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ABSTRACT

This paper reviews studies concerning writing skills at the college level. These skills are examined within discussions concerning cognitive abilities, features of the written product, the various aspects involved in the writing process, and the mastery of specific genres and forms. It is observed that some studies draw their information from tape-recorded statements made by writers while they were writing, or the use of surveys of college graduates working in business, or the use of researcher-conducted studies of student texts, or surveys of college writing instructors. While each of these research methods has drawbacks, nearly all researchers would agree that successful writers should be able to understand their readers, their purpose, and the type of image that they are trying to convey through their writing. Writers should also be able to organize their material, provide necessary examples, logically connect their ideas, be willing to collaborate when writing, and be willing to critically evaluate the form and content of their writing. It is further understood that the writer must have the ability to use a specific form or type of writing to fit the needs of a particular communication situation. Contains 38 references. (GLR)

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Writing Skills for College Students

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"Writing Skills for College Students"

A Literature Review Summary

A review of published and unpublished sources yields several skill areas for writing at the college level. These skills can be classified under four interrelated headings:

- Cognitive Abilities
- Features of The Written Product
- Aspects of The Writing Process
- Mastery of Specific Genres and Forms

Since many of the studies cited in this review mention skills in several of the above categories, an effort has been made to include each study in all categories where it is appropriate.

PART I: COGNITIVE ABILITIES

Audience Awareness

Most researchers agree that "audience awareness," or the ability to develop a representation of the potential readers of a text, is one of the most important cognitive skills for success in writing. Faigley, et al. (1985) mention the ability to "translate writing tasks into specific goals," and to "base those goals on the rhetorical problem of the text," the solution of

which requires "a clear representation of the audience" for the piece. Odell (1981, 1983) also indicates that the rhetorical considerations of audience, purpose, and voice should be used to govern writers' choices of language, sentence structure, and content. Several empirical studies (Atlas 1979, Flower and Hayes 1980, Berkenkotter 1981, Beach and Anson 1988) have shown that audience awareness develops during the college years.

Flower and Hayes (1980) performed a pioneering study to determine the cognitive processes that occur while writers are engaged in the early stages of a writing task. They compared two groups of writers, "inexperienced" college freshmen who had sought help with their writing from a writing lab, and "experts," teachers of writing who had received National Endowment for the Humanities fellowships to study writing. The same writing task was given to both groups, and "compose-aloud protocols," or transcriptions of each writer's thoughts, verbalized while composing, were analyzed to indicate the differences between the cognitive processes of these two groups of writers.

The study indicated that the principal difference between the more- and less-skilled writers was their relative ability to build a complete, accurate mental representation or image of their potential readers, as well as their rhetorical goals involving a) their readers, b) their written persona (the image of themselves that they were trying to convey through their writing), and c) their message. Specifically, the skilled writers made their choices about what information to include in

their writing based on those goals, while the inexperienced writers were much more likely to base writing choices only on factual information about the topic.

Other studies support this conclusion. Atlas (1979) found that college graduates make many more statements about their audience in their plans for writing, and are more likely to evaluate the relative importance of their writing plans and ideas based on the rhetorical considerations of the reader, the writer's persona, and the message to be conveyed.

Berkenkotter's 1981 study of compose-aloud protocols made by ten professional writers in a variety of disciplines indicated that these skilled writers all formed a "rich representation of their audience" while writing, and that this imagined audience significantly affected the goals that they set for themselves while they wrote.

Beach and Anson (1988) analyzed writing samples taken from 24 ninth graders, 24 twelfth graders, 22 college juniors, and 24 in-service teachers. The participants were asked to write a persuasive memo, given a specific rhetorical situation. The study analyzed the types of statements that the writers used to begin their memos, and determined that the older writers (college juniors and teachers) were more likely to make statements that referred to the relationship between the writer and the reader than the younger writers, who often began their memos by depicting immediate, physical actions.

Several surveys of industry professionals (Fairley, et al.

1981, Storms 1983, Anderson 1985, Barclay et al. 1991) indicate that the ability to "write clearly for an audience," or the ability to "persuade a reader" are among the most important skills for college graduates. Although these two skills differ somewhat, their implications for the writer are similar: both to be clear and to persuade, one must be aware of and understand one's audience while writing.

Rubin (1984) and Black (1989) have both attempted to characterize "audience awareness" in greater detail. Black's study revealed that successful audience analysis skills include the ability to clearly understand a reader's values, attitudes, and goals, and the ability to relate one's reasons for writing in a certain way to that understanding. Two other observable audience-related writing skills were the ability to form connections between the reader and the writer, and between the reader and the subject material.

Rubin's approach involves the application of the developmental theory of "social cognition," and the observable steps therein, to the writing process. He enumerates the following skills for writers:

- * the ability to recognize that the readers' representations of a situation may differ from those of the writers
- * the ability to have diverse categories for construing potential readers
- * the ability to retrieve information about potential readers from several sources
- * the ability to search for text-creating strategies that correspond to the writer's

representation of an audience

- * the ability to recognize that readers' understandings of a text may differ from the writer's own understanding

- * the ability to recognize that while they read, readers are actively engaged in inferring the writer's perspectives, including the writer's representations of the audience

- * the ability to infer the readers' prior knowledge, values, associations, linguistic skills, sense of identity relative to the writer, and emotional state

- * the ability to represent, or anticipate, or understand a) the readers' enduring traits and dispositions, b) more temporary attitudes and predispositions that readers may have as they approach a particular text, and c) the minute-to-minute ongoing process of the readers' thoughts while reading the text

Many other writers (Goswami 1981, Loacker 1984, Anderson 1985, Redish et al. 1985, Cullen et al. 1987, Greenberg 1988, Davis and Stohrer 1989, Carnevale 1990) include audience awareness and the ability to write for different types of readers among their most important skills. Anderson and others mention the ability to write for readers with different levels of knowledge about the writer's area of specialty, as well as readers with jobs and positions different from the writer's.

More recently, theorists such as Witte (1992) have expanded this notion of audience to the more general idea of the "communication context" in which writing occurs. Relying on the idea that meaning is not contained solely in a text but is created by the interaction of the text and the communicative context in which it is either produced or written, Witte asserts

that one of the principal indicators of writing skill is the ability of writers to "alter their communication processes to match the situations in which communication occurs, and to know why and how they are doing so." A closely related cognitive skill is the ability to read, interpret, or "map" (Greenberg, 1992) the communication situation to make writing situationally appropriate.

Levels of Abstraction

In addition to audience considerations, another important cognitive writing skill is the ability to handle different levels of abstraction while writing a text, or the ability to move from general statements to more specific ones. White and Polin (1986) conducted a comprehensive assessment of the composition programs at all campuses of the California State University System. As part of this study, they surveyed composition instructors about the abilities that they felt contributed the most to successful writing. Among those most commonly cited were the ability to "move between more abstract and more particular levels of argument"; the ability to use "rhetorical markers," or words such as "therefore," "because," "since," "as a result," "for example," and "next" to guide the reader through the levels of generality, and the ability to use sentence structures appropriate to the complexity of the task. White and Polin also evaluated 3400 student essays from across the California State University system, and among the criteria used to judge the essays were the

ability "to use several different levels of development" (generalities and specific examples), and to "move back and forth between different levels of development."

Several other studies and surveys (Faigley 1981, Witte 1982, Cullen 1987, Beach and Anson 1988) indicate that the ability to provide support for and develop ideas with specific examples is an important writing skill. Witte et al. (1982) surveyed 181 university writing instructors from across the country who had been judged to be "successful" by the directors of their respective writing programs. The instructors were asked to indicate factors that influence them when they evaluate student writing. The most often mentioned factor was the ability to "provide support for major ideas." The ability to manipulate different levels of abstraction was also cited as a separate skill.

Cullen's 1987 assessment of the writing of 2129 Ferris State College students of various levels (freshmen, juniors, seniors) also used as one of its criteria the ability to develop ideas with examples. Cullen's study found that the upper-level students scored better on all criteria, indicating the ongoing improvement of writing skill during the college years.

Faigley et al. (1981), in an effort to determine the indicators of writing ability deemed most important by college-educated personnel for success on the job, surveyed 200 college-educated employees from various sectors of the workforce. They were asked, among other things, the open-ended question: "What

should be taught in college writing classes?" One of the responses most often mentioned was the ability to develop ideas, or to provide examples in support of general statements.

Organizational Ability

A third and final cognitive writing skill cited in several studies is the ability to clearly organize and structure a document (Faigley 1981, Goswami 1981, Witte 1982, Storms 1983, Loacker 1984, Anderson 1985, Haswell 1985, White and Polin 1986, Cullen 1987, and Davis and Stohrer 1989). In a study conducted to identify specific factors that indicate change in writing ability during the college years, Haswell performed a cross-sectional analysis of the writing of 32 college freshmen, 32 sophomores, 32 juniors, and 32 post-graduates. The essays of the upper-level students provided more evidence of logical organization of ideas and had clearer connections between paragraphs.

Davis and Stohrer's 1989 survey of 358 Department of Defense middle managers indicated that the ability to "organize the material for writing" was one of the most important writing skills. "Good organization" was the skill cited third most often in Faigley's 1981 survey of college-educated professionals. Cullen (1987) indicated that better student essays "exhibit a 'natural structure' that goes beyond an artificially imposed organization." White and Polin's 1986 survey of the California State University instructors indicated that the ability to

"select, organize, and present details to support a controlling idea" was important, as was the ability to "use appropriate organization and paragraphing." Witte's 1982 survey of college writing instructors also mentioned both "coherence" and "good paragraph organization and structure" as indicators of successful writing. Witte does not define these terms any further, but it appears that they simply mean that ideas and sentences connect with one another in a logical way.

PART II: FEATURES OF THE WRITTEN PRODUCT

Organizational Features

Many of the higher-level cognitive abilities manifest themselves in specific features of written documents, and organizational skill is one of the most easily observed. Two recent studies, both involving close textual analysis of specific documents, attempt to pinpoint some of the factors that contribute to a sense of organization in a text. Colomb and Williams (1985) note that beginning sentences with familiar information, or information that has been previously referred to in the text, and then proceeding to new or less familiar information later in a sentence, creates a sense of organization in a text. They also note that the use of sentence-level headings or cues (such as "for example," or "therefore") helps a reader to anticipate (as opposed to having to reconstruct) the relationship between units of discourse in a text. Colomb and

Williams also cite the use of textual headings that give both functional and content information about upcoming material (such as "Introduction: Three Examples of Abusive Tax Shelters" -- the word "introduction" in this example tells what the function, or purpose, of the section is and the rest of the heading tells the content of the section) as an important organizational device.

Redish, et al. (1985) support these conclusions. They analyze two typical professional documents (an instruction manual and a fact sheet) and suggest techniques for organizing material. They recommend that writers "set the context for a document by telling readers what's in it, why they might choose to read parts of it, and what they are expected to get out of it." Writers should also "set up signposts" for readers, including tables of contents, titles, headings and subheadings.

Topic Elaboration

Witte (1983) conducted a study to determine some textual differences between student essays that had been previously judged to be "good" or "bad," based on their scores obtained using an Educational Testing Service-approved holistic ranking method. The method used two raters who had independently assigned each essay a score of one to four. Witte selected twenty-four "good" essays (with total scores of eight) and twenty-four "bad" essays (with total scores of two) and divided them into clauses and "t-units," (the shortest discrete segments of text that contain a complete thought). The successive

recurrence of various topics and ideas was noted. The "good" writers chose to elaborate more on a given topic and introduced fewer topics. In addition, they more frequently returned to their important topics after digressing or explaining their points.

Two previously mentioned comparative studies (Flower and Hayes, 1980 and Atlas, 1979) indicate that skilled writers are able to evaluate and use longer sentence parts (clauses, t-units) in their writing than are less-skilled writers.

Other Features

Many studies, especially those that involve surveys and large-scale assessments of written texts themselves, list several other specific, detailed features of texts that indicate writing ability. Cullen (1987) mentions "main point is clearly stated or implied," "essay is grammatically error-free," "essay demonstrates effective use of sentence variety" (length, type of sentence), and "essay demonstrates precise and sophisticated word choice, appropriate to the level of style." Faigley et al. (1981) cite "correct grammar, mechanics, and usage," "brevity," and "good vocabulary." Haswell's study (1986) suggests that the "overall essay length," "use of allusions" (in-text references to other writers and written works), "quality and length of the introduction and conclusion," "use of specific, precise words," "length of words," "use of standard sentences," and "nominal modification and complexity" (use of adjectives and phrases

modifying a noun) all contributed significantly to the writing quality of the older college students in his sample.

White and Polin (1986) evaluated their California State University student essays by looking for words that "convey exact meanings," "show control of connotation [values implied by the use of a particular word] and metaphor [the use of a word to represent a more abstract, unstated concept]," and "do not violate conventions of standard written discourse." Sentences in successful essays had "effective emphasis and rhythm" and "effective and correct punctuation and mechanics." Finally, Witte et al. (1982) list "freedom from grammatical errors that inhibit comprehension," "discernible thesis statements," "effectiveness of introductory section," and "accuracy of information" as specific, observable features of successful writing. Several other writers (Odell 1981, Storms 1983, Anderson 1985, Connors and Lunsford 1988, Davis and Stohrer 1989, Barclay et al. 1991) also mention the importance of correct grammar, mechanics, and spelling.

PART III: THE WRITING PROCESS

Perhaps the most significant change in writing instruction over the last twenty years has been a gradual shift from an emphasis on the finished, observable products of writing, to study and exploration of the process and procedures that writers go through when they compose. Goswami et al. (1981) divide their

Writing in the Professions advanced composition course guide into three sections: pre-writing strategies, drafting or writing strategies, and post-writing strategies, which are the simplest and most commonly used categories for describing the "writing process." Although studies have been done of the pre-writing and drafting stages, the majority of writing process research has been conducted on the post-writing, or revision stage of the process.

Pre-writing and Drafting

The pre-writing phase of composition usually involves planning activities such as defining the purpose, scope, and audience of the piece (Goswami et al. 1981), as well as techniques for generating and organizing raw material such as listing, outlining, freewriting, and questioning (Brand 1991). Atlas (1979) and Flower and Hayes (1980) both explore the cognitive abilities involved in the early stages of the writing process, and both studies note that skilled writers break a writing task down into specific goals based on mental representations of their potential readers. The ability to select and limit one's writing subject is also important during the pre-writing stage (Greenberg, 1988).

Flower and Hayes, as well as Faigley et al. (1985) note that the actual process of drafting in skilled writers involves the generation of ideas based on goals involving the relationship between the reader and the writer. Less-skilled writers are more

likely to generate ideas using simple remembered facts about the topic.

The ability to write collaboratively is mentioned by Anderson (1985), Barclay (1991), White (1991), and Witte (1993). Anderson's surveys indicate that writers should be able to co-author written material, delegate writing to others, critique others' drafts, and seek draft critiques from others. White says that these skills are particularly important in the business world.

Revision

Sommers (1980) conducted one of the earliest and most thorough studies of the revision process. She compared the writings and revisions of 20 college freshmen and 20 journalists, editors, and academics. Her study revealed some interesting differences between the revisions of more- and less-experienced writers. The more experienced writers described their primary objective as finding the form, shape, structure, or design of their argument, while the novice writers concentrated more on changing words as words, divorced from their role in the text. The more experienced writers were more concerned about their audience, and their imagined reader influenced their process of revision by functioning as a critic. The novice writers were more concerned about following abstract learned rules about texts, such as standard, inflexible organizational structures for essays and paragraphs. The more experienced writers "sought to discover

or create meaning" through revision, while the novice writers "sought to bring their writing into congruence with a predefined meaning." Finally, the more experienced writers viewed revision as a process with different levels of attention and different agenda for each stage. For example, the more experienced writers often separated the content-related revision of their documents from the grammatical and mechanical copy editing.

Faigley and Witte (1981) conducted a similar study to compare the revision processes of writers with different amounts of writing experience. They collected samples of writings and subsequent revisions from six inexperienced student writers (freshmen), six advanced student writers, and six expert adult writers. All eighteen writers wrote on the same topic. The study revealed that the more skilled writers made more "meaning-based" changes in their texts when they revised, as opposed to "surface-level," or grammatical changes. In addition, the more experienced writers made more revisions of all kinds as they wrote their first drafts. Finally, the more skilled writers revised with rhetorical goals in mind, as opposed to making small, relatively unconnected local changes. Studies by Flower and Hayes (1985), Wallace and Hayes (1991), and Schriver (1992) also indicate the importance of global, large-scale revision to successful writing.

Local, small-scale revision and editing are not to be overlooked, however, and they are cited as important abilities by several writers, including Locker (1984), Greenberg (1988),

Brand (1991), Wallace and Hayes (1991), White (1991), and Schriver (1992).

PART IV: MASTERY OF SPECIFIC GENRES AND FORMS

A study of writing skills at the college level must include not only how students write, but also what they should be able to write after four years of school. Faigley's 1981 survey of 200 college-graduate employees indicates that "the ability to use specific business and technical writing document forms" is one of the most important skills that should be taught in college writing courses. Storms (1983) surveyed 804 graduates of the college of business administration at Miami University of Ohio, who reported that they write memoranda, letters, short reports, step-by-step instructions or procedures, and proposals. Anderson (1985), also at Miami University of Ohio, conducted a survey of 841 alumni of that school who had studied in various disciplines. At least fifty percent of his respondents reported that they engaged in each of the following writing activities at least sometimes: writing memoranda, letters, step-by-step instructions and general instructions, and filling in pre-printed forms. Barclay's 1991 survey of U.S. and European aerospace engineers supports the findings of the other surveys. In addition to memoranda, letters and instructions, Barclay's respondents also listed audiovisual materials, journal articles, and abstracts as being important genres of writing for college graduates in the

field. Finally, Campbell's 1991 survey of business communication and technical writing textbooks indicates that all of these forms of writing, except journal articles and abstracts, are commonly taught in the university.

CONCLUSION

It is important to consider the three principal sources of these skill statements and some of the problems with each. Some of the studies, most notably those of Flower and Hayes, draw their information from tape-recorded statements made by writers while they were writing. Although this type of study provides a detailed analysis of cognitive processes, the information obtained usually applies only to one type of writing, the type of piece that the writer was working on when the study was conducted. A second common source of information in these studies is a survey of college graduates working in business. A shortcoming of this type of study is that the questions on a survey are often multiple choice or closed-ended, so in effect, researchers "put words into the mouths" of the respondents. These surveys, however, are a good indicator of the types of and purposes for writing that are most often encountered by college graduates. The final source of information is from either a researcher-conducted study of student texts, or a researcher-conducted survey of college writing instructors. A principal drawback of both of these methods is that skills that result from these studies often apply only to academic essays, which,

according to the business-employee surveys (Faigley et al. 1981, Storms 1983, Anderson 1985, and Barclay et al. 1991), are almost never written in the world of work.

In spite of these drawbacks, most researchers concur on several of the skills listed in this review. Nearly all would agree that successful writers should be able to understand their readers, their purpose, and the type of image that they are trying to convey through their writing. Writers should also be able to organize the material that they are writing, give examples when necessary, and connect ideas together logically. Writers should be able to collaborate when writing, and should be able to revise their writing, paying attention to both mechanics and grammar, as well as to larger issues of organization, focus, and relevance to a reader. Finally, the ability to use a specific form or type of writing to fit the needs of a communication situation is also important.

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