1. Discourse Analysis and Reading Instruction

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Abstract
This paper explores connections between written discourse analysis and reading instruction, with particular emphasis on text organization research and its impact on comprehension instruction. The paper discusses the influence of top-level discourse organization on reading comprehension followed by text structure awareness, genre-based instruction and instructional strategies supported by discourse analysis.

Introduction
Over the past 15 years, research on discourse analysis and language comprehension has increasingly demonstrated that text structure awareness has a strong impact on efforts to improve reading instruction. In an early review of the impact of text structures on reading, Pearson and Camperell (1981) discussed the potential of story grammars and expository prose structures for reading comprehension. At that time, however, they rightly pointed out that little was known about the use of text structuring for improved instruction. Fifteen years later, it is possible to report that there is now a considerable body of research evidence which supports the use of discourse analysis and text structure instruction as a means for improving reading comprehension. This research has demonstrated that text structure knowledge—particularly with expository texts—is an effective resource for comprehension both directly and indirectly; that is, students’ comprehension and recall improve whether students are trained to recognize the organizational features of texts, or whether students are trained through a variety of reading-strategy instructional approaches.

Efforts to improve comprehension instruction for narrative texts has primarily involved instruction in story structure schemas and anticipatory question generating (Fitzgerald, 1989; Pearson and Fielding, 1991). These instructional treatments have proven to be useful for low-level students in English L1 elementary school contexts:
1. They provide pre-organizers that generate expectancy about characters, plot, and episodes;
2. They relate material to personal experience;
3. They present background knowledge and synopses of events;
4. They support direct instruction on components of a story-setting, problem, goal, action, outcome—and their identification in stories.

While the use of narrative texts is prevalent in early instruction, and while it is possible to argue that narrative texts are crucially linked to a variety of cognitive activities (Britton and Pellegrini, 1990; Bruner, 1990), it does seem that instruction in the structure of narrative texts to improve comprehension is a source of some disagreement (Fitzgerald, 1989; Pressley et al., 1989). Older and more skilled readers do not seem to demonstrate as much improvement in narrative comprehension from training (Pearson and Fielding, 1991). And while there are a number of research studies which support the use of story structure schemas for instruction at lower grades, for populations beyond the elementary school levels, such instruction may not be as helpful. Researchers attribute these results to the idea that older students already have well developed implicit knowledge of general narrative structures. Beck, et al. (1982) and Omanson, et al. (1984) suggest that a more efficient instructional program for narrative comprehension is to train students to recognize specific important ideas in the text—central and causal ideas in the narrative—rather than recognizing generic narrative-structure components (e.g., setting, characters, episodes).

When considering more advanced L2 students, a much greater emphasis is typically placed on expository prose. These students need to understand the more abstract patterns of text structuring which are possible in expository prose as well as comprehend the denser and more complex information packaging which is typical in academic contexts. For this reason the remainder of the discussion will focus on the text structuring in expository prose and the effect of teaching text structure for improved reading comprehension.

In a recent review of research on English L1 text structure instruction, Pearson and Fielding (1991) gave the following overwhelmingly positive endorsement:

*In general, we have found incredibly positive support for just about any approach to text structure instruction for expository prose.* It
appears that any sort of systematic attention to clues that reveal how the authors attempt to relate ideas to one another or any sort of systematic attempt to impose structure upon a text, especially in some sort of visual re-representation of the relationship among key ideas, facilitates comprehension as well as both short-term and long-term memory for the text (832).

While this assessment may be a bit too optimistic, it does point out the clear impact of text structure instruction on improving expository prose comprehension when the training is carefully and systematically done, when it is given sufficient time and attention, and when it is grounded in reasonable instructional approaches. This review will focus on a number of these research efforts in order to demonstrate the theoretical support for certain instructional approaches. The review will also highlight more recent research and practices which appear to be promising ways to extend the use of text structuring for reading comprehension.

**Top-level text structures and reading instruction**

Early efforts to focus on the usefulness of text structure have sought to demonstrate a number of organizing principles:

1. that texts are hierarchically organized (in terms of important information, less-important information, details),
2. that readers tend to focus on and remember information at higher levels in the text hierarchy,
3. that top-level structural information (or rhetorical macropositions) seems to influence comprehension and recall (description, comparison, etc.),
4. that better students seem to recognize and use top-level structuring to assist recall and comprehension, and
5. that top-level structuring can be taught so that students will recognize this aspect of texts and use it to assist in their own comprehension.

After a decade of additional research, it is now well accepted that texts have hierarchical structuring, that comprehension and recall from texts is influenced by a levels effect—students comprehend and recall the higher level information.
better, and that hierarchical text structuring is related to, but not the same as, textual organizing features such as centrality (the central theme), connectedness (number of connections to a given idea in the text), and causality (being part of the cause and effect sequences in the text) (Singer, 1991; Slater and Graves, 1989; Taylor, 1992; Weaver and Kintsch, 1991). Similar results have been found with L2 students in research by Carrell (1984, 1992, Carrell, et al., 1989). Moreover, students who recognize hierarchical text structure independently (though not necessarily consciously), and make use of it in their comprehension processing, are likely to comprehend better and recall more information (Armbruster, et al., 1991; Carrell, 1985, 1992; Richgels, et al., 1987; Taylor, 1992).

It should be noted, in passing, that the significant results of various top-level text structure instruction argue persuasively for the position that a good part of text coherence indeed resides in the text itself rather than being a result of reader interpretation. The further development of this argument, however, goes beyond the scope of the present paper.

Despite the converging evidence for the supportive effect of text structure, the relative influence of different top-level text structures is not as well-established; that is, it is still not clear that any particular type of text structuring—collection, description, cause-effect, comparison-contrast, problem-solution—is better for the learning of new information (cf. Carrell, 1984, 1992; Meyer, 1987; Richgels, et al., 1987: See also Martin, 1989, 1993; Mohan, 1990; Slater and Graves, 1989 for other top-level expository text structures). In a recent study, Carrell (1992) argued that claims related to specific texts structures—whether, for example, a comparison-contrast structure improves comprehension better than a description structure—are more likely to be related to other variables such as specific student groups, topics, instructional contexts, and training procedures. This inability to specify preferred text structures does not argue against the importance of text structure for reading instruction; rather, it suggests that student awareness of many of these basic structures will need to be reinforced.

A second major issue concerning the influence of text structure is the extent to which such knowledge of top-level discourse organization can be directly taught to students so that it will lead to improved comprehension. There are three major lines of research on the effect of text structure instruction:

1. The first line of research involves the impact of direct instruction which explicitly raises student awareness of specific text structuring;
that is, specifically pointing out to students the structure of the description, or the problem-solution organization (Carrell, 1985; Miller and George, 1992).


3. A third line of instructional training follows from instruction in reading strategies more generally. Since a number of reading strategy training approaches include attention to cohesion structure, main idea identification, summarization, and text study skills (e.g., noting main point in the margin, underlining main points), this line of instructional research is also a source of studies supporting text structure instruction.

Thus, strategy training which includes summarizing, semantic mapping, predicting, forming questions from headings and sub-headings, and using adjunct questions all appear to improve awareness of text structure (Carrell, et al., 1989; Flood and Lapp, 1990; Pressley, et al., 1989; Shih, 1992).

All three lines of instructional research argue that teaching which focuses on text structure increases comprehension and learning. One of the most common sets of effective instructional strategies has been the use of various types of graphic displays to raise student awareness of text structure. This general approach also receives support from various efforts to develop content-based instruction, both for language instruction with L2 students and for content-area instruction with L1 students.

**Text Structure Awareness and Content-Based Instruction**

An important approach to the development of text-structure knowledge is Mohan’s pedagogical use of “knowledge structures” in content-based instruction. A major theme in this approach has been the use of graphic organizers—both to support content learning and to focus on language learning. The basic idea underlying this approach is that there are a relatively small number of basic knowledge structures which, in combination, underlie all academic texts. When
students are made aware that texts are composed of these organizational formats and patterns, they will be able to understand better the coherence and logic of the information being presented, and they will be able to locate the main ideas and distinguish them from less important information. Such knowledge structures also indicate the intent of the author and the purpose of the text.

The notion of knowledge structures, as presented by Mohan, (1986, 1990) is comprised of six basic structure types, three each for 'specifically presented' and for 'generalizable' information (three knowledge structures being seen as specific and practical, three being seen as general and theoretical). This distinction suggests that there are text structures which organize particular objects, events, and problem situations (text structures for descriptions, sequences, choices). These individualized occurrences have parallel generalized text structure which organize principles and abstract away from the particular (text structures for classifications, principles, evaluations). Figures 1 and 2 show a schematic representation of this approach to knowledge structures which underlie academic texts (Mohan, 1990: 123-124).

The argument that there are textual structures which underlie the information which students encounter is a fairly common one (e.g., Martin, 1989; Meyer, 1987; Slater and Graves, 1989). Indeed, Mohan (1990) points out similarities between various approaches to text structuring, explicitly comparing his approach to Martin’s (1989) and Meyer’s (1985, 1987) models. Perhaps the most distinguishing aspect of Mohan’s approach is his strong emphasis on training students to be aware of knowledge structures through graphic representations of the various structures. For example, Mohan (1990) notes that classification texts are most appropriately represented by tree graphs, venn diagrams, and table headings. Descriptions are best explored through pictures, diagrams, maps, and slides. Time sequences can be highlighted by action strips, time lines, and flow charts. Evaluations can be highlighted by rank orderings, rating scales, and value labeling (see also Tang, 1993).

This emphasis on graphic resources allows for a natural integration of content and language instruction as students learn to see the graphic representations in texts and learn to produce their own graphic models of underlying structures. A major problem for students who read difficult texts is that they often do not comprehend the text as a whole well even though they feel that the vocabulary and sentence structure have not been major obstacles to understanding. The attention to graphic representation, and the effort to teach students how to make their own
<table>
<thead>
<tr>
<th>Classification</th>
<th>Principles</th>
<th>Evaluation</th>
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<td>classifying</td>
<td>explaining</td>
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<td>categorizing</td>
<td>predicting</td>
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<tr>
<td>defining</td>
<td>interpreting data and drawing conclusions</td>
<td>criticizing</td>
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<td></td>
<td>developing generalizations (cause, effects, rules, means-ends, reasons)</td>
<td>justifying preference and personal opinions</td>
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<td></td>
<td>relating causes and effects</td>
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<td>experimenting</td>
<td>forming personal opinions</td>
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<td>observing</td>
<td>plan procedures</td>
<td>recommending</td>
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<tr>
<td>describing</td>
<td>carry out procedures</td>
<td>making decisions</td>
</tr>
<tr>
<td>naming</td>
<td>arrange events in sequence</td>
<td>recognize issues, problems</td>
</tr>
<tr>
<td>comparing</td>
<td>understand time and chronology</td>
<td>identify alternate solutions</td>
</tr>
<tr>
<td>contrasting</td>
<td>note changes over time</td>
<td>problem-solving</td>
</tr>
</tbody>
</table>

| Description | Sequence | Choice |

Figure 1: Some core thinking skills across curricula

[Social Studies Grades 1-7, 8-10; Science Grades 1-7, 8-10]
(Early, Thew & Wakefield 1986)

graphic representations, provides a well-supported means for developing comprehension strategies as was noted in section two of this paper. (See also Paris, et al., 1991; Pearson, et al., 1992; Pressley, et al., 1989; Readance, et al., 1992; Tang, 1992, 1993)

Additional theoretical support for the use of graphic organizers as described by Mohan can also be drawn from the dual coding theory of Paivio (1986, Sadoski, et al., 1991). This theory, typically viewed as an alternative theory to schema theory, stresses the additive interaction of verbal knowledge representations and
visual knowledge representations. On a more general level, this image-based theory receives support from two distinct sources. In a recent book, Damasio (1994), a noted neurologist, argues that all prior knowledge is essentially image-based, and Norman (1993), a leading cognitive psychologist, argues that humans are at their best in learning when tasks center on relevant images and pattern recognition.

For instructional purposes, the use of graphic text representations allows for pedagogical flexibility and attention to both content material and language skills. The use of graphics to reveal text structuring provides a natural means to incorporate task-based activities, cooperative-learning activities, comprehension strategy instruction; it also provides for a focus on formal aspects of language and text structure while learning content (O’Malley and Chamot, 1990; Fathman and Kessler, 1993; McGroarty, 1989; Mohan, 1990; Tang, 1993). Graphic organizers can be used as pre and/or post-reading activities and can lead to a number of possible types of group-work and opportunities for guided assistance. Students learning to develop their own graphic representations of texts will encounter many problem situations—the problems encountered will allow for group assistance as well as specific attention to formal features of language which serve the task purpose.
Genre-based Instruction

An approach to the teaching of text structure which parallels Mohan’s approach in many ways is that being developed currently in Australia (Christie, 1992; Cope and Kalantzis, 1993; Hasan and Martin, 1989; Martin, 1993). In this approach, the notion of textual genre is adapted from Halliday’s systemic linguistic theory and is elaborated as a set of discourse structures which guide the use (and the shape) of written discourse, and especially academic discourses. In particular, the functions of academic writing are realized, in good part, by their genre structure, yet students are seldom taught this important set of relationships. Educationally, these researchers argue that students must learn to control this linguistic knowledge in their writing and reading and, thereby, gain power over context-reduced academic prose (Martin, 1989).

Studies by genre-based researchers have pointed out many ways in which the language of specific disciplines varies, both in terms of the conceptual demands on the language resources, and in terms of the formal structuring of the discourse. Although a full explanation of this research line is beyond the scope of the present paper, it is a direction of inquiry which supports the relation between discourse analysis and reading comprehension: It explores how discourse is structured in ways that can be analyzed and that can lead to specific instructional practices (Christie, 1992; Martin, 1989, 1993).

This theoretical approach to the discourse of academic texts has led to the development of genre structures that can be discerned in written discourse and that can be used to raise both teacher and student awareness of genre organization in their reading and writing activities. Since students have relatively little practice with a number of these genres, it is important that the genre structures underlying much of academic discourse be made explicitly aware to students, and that they be a focus of direct instruction. Much like Mohan, Martin (1989) suggests that there are a number of basic patterns for text structuring. On a general level, these include recount, procedure, description, report, explanation, and judgement. More specific efforts to define the structure and staging of genres in specific disciplines is an on-going line of research (Cope and Kalantzis, 1993).

The practical applications of this approach are presented by Christie (1992; Christie, et al., 1990a, 1990b) in a set of instructional texts for elementary school literacy and by Derewianka (1990) and Collerson (1989) in teacher training texts. Much like Mohan, the emphasis is on the combination of language skills and content-based learning. Within units on cooking, paper making, magic, and
experiments, all at different student levels, the genre focus is on *procedures*. The materials are content-centered and task-based; at the same time, efforts are made to instruct students explicitly in the language resources which are used to construct the procedure genre (Christie, *et al.*, 1990a). A similar framework for materials center around the *report* genre (exploring reports about countries, bears, reptiles, and machines; Christie, *et al.*, 1990b). Although at present, there is little independent empirical research which directly supports this discourse-based approach to text structure instruction, there is evidence noted elsewhere in this paper which would lend support to the general direction of genre-based instruction.

**Instructional Strategies Supported by Discourse Analysis**

The research outlined above offers many implications for reading comprehension instruction. Direct instruction in text awareness is a central idea that emerges from this work in combination with current research on reading strategy instruction. Consistent instruction in, and practice with, summary writing also provides an application of the above research. One consequence of the research on discourse analysis is that students work with coherent texts that cover a range of genres. Thematically related reading materials provide many purposeful opportunities for exploring the structure of texts. The particular emphasis of this section, however, is with the use of graphic representation to support reading comprehension instruction: This instructional approach is a natural consequence of the research discussed above, and it is considered one of the most effective approaches in numerous instructional research studies.

There are, however, two major practical problems with the translation of graphic representations of discourse into instruction. First, the texts used for instruction typically combine various patterns of discourse organization in any longer text. Second, getting students to produce useful visual representations of text structure is not an easy undertaking and requires considerable practice. In fact, many teachers themselves will need extended training in seeing the structure of texts and then translating that structure into effective guides for student learning.

The first problem is best handled by initially examining parts of texts for specific text organization. After practice with "seeing" smaller blocks of text structure, larger representations can be combined to highlight a top-level text structure that guides the text overall. By building up from smaller, more recognizable patterns, students become comfortable with text organization without the practice becoming too complex. The larger text structures, requiring more com-
plex synthesizing, are best done as post-reading activities so that students’ comprehension of the entire text is established, and they can devote more time to the text-organization task. Research has also shown that more complex graphic representations are most effective for improving reading comprehension when they are done as post-reading activities.

The second problem has two parts: for the student, training is a matter of planning for the regular inclusion of text analysis in the curriculum and the consistent exploitation of reading texts for these purposes. If the training is consistent, many early exercises can be fairly simple in nature and not tax either student/teacher resources or available time. For the teacher, assistance in using graphic representations may require illustrative materials and lessons as well as a series of training workshops; the workshops can provide teachers with practice in discerning the important discourse structures in texts, and then exploiting these structures graphically for instruction.

There are a number of practical resources which illustrate how graphic text representations may highlight important information in a given text. These resources, in turn, suggest a number of practical techniques for instruction through graphic representations. The key to such practice is to decide how specific texts can be matched up appropriately with certain types of representations. Teachers and curriculum developers need to fit the best options for text representations with what the text itself offers. For example, a problem-solution table does not fit with a narrative text, and a procedural time line or flow chart may not easily fit with a cause-and-effect text. The ability to fit texts to graphic representations typically takes practice, but over a period of time, teachers become quite skilled at “seeing” text structure and leading students to “see” the text structure as well.

A practical explanation for using graphic procedures for text comprehension is presented in Tang (1993). A particularly useful feature of this article is its discussion of the transition from less specific graphic organizers (e.g., semantic mapping) to more specific knowledge-structure graphics (with more constraining organization) as part of an on-going cycle of instructional activities (cf. Heimlich and Pittelman, 1986). Among the graphic organizers she recommends are hierarchical tree structures, classification tables, time lines, descriptive arrays, and cause and effect tables.

Two other articles present useful graphic representations for instructional purposes. In an article designed for secondary L1 students reading science texts, Armbruster, et al. (1991) uses the term “framing” and discusses a number of tables.
and arrays to represent text structure. In a second article, also for secondary L1 students, Jones, Pierce and Hunter (1988/1989) describe a set of graphic outlines, discuss guidelines for creating them, and offer procedures for training student to make their own representations (see Figure 1). Jones, Pierce, and Hunter offer a useful set of guidelines for training students to create graphic organizers:

1. Present students with good examples of completed graphic organizers for texts they have read.
2. Model how to construct a graphic organizer with students and use think-aloud techniques so students can hear and see what you are thinking as the teacher.
3. Discuss with students when and how they should use these graphic organizers for their own purposes.
4. Provide a lot of coaching for the students as they create graphic representations for sections of texts and for whole texts.
5. Give students many opportunities for practice and give them appropriate positive feedback.
6. Gradually shift responsibility for constructing graphic representations to the students.
7. Allow for individual differences in students’ thinking and their graphic representations.
8. Set clear and manageable goals since the training process takes a sizable amount of time.

Figure 1. Graphic Forms with Corresponding Text Frames (below)

Graphic representations are visual illustrations of verbal statements. Frames are sets of questions or categories that are fundamental to understanding a given topic. Here are shown nine “generic” forms with their corresponding frames. Also given are examples of topics that would be represented by each graphic form. These graphics show at a glance the key parts of the whole and their relations, helping the learner to comprehend text and solve problems.
Spider Map

Used to describe a central idea: a thing (a geographic region), process (meiosis), concept (altruism), or proposition with support (experimental drugs should be available to AIDS victims). Key frame questions: What is the central idea? What are its attributes? What are its functions?

Series of Events Chain

Initiating Event

Event 1

→

Event 2

→

Final Outcome

Event 3

Continuum/Scale

Low

High

Used for time lines showing historic events or ages (grade levels in school), degrees of something (weight), shades of meaning (Likert scales), or ratings scales (achievement in school). Key frame questions: What is being scales? What are the endpoints?

Compare/Contrast Matrix

<table>
<thead>
<tr>
<th>Attribute 1</th>
<th>Attribute 2</th>
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<tbody>
<tr>
<td>Name 1</td>
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<tr>
<td>Name 2</td>
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</table>

Used to show similarities and differences between two things (people, places, events, ideas, etc.). Key frame questions: What things are being compared? How are they similar? How are they different?

Used to describe the stages of something (the life cycle of a primate); the steps in a linear procedure (how to neutralise an acid); a sequence of events (how feudalism led to the formation of nation states); or the goals, actions, and outcomes of a historical figure or character in a novel (the rise and fall of Napoleon). Key frame questions: What is the object, procedure or initiating event? What are the stages or steps? How do they lead to one another? What is the final outcome?

(continued overleaf)
Problem/Solution Outline

<table>
<thead>
<tr>
<th>Who</th>
<th>What</th>
<th>Why</th>
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</table>

Problem

<table>
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<tr>
<th>Attempted Solutions</th>
<th>Results</th>
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<tbody>
<tr>
<td>1.</td>
<td>1.</td>
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<tr>
<td>2.</td>
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</table>

Solution

End Result

Network Tree

Used to show causal information (causes of poverty), a hierarchy (types of insects), or branching procedures (the circulatory system). *Key frame questions:* What is the superordinate category? What are the subordinate categories? How are they related? How many levels are there?

Fishbone Map

Used to show the causal interaction of a complex event (an election, a nuclear explosion) or complex phenomenon (juvenile delinquency, learning disabilities). *Key frame questions:* What are the factors that cause X? How do they interrelate? Are the factors that cause X the same that cause X to persist?

Cycle

Used to show how a series of events interact to produce a set of results again and again (weather phenomena, cycles of achievement and failure, the life cycle). *Key frame questions:* What are the critical events in the cycle? How are they related? In what ways are they self-reinforcing?
Human Interaction Outline

Goals
Person 1
Group 1

Interaction

Goals
Person 2
Group 2

Action
Reaction

Reaction 1
Reaction 2

Action

Outcomes
Person 1
Group 1

Outcomes
Person 2
Group 2

Used to show the nature of an interaction between persons or groups (European settlers and American Indians). *Key frame questions:* Who are the persons or groups? What were their goals? Did they conflict or cooperate? What was the outcome for each person or group?

There are many other options for graphic representations that indicate discourse structure. A variety of outlines of the text organization itself can be constructed. Parts of the outline may be filled and other parts left blank. Alternatively, major units of the outline may be moved around out of sequence, and students will need to reassemble the outline. A third option is for students to take a list of the outline phrases and reassemble the organization. A fourth option is for students to fill in the signal words that mark the various parts of the outline organization. A fifth option is to provide students with the function of each paragraph in a longer reading (or have students decide on the functions), and then have students combine these paragraphs into larger units that reflect major sections of the reading; then students can explain their decisions by referring back to signals and patterns in the text itself.

Aside from outlines, variations on graphic organization can be constructed for flow charts, evaluative continua, procedural sequences, maps, matrices, tree diagrams, and visual figures that describe a process or an object. The formats noted in Figure 1 as well as formats discussed above are open to many variations.

**Conclusion**

The overall perspective gained from reviewing the various applications of discourse analysis to reading instruction is that there is considerable evidence to support text structure instruction as a way to improve reading comprehension. The various applications which lead to improved text structure awareness receive considerable theoretical and empirical support. It is worth noting, also, that instruction in text structure overlaps with reading strategy instruction. Indeed,
text structure instruction is typically listed as one of a small number of important comprehension strategies with consistent results (Pearson, et al., 1992; Pressley, et al., 1989; Readance, et al., 1992; Slater and Graves, 1989). This overlap points again to the influence of text structure awareness on comprehension processes in reading; that is, awareness of text structuring 1) improves higher-level comprehension processes, 2) provides the frame for both bridging and elaborative inferencing in the comprehension and interpretation of text material (Oakhill and Garnham, 1988; Singer, 1991), and 3) allows students to recognize differences between prior knowledge that may be inaccurate and textual knowledge that calls for students to restructure their prior knowledge.

In short, there is considerable support for the direct instruction of textual organization as a way to improve reading comprehension. As a set of reading and study strategies, text structure instruction has also been shown to improve students' content learning in many academic subjects. Thus, it serves both language skills and academic content learning. It is evident that, with reasonable care and attention, text structure awareness can be taught effectively and lead to improved reading comprehension.

In addition to the research and applications discussed in this chapter, there are yet other applications from discourse analysis research which can be applied to reading comprehension instruction. These include the role of cohesive referencing in texts, the importance of lexical relations in texts, the use of summarizing, outlining, and other comprehension strategies, and the highlighting of coherence signals in texts (e.g., given-new relations, transition marking, coherence relations between sentences and paragraphs). Treating all of these aspects of discourse analysis and their relations to reading comprehension is not possible in a chapter, but they should be noted here for their roles in developing reading comprehension and other language abilities.

To close, it is safe to say that one major applied accomplishment of written discourse analysis has been its impact on reading comprehension instruction. Needless to say, further research with many different L2 student groups and instructional contexts should be carried out to establish better the various ways in which research in written discourse analysis supports L2 instructional practices.

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