

In examining and evaluating elements of text structure and language, readers draw upon their knowledge of language usage and general or genre-specific features of texts. The text is considered as a way to convey ideas, feelings, and information. Readers may find weaknesses in how the text was written or recognize the successful use of the author's craft. The extent of past reading experience and familiarity with the language are essential to this process. Reading tasks that may exemplify this type of text processing include the following:

- evaluating the likelihood that the events described could really happen
- describing how the author devised a surprise ending
- judging the completeness or clarity of information in the text
- determining an author's perspective on the central topic

### **Purposes for Reading**

Reading literacy is directly related to the reasons why people read. Broadly, these reasons include reading for personal interest and pleasure, reading to participate in society, and reading to learn. For young readers, emphasis is placed on reading for interest or pleasure and reading to learn.

The PIRLS assessment of reading literacy will focus on the two purposes that account for most of the reading done by young students both in and out of school:

- reading for literary experience; and
- reading to acquire and use information

Because both types of reading are important at this age, the PIRLS assessment contains an equal proportion of material assessing each purpose. Although the assessment distinguishes between purposes for reading, the processes and strategies readers use for both purposes are perhaps more similar than different.

Each of these purposes for reading is often associated with certain types of texts. For example, reading for literary experience is often accomplished through reading fiction, while reading to acquire and use information is generally associated with informative articles and instructional texts. However, purposes for reading do not align strictly with types of texts. For example, biographies or autobiographies can be primarily informational or literary, but include characteristics of both purposes. Because people's tastes and interests are so varied, almost any text could meet either purpose. The content, organization, and style that may be typical of a particular text genre have implications for the reader's approach to understanding the text (Graesser, Golding, & Long, 2000; Kirsch & Mosenthal, 1989; Weaver & Kintsch, 1996). It is in the interaction between reader and text that meanings are made and purposes are achieved. For the assessment, passages will be classified by their primary purposes and by the kinds of questions asked. That is, passages classified as informational will be accompanied by questions about the information contained in the passages and those classified as literary will have questions addressing theme, plot events, characters, and setting.

The early reading of most young children centers on literary and narrative text types. In addition, many young readers also enjoy acquiring information from books and other types of reading material. This kind of reading becomes more important as students develop their literacy abilities and are increasingly required to read in order to learn across the curriculum (Langer, 1990).

Within each of the two purposes for reading, many different text forms can be identified. Texts differ in the way in which ideas are organized and presented and elicit varying ways of constructing meaning (Goldman & Rakestraw, 2000). Text organization and format can vary to a great degree, ranging from sequential ordering of written material to snippets of words and phrases arranged with pictorial and tabular data. In selecting texts for the PIRLS assessment, the aim is to present a wide range of text types within each purpose for reading. Texts will be selected only from sources typical of those available to students in and out of school. The goal is to create a reading experience for students participating in the assessment that, as much as possible, is similar to authentic reading experiences they may have in other contexts.

The two purposes for reading and the different types of texts included within each are described in the following sections.

#### **Reading for Literary Experience**

In literary reading, the reader engages with the text to become involved in imagined events, setting, actions, consequences, characters, atmosphere, feelings, and ideas, and to enjoy language itself. To understand and appreciate literature, the reader must bring to the text his or her own experiences, feelings, appreciation of language and knowledge of literary forms. For young readers, literature offers the opportunity to explore situations and feelings they have not yet encountered. The main form of literary texts used in the PIRLS assessment is narrative fiction. Given differences in curricula and cultures across the participating countries, it is difficult for PIRLS to include some types of literary texts. For example, poetry is difficult to translate and plays are not widely taught in the primary grades.

Events, actions, and consequences depicted in narrative fiction allow the reader to experience vicariously and reflect upon situations that, although they may be fantasy, illuminate those of real life. The text may present the perspective of the narrator or a principal character, or there may be several such viewpoints in a more complex text. Information and ideas may be described directly or through dialogue and events. Short stories or novels sometimes narrate events chronologically, or sometimes make more complex use of time with flashbacks or time shifts.

#### Reading to Acquire and Use Information

In reading for information, the reader engages not with imagined worlds, but with aspects of the real universe. Through informational texts, one can understand how the world is and has been, and why things work as they do. Readers can go beyond the acquisition of information and use it in reasoning and in action. Informational texts need not be read from beginning to end; readers may select the parts they need. Different organizations make different demands on the reader, although there are no hard and fast distinctions. It also can be noted that despite their organization, informational texts may or may not have headings or other types of textual organizers. Informational texts ordered chronologically present their ideas as a sequence ordered in time. Such texts may recount events, for example as historical facts or as diary entries, personal accounts, or letters. Biographies and autobiographies, detailing the events of real lives, are a major group of texts of this type. Other chronologically organized texts are procedural, for example recipes and instructions. Here, the imperative form is often used and the reader is expected not just to understand but also to act in accordance with what is read.

Sometimes information and ideas are organized logically rather than chronologically. For example, a research paper may describe cause and effect, articles can compare and contrast such things as societies or the weather, and editorials may present arguments and counter arguments or put forth a viewpoint with supporting evidence. Persuasive texts aim directly at influencing the reader's view as in the presentation of a problem and recommended solution. In discussion and persuasion, the reader must follow the development of ideas and bring to the text a critical mind in forming his or her own opinion.

Sometimes informational texts are expository, presenting explanations or describing people, events, or things. In a thematic organization, aspects of a topic are clustered and described together in the text. Finally, it should be observed that presentation of information need not be in the form of continuous text. Such forms include brochures, lists, diagrams, charts, graphs, and those that call for actions on the part of the reader like advertisements or announcements. It should be emphasized that a single informational text often uses one or more ways of presenting information. Even informational pieces that are primarily text, often are documented with tables or illustrated with pictures and diagrams.

